A TAGMEMIC ANALYSIS OF COHERENCE
IN THE WRITING OF DESCRIPTIVE
TEXTS BY COLLEGE STUDENTS

DISSERTATION

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For this study an attempt was made to bridge the disciplines of linguistics and composition in order to examine factors contributing to textual coherence. Pairs of descriptive texts written by fifty college students were examined in order to identify the factors which differentiate quality and topic.

Students were asked to compose a descriptive paragraph on the topic of fall. They were then encouraged to use their five senses, given leaves, and asked to compose a paragraph describing the leaves. The pairs of texts thus elicited were evaluated for preference by readers. The ANOVA revealed a significant difference ($p=.001$) between the two topics with fall texts preferred over the more specific leaves texts. Results suggest that encouraging students to use their five senses does not improve their writing. It may be more important to move through various levels of abstraction than to merely focus on sensory detail.

The texts were also scored holistically by two trained evaluators. Results of this grading were used to choose
five high- and five low-coherence texts on each of the two topics. These 20 texts were then analyzed in terms of the tagmemic referential hierarchy. A MANOVA was done to examine the dependent variables of Slot (location in time or space), Role (purpose or reason), and Cohesion (sociocultural context) in relation to quality and topic for these texts. Slot was found to be significant for both quality (p = .025) and topic (p = .004). Role was significant only for quality (p = .001). Cohesion was nonsignificant for either quality or topic. These results suggest that students should: (a) be encouraged to locate their texts in time and space in order to develop an adequate context for readers; (b) be encouraged to include purposes and reasons for the statements they make; and (c) be encouraged, where appropriate, to include a focus on humans and their activities (either literal or figurative) since such reference is a distinguishing feature of high-coherence texts.
TABLE OF CONTENTS

LIST OF TABLES................................................................. vi

Chapter

I. OVERVIEW OF STUDY...................................................... 1
   Introduction
   Purpose of the Study
   Research Questions
   Definitions
   Limitations and Delimitations
   Significance of the Study

II. TEXT PRODUCTION AND PROCESSING.................................12
    The Reading and Writing Connection
    Coherence versus Cohesion
       Audience Awareness
       Product versus Process
    Decontextualization versus Context
    Specificity
    Linguistics
    Summary

III. METHODS AND PROCEDURES...........................................41
    Data Gathering
    Texts
    Survey Instruments
       Scoring Rubric
       The Four-cell Tagmeme
    Data Analysis
       Comparison of Pairs of Texts
       Holistic Grading
       Reliability
       Training
       Analysis of Referential Hierarchy
       Class
       Slot
       Role
       Cohesion
       Multivariate Analysis
    Summary
IV. FINDINGS AND OBSERVATIONS

General versus Specific Texts
Holistic Grading
Four-Cell Tagmeme
  Slot
    Time
    Location
  Class
  Role
  Cohesion

Significance of Tagmemic Analysis
Quality
  Slot
  Class
  Role
  Cohesion

Topic
  Slot
  Class
  Role
  Cohesion

Summary

V. SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

Summary
  Purpose of the Study
  Procedures
  Results
    Specificity
    Holistic Scoring
    Referential Hierarchy
      High-Coherence Fall Texts
      Low-Coherence Fall Texts
      High-Coherence Leaves Texts
      Low-Coherence Leaves Texts
    Statistical Significance

Conclusions
  Specificity
  Holistic Scoring
  Referential Hierarchy
  Statistical Significance

Implications

Recommendations
  Methodological Recommendations
    Slot
    Class
    Role
    Cohesion
  Pedagogical Recommendations

Concluding Thoughts
APPENDICES

Appendix A. Measures of Coherence
Appendix B. Four-Cell Referential Tagmeme
Appendix C. Matched Pairs of Texts
Appendix D. Analyzed Texts

High-Coherence Fall
Text 101
111
232
248
254

Low-Coherence Fall
Text 121
125
137
212
222

High-Coherence Leaves
Text 301
311
404
442
448

Low-Coherence Leaves
Text 319
337
436
444
458

REFERENCES
LIST OF TABLES

Table 1  Comparison of Pairs of Texts by Same Author.....65
Table 2  Holistic Scores.................................67
Table 3  Interrater Reliability for Holistic Grading.....69
Table 4  Actual Scores for Four-Cell Analysis............71
Table 5  Non-transformed Proportion Scores for
         Four-Cell Analysis..............................80
Table 6  Transformed Proportion Scores for
         Four-Cell Analysis..............................81
Table 7  Group Means and Standard Deviations of
         Transformed Scores..............................82
CHAPTER I

OVERVIEW OF STUDY

The world mirrored in each man's mind is unique. Constantly changing, bafflingly complex, the external world is not a neat, well-ordered place replete with meaning, but an enigma requiring interpretation. This interpretation is the result of a transaction between events in the external world and the mind of the individual—between the world "out there" and the individual's previous experience, knowledge, values, attitudes, and desires. Thus the mirrored world is not just the sum total of eardrum rattles, retinal excitations, and so on; it is a creation that reflects the peculiarities of the perceiver as well as the peculiarities of what is perceived. In a very real sense there are as many interpretations of the world as there are people in it, since no two people are precisely alike. Whatever purposes writing and speaking may have, and there are several, one of the most important is to reveal to others one's own image of the world. (Young, Becker, & Pike, 1970, p. 25)

This study examines the factors at work in text production and processing which encourage the synthesis of the "world 'out there' and the individual's previous experience, knowledge, values, attitudes, and desires."

Rather than looking only at those features within the text, it considers those features beyond the text which contribute to coherence through shared meaning potential on the part of writers and readers. The linguistic framework for the study was found in the referential hierarchy as developed by Pike and Pike (1983).
The idea of shared meaning potential on the part of readers and writers reflects the growing interest which is developing in the relationship between reading and writing. Since the writing process has been shown to be closely related to the reading process, findings in the field of reading provide new insights into the field of writing. The result is that research into the writing process has become a new focus for reading specialists and both reading and writing are now considered by many to be constructive processes which, at the elementary level at least, depend heavily on the schemata brought to the respective tasks. As recently as 1984 Chiseri-Strater made a plea to the annual meeting of the Conference on College Composition and Communication that this higher level perspective should be employed by college level writing instructors as well—with the implication that this is not a current practice. A bright spot in the teaching of writing, however, is found in the field of adult education where its proponents find no difficulty with the suggestion that older students, who presumably have a richer background, will depend on that background during the process of writing.

One result of this focus on higher level and/or extra-textual features is a growing interest in coherence since as Witte and Paigley (1981) have observed,

In addition to a cohesive unity, written texts must have a pragmatic unity, a unity of a text and the world of the reader. A description of the fit of a
text to its context, as well as descriptions of what composition teachers call writing quality, must specify a variety of coherence conditions, many of them outside the text itself. (p. 201)

Coherence, although a vague term in much of the literature, is a major concern in text production. The explicit or implicit goal of most writers is to produce a coherent text which communicates to the reader. What are those factors which contribute to the perception of a text as a unified meaningful whole? In an attempt to answer this question many researchers have focused on those features within the text usually referred to as cohesion; however, Tierney and Mosenthal (1984) have shown that while cohesion may contribute to coherence, the two are not one and the same. Werth (1984) suggests that coherence should be viewed as a more generic term which encompasses the subcategories of cohesion, collocation, and connectors. DeBeaugrande and Dressler (1981) note that "Coherence is clearly not a mere feature of texts, but rather the outcome of cognitive processes among text users" (p. 6). Coherence may best be defined as those features which give unity and flow, not only within the text, but beyond the text; those features which aid in the choice and instantiation of appropriate schemata by the reader.

For this study, an interdisciplinary perspective was employed to analyze descriptive texts written by a post-secondary population. The purpose was to ascertain ways
such students build on their background knowledge (or schemata) in order to develop coherence in their writing. The need for such a study was noted by Witte and Faigley (1981) who contend that, "...in writing curricula, coherence is often ignored. A great portion of the advice in composition textbooks stops at sentence boundaries. Numerous exercises teach clause and sentence structure in isolation, ignoring the textual, and the situational, considerations for using that structure" (p. 201).

Introduction

Schema theory has become a major explanatory tool for describing text processing during the past ten years. Both psychologists and reading specialists have been especially interested in the application of schema theory to the acquisition of knowledge. Reading theorists contend that readers depend on this organized knowledge (or schemata) in order to process texts. Similarly, linguists have addressed the importance of discourse structure (which may be seen as a subcategory of schema theory) and have begun to look beyond the text at pragmatic concerns—another way of looking at coherence. Adult educators have likewise been interested in the information the adult brings to the learning situation since one of the basic premises of andragogy, or student directed learning, is the idea that adult learners build on the background knowledge they
already possess. Thus it can be seen that various disciplines have come to share a focus on higher level knowledge. However, this interest in larger contextual concerns has only recently caught the attention of those in the field of writing instruction, and then, only at the elementary level. The purpose for this study is to seek to determine how the focus on schemata may apply to the writing done by college students, and more specifically, to the development of coherence in their texts.

Purpose of the Study

For this study, descriptive texts produced by college students were examined in order to determine the differences between high- and low-coherence texts in terms of specificity and other factors related to coherence. Subpurposes include:

1. The comparison of holistic quality of texts on a general topic to those on a specific topic.
2. The holistic evaluation of texts to distinguish between high- and low-coherence texts.
3. The identification of references to the real world in five each of the high- and low-coherence texts.
4. The comparison of evaluations of textual coherence to the authors' inclusion of information from Pike and Pike's (1983) referential hierarchy.
Research Questions

The following research questions have been investigated in order to address the purpose and sub-purposes of this study.

Research question for sub-purpose 1:
1. Of each pair of texts generated by a given author, which one is preferred by readers?

Research question for sub-purpose 2:
2. Which texts are rated high- versus low-coherence by trained evaluators?

Research questions for sub-purpose 3:
3. In what ways do writers incorporate a slot or wave view?
4. In what ways do writers incorporate a class or particle view?
5. In what ways do writers incorporate a role or pragmatic view?
6. In what ways do writers incorporate a cohesion or field view?

Research questions for sub-purpose 4:
7. What features from the referential hierarchy contribute to textual coherence?

Definitions

Words and terms used in this study have the meanings below.
Adult: one who has completed high school or one who is 18 or more years of age.

Andragogy: "the art and science of helping adults learn" (Knowles, 1970, p.30); usually implies student directed learning.

Class: the "substance of reference: the events, identities, attribute relations, and place relations" (Pike & Pike, 1983, p.35-36); it fills box two of the four-cell tagmeme; answers the question 'what?', cf. particle below.

Coherence: "those underlying semantic relations that allow a text to be understood" (Witte & Faigley, 1981, p.202); "the subjective interpretation by the reader of...the degree to which ideas appear to 'hang together' in a clear, unified pattern" (Harris & Hodges, 1981, p. 55); also includes deictic reference or ties to the 'real world' as opposed to merely textual ties, while not excluding the latter.

Cohesion: (a) "those mechanisms that hold a text together" (Witte & Faigley, 1981, p. 202), refers to textual/grammatical features; (b) box four of Pike and Pike's (1983) four-cell tagmeme, answers "How governs/is governed?", cf. field below.

Deixis: "a word which has a pointing or locating function, as the demonstrative words this or that, or the location words here or there" (Harris & Hodges, 1981, p. 81).
Field: as used by Pike (1957) it denotes the larger picture which helps to define the smaller particles of language/behavior.

Particle: as used by Pike it denotes the smaller discrete pieces which go together to make the whole.

Pragmatics: "the study of meanings as they are influenced by social or cultural context" (Harris & Hodges, 1981, p. 246).

Referential Hierarchy: a relatively new focus in linguistics, developed by Pike and Pike (1983), it "is by far the largest and most complex of the three hierarchies [grammatical, phonological, and referential]. . . it concerns that to which speech refers, the communication referents" (p.35).

Role: box three of Pike and Pike's (1983) four-cell tagmeme, answers the question "Why?", deals with the purpose or reason for an event or state.

Schema: "a conceptual system for understanding something" (Harris and Hodges, 1981, p. 286).

Slot: box one of Pike and Pike's (1983) four-cell tagmeme, answers the question "Where?", cf. wave below.

Tagmeme: "a unit-in-context," usually described as a four-cell system with "contrastive-identificational features" of slot, class, role, and cohesion (Pike & Pike 1983, p. 8).
Tagmemics: "a linguistic theory developed by Kenneth Pike..., which views language as a patterned part of general cultural behavior, and composed of sound, morpheme, and functional levels" (Harris & Hodges, 1981, p. 323-324).

Wave: as used by Pike it denotes the blurring of discrete particles, when they come together in a speech stream; the dynamics of a behavior.

Limitations and Delimitations

This study was subject to the following limitations and delimitations:

1. Focus is on text as product (e.g., Pike's slot and class) and reader response as process (e.g., Pike's role and cohesion).

2. Since as Witte and Faigley (1981, p. 189) have observed, transformational grammar has "not provided specific directions for the teaching of writing," the theoretical framework of tagmemics is employed.

3. Since most discourse analysis has been done on narrative texts, the focus of this study was on descriptive texts in spite of the difficulties involved.

Significance of the Study

The term coherence is still in the process of definition and few researchers have addressed it. The goal of this study was to make a contribution to a new and
growing area by examining factors contributing to coherence. An additional goal was the furthering of linguistic understanding of the referential hierarchy by its application to a little studied genre, that of descriptive texts.

A better understanding of coherence will be useful to a variety of entities. Textbook writers and publishers are always looking for new ways of making texts more coherent. Administrators who are involved in developing curriculum and making decisions regarding instructional materials and procedures will find information which will enable them to make quality judgments about curriculum and materials. Teachers in training institutions should find the results useful in developing better methodologies for teaching coherence in writing. Classroom teachers who are actually involved in teaching writing procedures to adults should also find the results to have immediate practical application. Field linguists responsible for conducting workshops for native authors in minority languages will benefit from a clearer understanding of the relationship of the study of pragmatics and discourse analysis to the production of culturally appropriate reading materials.

Results of this research should suggest new and different strategies for working with college students to help them improve the quality of their writing. Finally, what is learned about coherence in writing has implications
for the comprehension of texts and our understanding of the reading process.
A debate has raged for the past decade as to whether reading should be viewed as a top-down process (e.g., Goodman, 1976; Smith, 1978) or as a bottom-up process (e.g., Gough, 1972; 1984). More recently, it has been viewed as an interactive process in which interaction occurs: (a) between information in the text and the knowledge possessed by the reader (Anderson, Hiebert, Scott, & Wilkinson, 1985; Rumelhart, 1977), or (b) between the various levels of the linguistic hierarchy (Stanovich, 1980). This debate as to the most appropriate focus for text processing is slowly entering the field of text production and, more specifically, writing instruction. What the author does during text production gives insights into what the reader may be doing during text processing while at the same time an understanding of how the reader processes text will no doubt aid the understanding of the writing process, so that the two are reciprocal.

The Reading and Writing Connection

Clay, 1975; Graves, 1983; Graves and Hansen, 1984; and Holdaway, 1979, have all sought with considerable success to
move away from a strongly decontextualized skills approach to reading and writing at the elementary level to a meaning centered approach. Chiseri-Strater, in a paper presented to the 35th Annual meeting of the Conference on College Composition and Communication, drew on her experience of having studied under Donald Graves to suggest that college teachers should learn from work done at the elementary level and should encourage that writing be done in an interactive context of communication.

Until recently, reading and listening were seen as similar passive processes, whereas writing and speaking were considered to be similar constructive processes (Ruddell, 1969; Yoos, 1979) thus, reading and writing were seen to be opposite but complementary processes. In more recent work the focus has changed to the similarities between reading and writing (Bereiter & Scardamalia, 1984; Langer, 1985; Straw & Scheiner, 1982; and Taylor & Beach, 1984). In spite of this relatively new focus, it is instructive to note that in Stotsky's (1984) rather extensive literature review on reading and writing she observes that "we know far too little about the relationships between reading and writing" (p.7).

It has almost become a given that reading and writing are both constructive processes: Bracewell, Frederiksen, and Frederiksen (1982) examine the cognitive processes involved in both reading and writing and point out the similarities; Kinneavy (1969) addresses the aims of
discourse; Kucer (1985) discusses the concept of "text world" with special emphasis on the role of context in literacy endeavors; Petrosky (1982) makes a plea for the integration of "reading, responding, and composing"; Squire (1983), like Petrosky, seeks an integration which will move away from "discrete and often isolated subskills" to a concern for the total process of composing and comprehending; while Tierney and LaZansky (1980) discuss the relationship between readers and writers as involving a "contract" or implied assumptions.

Similar views of the constructive nature of reading and writing are set forth in the work of Doctorow, Wittrock, and Marks (1978), and Wittrock (1983). Tierney and Pearson's (1984) view is indicative of this position:

We believe that at the heart of understanding reading and writing connections one must begin to view reading and writing as essentially similar processes of meaning construction. Both are acts of composing. From a reader's perspective, meaning is created as a reader uses his background of experience together with the author's cues to come to grips both with what the writer is getting him to do or think and what the reader decides and creates for himself. As a writer writes, she uses her own background of experience to generate ideas and, in order to produce a text which is considerate to her idealized reader, filters these drafts through her judgements about what her reader's background of experience will be, what she wants to say, and what she wants to get the reader to think or do. In a sense both reader and writer must adapt to their perceptions about their partner in negotiating what a text means. (p. 33)
This idea of "negotiating the meaning" is becoming widespread in the literature.

Squire (1984) shares this view of the interactive nature of text production and processing. According to him,

Current research in composing and comprehending is increasingly clarifying the interaction between these two dimensions of the thinking process. In both areas we are moving from an overt concern with discrete and often isolated subskills to a recognition of the importance of the interrelationship of skills within the total process. (p. 587)

Dillon (1981) expresses a concern that since reading and writing are similar processes, that writing instructors, especially at the college level, should learn from recent developments in the field of reading and adapt a more holistic view of the process involved.

The meaning of the text is not on the page to be extracted by readers; rather, it is what results when they engage ... texts for whatever purposes they may have and with whatever knowledge, values, and preoccupations they bring to it. Thus the written marks on the page more resemble a musical score than a computer program; they are marks cuing or prompting an enactment or realization by the reader rather than a code requiring deciphering. This view has already begun to prove fruitful both in literary criticism and in the study of reading. The prevailing understanding of composition, however, has not undergone a comparable or parallel reorientation [emphasis added]: textbooks and teachers still speak in terms of getting the meaning down on the page, saying what one means, and so on. It seems that some of what we have learned, or at least hypothesized, about constructing texts from the reader's end ought to have implications for the way we think about and teach writing. (p. xi)
The current focus on the interactive nature of text production and processing leads to a consideration of textual coherence which includes both approaches to texts.

**Coherence versus Cohesion**

Coherence may be thought of as encompassing pragmatic concerns (Levinson, 1983), especially as applied to text production and processing. For this study we ignore the closely related fields of speech act theory (Searle, 1969), conversational implicature (Grice, 1975), and semiotics (Eco, 1976), in an effort to examine the specific factors contributing to coherence in the construction of texts by both readers and writers.

There seems to be considerable fuzziness in the use of the terms coherence and cohesion. In fact, as Winterowd (1985) admits regarding his classic essay which was first published in *College English* in 1970,

> The most serious weakness in "The Grammar of Coherence" is its failure to distinguish between cohesion and coherence. A text can be cohesive without being coherent or coherent without being cohesive, depending to a great extent, of course, on the reader. Clearly my 1970 piece was talking about the grammar of cohesion, not coherence, but more than a decade ago I was unprepared to make the distinction [emphasis added]. (p. 100)

This distinction between cohesion and coherence has, in fact, been made only recently (e.g., Carrell, 1982; Phelps, 1985; Tierney & Mosenthal, 1983).
Since there is no uniform definition of the term coherence, it may be instructive to look at what various scholars mean by their use of the term. We begin with Halliday and Hasan's (1976) classic work which, surprisingly, does not even use the term coherence, but refers to exophoric reference which "takes us outside the text altogether" (p. 18). They are explicit that "Exophoric reference is not cohesive, since it does not bind the two elements together into a text." They go on to contend that "The significance of the exophoric potential is that, in instances where the key to the interpretation is not ready to hand, in text or situation, the hearer or reader constructs a context of situation in order to supply it for himself" (p. 18). They later say that they are consciously choosing to limit their attention to features occurring only in the text. It is ironic that one of Halliday's most important contributions has been his insistence on the importance of context with his concomitant positing of field, tenor, and mode. In Halliday and Hasan (1980) they contend that embedded in every text is context. In other, less known work, Halliday (1978) does address the issue of language as a social semiotic—very concerned with the context in which communication occurs; however, this latter perspective has largely been overlooked by those interested in the fields of reading and writing. See, however, Teale, (1984).
Tierney and Mosenthal (1984) have presented a very convincing argument that cohesion and coherence are in fact two very different things which should not be confused. "Research investigating the nature of textual coherence using the cohesion concept has not found cohesion causally related to a text's coherence...coherence is primarily a top-down phenomenon whether working from the perspective of the writer or the reader" (p. 240).

Moe (1979) similarly suggests that the two terms, although highly interrelated, are actually referring to two different ideas: "...cohesion is a text-related phenomenon, coherence is both a text-related and reader-related phenomenon, and they are not considered to be synonymous" (p. 18).

Gutwinski (1976) cautions us not to confuse the terms cohesion and coherence. He contends that "The rhetoric textbooks define 'coherence' rather vaguely, dealing under that heading with phenomena which, from a linguistic point of view, cannot be treated on a single level of analysis and some of which are not open to linguistic investigation at all" (p. 26). He prefers to avoid the term "Because of the vagueness that accompanies the popular use of [it], and the indiscriminate application of it to a wide range of linguistic and non-linguistic phenomena" (p.27).
Pike (1981), on the other hand, insists that "non-linguistic phenomena" are an appropriate domain for linguistic analysis and observes that

Until recently, most linguists in the United States have confined their attention to sentences and their included parts. Gradually they are extending their analyses to larger units--paragraphs, monologues, and conversations. With this new focus, linguists may hope to integrate their work with that of literary scholars. (p. 63)

Grimes (1975) shares the view that linguistic analysis is an appropriate tool for inquiry into coherence related factors. He states "It...seems possible from within linguistics to pin down certain aspects of the coherence of a text, and even to show why some passages are incoherent" (p. 9).

It is evident that we must differentiate between the two terms cohesion and coherence. Most of the work on the former dates from the mid-seventies when Halliday and Hasan (1976) published Cohesion in English. Since that time, various scholars have addressed the issue of cohesion (although sometimes calling it coherence) (e.g., Fahnestock, 1983; Markels, 1984; Stotsky, 1983). Although very little research has actually been done with the latter, coherence, Bamberg (1983) has noted that, "Even though most composition texts and rhetorics have routinely included a section on coherence, interest in this topic has intensified during the last five years" (p. 417). The unit of analysis for both
cohesion and coherence is usually the T-unit (Witte & Faigley, 1981) or predication (Marzano, 1983).

The reason most researchers have looked at cohesion instead of coherence (no matter which term they use) is no doubt because as Moe observes, "Linguists consider cohesion to be a measurable linguistic phenomenon, whereas coherence is considered to be more global and is not as directly amenable to evaluation" (p.18). On the other hand, a very different position is held by DeBeaugrande and Dressler (1981) who see coherence and cohesion as both being "text-centered notions, designating operations directed at the text materials" (p.7).

Among the few who actually have looked at coherence are Bamberg (1983, 1984), Foster (1984), and Marzano (1983). As mentioned before, Bamberg has addressed the issue of evaluating the coherence of texts. She suggests that based on recent research in reading it should be clear that

Meaning and coherence are not inscribed in the text. . .but arise from readers' efforts to construct meaning and to integrate the details in the text into a coherent whole. Although readers are guided by textual cues, they also draw on their own knowledge and expectations to bridge gaps and to fill in assumed information. (p. 419-20)

Foster found deictic references more important to textual coherence than was the use of cohesive ties. This may be because deixis takes us beyond the written text to the text world. Marzano, building on the work of Kintsch and van Dijk, proposes that coherence be analyzed by identifying
macropatterns—a rather complex task which entails first dividing the text into predication units. In spite of these studies, a great deal more work needs to be done in the understanding of coherence.

Enkvist (1978, p. 16) has observed "One basic difficulty in cognitive text modelling is that coherence is not an inherent quality of a text. Coherence is rather a function of the text and of the equipment the hearer or reader brings to its interpretation." Because of this, he goes on to say that "Connexity is... a matter of an interaction between the text and the receptor's knowledge base, and when we operate cognitive text models we must know whose knowledge base we are trying to describe." This leads to an examination of what writers know about their potential audience(s).

Audience Awareness

Coherence and audience awareness are closely related topics, since reader-related phenomenon which are highly important to coherence are often triggered by the author's sense of audience. Theoretical issues related to audience awareness are discussed by Flavell (1979) who addresses the issue of metacognition and posits a model of cognitive monitoring; while Flower (1979) suggests that writer-based prose should be seen as a step toward reader-based prose—not an end in itself; and Wagoner (1983) presents a
review of the literature on metacognition and comprehension monitoring.

Experimental studies related to audience awareness include Baker (1985) who examined comprehension monitoring abilities of college students with good and poor verbal abilities; Crowhurst and Piche (1979, p. 101) who looked at the "effect of intended audience and mode of discourse on the syntactic complexity of compositions"; Kroll (1978) who examined fourth graders recalls of a new game and found that writing seems to lag behind speaking in audience awareness; Kroll (1985) who did a content analysis of texts to determine the development of audience awareness from fifth grade to college freshmen and found lower grades made word changes while higher grades made meaning changes; and Rose (1980) who interviewed ten undergraduates (5 blockers and 5 nonblockers) to study writers block.

Walvoord (1982) notes the correlation between audience awareness and coherence:

To remind the student of the audience-centered nature of writing, an instructor might say or write, "I lost the train of your thought here," rather than "This paragraph is not coherent." The second response is not wrong; it just misses an opportunity to remind students that what we call "coherence" is not a mysterious, revealed principle but a way of ordering thoughts so that readers can easily grasp them. Such a statement also helps students understand that "coherence" may differ from essay to essay and that in all cases the test of whether or not a paragraph is coherent is how easily the reader can follow the thought progression. (p. 30)
Similarly, Ede and Lunsford (1984) observe that "A fully elaborated view of audience...must balance the creativity of the writer with the different, but equally important, creativity of the reader....it must relate the matrix created by the intricate relationship of writer and audience to all elements in the rhetorical situation" (p. 169-170).

One significant communications context which provides the writer with audience response is the use of dialogue journals. These have developed as a reaction to decontextualized reading and writing since they seek to place the writing process in a more natural social context of interactive communication. This helps to develop a sense of purpose on the part of the authors and to encourage schema-dependent writing. When failure to communicate occurs, there is usually natural feedback with a further opportunity to clarify the intended message. Much of the work in this area has been done at the Center for Applied Linguistics (Kreeft, Shuy, Staton, Reed, & Morroy, 1984; and Staton, Shuy, & Kreeft, 1982).

**Product versus Process**

From the study of coherence one acquires insights into the ongoing debate which has surrounded the issue of whether writing should be studied by looking at textual products or whether it should be studied as a process. Textual products have been the focus from a theoretical perspective for
Faigley (1980); Kintsch (1980); Meyer (1982); and Stern (1976). Those who have addressed the issue of textual products from a research perspective include Gee and Grosjean (1984); Koen, Becker, and Young (1969); Tierney and Mosenthal (1983); Vande Kopple (1983); and Witte and Davis (1980).

More recently it has become popular to conceptualize writing as a process and to relegate the product to a secondary position. A number of individuals have attempted to articulate a process theory: Chang (1983); Cooper and Holzman (1983); Faigley and Witte (1981); Flower and Hayes (1980; 1981); Kroll and Schafer (1978); and Perl (1980). Others have been more concerned with research related to the process perspective: Calkins (1980); Church and Bereiter (1984); Graves (1975); Leu (1982); Matsuhashi (1981); Olshavsky (1976–77); Perl (1979); Pianko (1979); and Sommers (1980).

Probably the most definitive work on coherence is Phelps's (1985) essay in which she seeks to posit an integrative theory of text production as both process and product. She suggests the need to change "the root metaphor of composition from that of creation to one of symbolic interaction" (p. 14). She distinguishes coherence and cohesion by observing that "Just as coherence is the semantic and pragmatic integrity discovered by readers in textual meanings, cohesion is broadly the verbal relatedness of the text as a cuing system" (p. 24). She further states
that "After great early confusion between the notions of coherence and cohesion, a distinction between them is beginning to firm up along the lines I have suggested, although the distinction remains rather vague and inconsistent" (p. 24).

Decontextualization versus Context

In spite of the current trend toward a more holistic view of text production and processing, many books aimed at teaching the skill of writing are still seeking to develop lower level skills (e.g., Adelstein & Pival, 1980). Dyson (1984), however, has so aptly observed regarding young children, "The written language puzzle is a complex one. And, as with most puzzles, children cannot solve it by being given only one piece at a time" (p. 174). Common sense suggests that the same is true of college students and other adults. Focus on lower level decontextualized tasks does not develop mature writers who can produce coherent texts.

The importance of context may be seen in Fries' (1986) observation that

Though texts are realized in language forms, no amount of counting language forms while ignoring the functions of these forms in the texts in which they occur will help us evaluate the coherence or readability of the texts. This does not mean that the forms are unimportant and can be ignored, for it is only by processing the forms of language that one can reconstruct the semantics of the text, and ultimately the semiotics of the interaction which the text realizes. Rather, we process the forms of the language of a text as part of a redundant
hierarchical signaling system in which no meaning which is important to the text is signaled only once. Context, including both the prelinguistic context as expressed in the contextual configuration, and the linguistic context provides a great deal of information about the identity and interpretation of any element of a text. The perception of the relation which holds between a unit and its context will constitute a great part of the perception of the identity of that unit. (p. 26)

Related contextual factors are also examined by Mosenthal, Davidson-Mosenthal, and Krieger, (1981); Nicholson’s (1984) ethnographic study; and Pichert and Anderson (1977) who looked at the way different perspectives color the comprehension of a story.

Petrosky (1982) observes regarding the current convergence of interest in context,

One of the most interesting results of connecting reading, literary, and composition theory and pedagogy is that they yield similar explanations of human understanding as a process rooted in the individual's knowledge and feelings and characterized by the fundamental act of making meaning, whether it be through reading, responding, or writing. When we read, we comprehend by putting together impressions of the text with our personal, cultural, and contextual models of reality. When we write, we compose by making meaning from available information, our personal knowledge, and the cultural and contextual frames we happen to find ourselves in. (p. 26)

It is impossible to consider the importance of the writing context without addressing insights from schema theory in the field of reading. Schemata are the organized conceptual systems which are the basis for understanding.
As D'Angelo (1986) has observed, "research in schema theory demonstrates the importance of verbal schemata and macropropositions in organizing complete texts" (p. 436). These "verbal schemata and macropropositions" are important factors in the development of coherent texts.

The roots of schema theory go back to Platonic philosophy, to the work of Immanual Kant (1781/1963), and more recently to Bartlett's (1932) classic work, Remembering. More current work on schema theory has been done mainly by R. C. Anderson and his associates (Anderson, Reynolds, Schallert, & Goetz, 1977; Anderson & Shiffrin, 1980; Anderson, Spiro, & Anderson, 1978; and Steffensen, Joag-Dev, & Anderson, 1979). Carey, Harste, and Smith (1981) merely replicated some of Anderson's earlier work, while Gagne' and Memory (1978), Hansen (1981), Pearson, Hansen, and Gordon (1978), and Tierney, Bridge, and Cera (1978-79) all examined applications of schema theory to elementary-aged subjects. Dreher (1981) and Whaley (1981) both looked at a cross section of students from elementary and middle school or secondary levels and found that younger students did not instantiate specifics or depend as much on story structures as did the older subjects. Both the studies by Singer and Donlan (1982) and Hayes and Tierney (1982) examined the use of prior knowledge and its place in the instructional process. Hennings (1984) has done an excellent job of translating concepts from schema theory to
practical classroom applications for the teaching of reading and writing.

Robichaux (1986) has applied concepts from schema theory to the study of both English and Greek texts in order to explain extra-textual concerns from a bilingual/bicultural perspective. As he states, "a text comes into existence via the text producer's assumption about the text receiver's knowledge state, so the text is molded...into a shape that conforms to the text producer's assumptions" (p. 9). The interface between the text producer's world and the text receiver's knowledge state is an area for potential problems in a bilingual context.

The importance of incorporating the background knowledge and experiences of writers into their individual productions has been a topic of interest not only to psychologists and reading specialists, but to many in the field of adult education. In his classic work, The modern practice of adult education: Andragogy versus pedagogy, Knowles (1970) contends regarding the importance of incorporating the background of adults:

To an adult, his experience is him. He defines who he is, establishes his self-identity, in terms of his accumulation of a unique set of experiences. So if you ask an adult who he is, he is likely to identify himself in terms of what his occupation is, where he has worked, where he has traveled, what his training and experience have equipped him to do, and what his achievements have been. An adult is what he has done.
Because an adult defines himself largely by his experience, he has a deep investment in its value. And so when he finds himself in a situation in which his experience is not being used, or its worth is minimized, it is not just his experience that is being rejected—he feels rejected as a person. (p. 44)

A similar perspective is held by many in the field of adult education (Brookfield, 1987; Brundage, 1980; Cross, 1981; Wlodkowski, 1985).

Several of those who are working with adults have sought to apply this perspective to the writing done by adults. Barton (1984), Kazemek and Rigg (1985a,b), and Koch (1977) discuss poetry written by the elderly, building on their life stories. Similarly, Wright (1981) recounts a writing workshop held for senior citizens in Harlem, while Dreher (1980) describes a writing project for retirees—both situations encouraged the adults to write from the rich resources of their own experiences. Bouchard (1979) and Gillis and Wagner (1980) make suggestions about how to work with older adult writers. Others such as Goswami and Odell (1980) and Odell and Goswami (1981) have addressed the issue of job related writing done by adults—building on existing schemata in the work environment.

Specificity

Another area closely related to coherence is that of specificity. Various college textbooks have encouraged
students to incorporate the use of specifics into their writing (Adelstein & Pival, 1980; Crews, 1977; Kane, 1983; McCrimmon, 1967; Strunk & White, 1979).

As Adelstein and Pival (1980) observe, "Whether or not they are aware of it, people are constantly describing, and often their descriptive ability determines whether they are interesting or dull people" (p. 98). Adelstein and Pival would be the first to suggest that such dullness is not merely a personality trait, but would be most evident in the writing done by such individuals. They go on to state "We experience the world through our senses, and as we increase or heighten our sense perceptions, so we enrich our lives" (p. 98). Elsewhere they observe that maintaining interest "depends mainly on presenting details, recording the small, individual sense impressions that combine to create vivid images in the readers' minds" (p. 105). As part of their heuristic for writing they contend that prewriting should include listing "all the details you can, jotting down everything that caught your eye, came to your ears, and affected your other senses" (p. 107). Here we see a strong emphasis on a sensory approach as a means to specificity.

In spite of those who suggest that the incorporation of the five senses improves one's writing, there are those who would question this. Wendell (1982) has noted regarding her experience of encouraging the use of a sensory approach for writer's workshops in preliterate societies that this "has
been found to be unproductive in many cases. Emotions, especially joy and fear, seem to be much easier for indigenous people to describe than are indications of the five senses" (p. 134, footnote). Similarly, Grimes (1975) discusses the importance of emotion over sensory detail:

We tell people of things that we have seen or thought of and they have not, and in doing so we extend their field of reference beyond their own experience. Actions and feelings are also part of that field of reference, not just the visible details of the setting. (p. 301)

From a different perspective, Ohmann (1979) cautions against overemphasis on the use of detail. He contends that "the injunction to use detail, be specific, be concrete... push[es] the student writer always toward the language that most nearly reproduces the immediate experience and away from the language that might be used to understand it, transform it, and relate it to everything else" (p. 396).

The relationship between coherence and specificity has been examined more recently by Dillon (1981) and MacDonald (1986). The latter observes that "knowing how to be specific is a very complex skill, while the advice we often give in textbooks and in class is overly simplistic" (p. 195). She suggests that the teaching of specificity must take into account: (a) the audience for the text, (b) the author's purpose, and (c) the communications context, as well as (d) the genre involved. In terms of audience she
states "The quantity and function (or purpose) of specifics are related to each other and to the issues of kind and level. Both quantity and function are decided in relation to audience, a point often neglected in simple textbook advice" (p. 198). She observes regarding author's purpose, "This is not to say that the particulars do not matter, but that they matter in relation to the end the author has in mind" (p. 199). She cautions that context cannot be ignored since "what is 'specific' may vary from one context to another in several ways—in kind, level, quantity, and function" (p. 196).

Grimes (1975) would agree with MacDonald regarding the importance of audience awareness in determining the use of details. He contends that "the speaker's judgment that the hearer does or does not yet know what it is he is talking about determines the effort he puts into elaborating his descriptions" (p. 299).

Elsewhere MacDonald asserts that "Researchers and theorists in fields like linguistics, reading, cognitive psychology, and composition are now increasingly insistent that low-level decisions--such as how and where to use specifics--are made in the context of larger communicative strategies" (p. 195). This focus on "audience, purpose, and the writing situation" (p. 202) is the same focus necessary for teaching coherence in writing.
A further area addressed by MacDonald is the importance of choosing specifics which are appropriate to the genre being composed.

The kind of specifics relevant to one form of discourse may differ from those suited to another. However much we prize sensory details in some modes or on some topics, the 'specifics' required in many other kinds of writing will not and should not be sensory. (p. 197)

She contends that pedagogical strategies for teaching the use of specifics should be tailored to the genres being used. Similarly, van Dijk (1977) has observed "Perhaps each type of discourse, given a certain topic of conversation, has an UPPER BOUND of generalization and a LOWER BOUND of particularization or specification" (p. 109). Based on the work of Adelstein and Pival (1980) it may even be necessary to adapt the use of specifics to sub-genres.

The original impetus for this study came from the work of Allen (1982) who strongly encourages the use of the five senses, with a concomitant focus on detail. Whether or not Allen is aware of it, much of her methodology for teaching writing results in texts that are descriptive in nature. In the field of linguistics, it is not clear whether or not "description" is a separate discourse genre. Description is definitely a type of writing that is pervasive throughout virtually all genres, but whether or not it is a genre in its own right is still open to question. For example, Longacre (1983) observes "It may be that descriptive
discourse, in which we simply are describing something which we see, is essentially different from expository discourse" (p. 10). In more recent personal communication Longacre declined to state a position beyond what he wrote in 1983. Jones (1977) is more explicit in her comments regarding description as a genre although there is still an unwillingness to make a definitive statement:

I have classed descriptive discourses (e.g. describing a sunset, or the physical lay-out of a room) with expository discourse, although sometimes I lean instead towards classing descriptive as a separate type, on par with narrative and expository discourse, viz. narrative, descriptive, and expository. I put descriptive discourse in the middle here because it seems to partake of some features of each of the other two types. Descriptive is like narrative in being more oriented toward concrete, real-world objects, persons, or events. It is like expository in usually lacking a chronological component. (p. 126)

Since most textual analysis and/or discourse analysis being done in linguistic circles today focuses on narrative texts, there is very little in the linguistic literature which gives insights into descriptive texts.

Such is not the case, however, in the field of rhetoric. The seeds of modern descriptive writing go back to 1866 when Alexander Bain's landmark textbook English Composition and Rhetoric came out asserting that all texts could be categorized under one of five types or "Modes of Discourse": Description, Narration, Exposition, Persuasion, and Poetry. Bain contended in an 1849 essay that he was the first to
separate description into a distinct genre (Harned, 1985). This was probably not entirely true, but many of the current writing heuristics still can be traced back to Bain. In spite of their long history, Bain’s views, although altered, remain very much in evidence in today’s textbooks on writing. One should note, however, D’Angelo’s (1984) caution that "the nineteenth-century forms/modes of discourse ought to be discarded as the basis of serious composition teaching. They confuse forms of discourse with modes of discourse. They present aims that are unequal in status. And they are based on an outworn faculty and associationist psychology" (p. 40).

A major focus in Bain’s writings was the importance of a sensory approach. In psychological terms "Bain’s associationist theory, with its rationalist perspective, had explained how ideas were derived from sense impressions, and how they combined in various ways to form systematic knowledge, trains of thought" (Woods, 1985, p. 28). From the above it is clear that a sensory approach to writing, especially descriptive writing, has been around for more than a century.

Linguistics

In addition to the work done by various scholars in the fields of reading, writing, and psychology, we must also consider the input from the field of linguistics since as
Enkvist (1978) has observed, "In recent years, linguistics has been widening its scope to cover many of the problems traditionally dealt with under rhetoric rather than under grammar in the trivium of the seven liberal arts" (p. 1).

A major early contribution to the work on cohesion and coherence was the classic by Halliday and Hasan (1976), Cohesion in English, as well as the numerous other works by both of them. About the same time, Grimes (1975) made a significant contribution to discourse analysis and an understanding of texts with his Thread of Discourse. De Beaugrande (1980, 1984) has done what is probably the most comprehensive work on text production and discourse processing.

Sperber and Wilson (1982) have posited a relatively new concept known as relevance theory which is gaining a hearing in Europe. While building on the work of Grice, they reject all of his maximums except for that of relevance—that is that texts are assumed to be relevant (Blass, 1986; Gutt, 1986). It seems as though the same concept of relevance is handled by Pike and Pike under Role, the third box, in their referential hierarchy.

According to Enkvist (1978) there are four basic theoretical models espoused by various textlinguists: (a) sentence-based, (b) predication-based, (c) cognition-based, and (d) social interaction-based text models. Similarly, in the field of composition Faigley, Cherry, Jolliffe, and
Skinner (1985) contend that there are three basic contemporary views of composing: (a) the literary, (b) the cognitive, and (c) the social. One can see that the last two categories in both disciplines are the same. Faigley, et al., go on to state regarding the cognitive tradition "some of Aristotle’s categories have carried through a 2,400-year-old tradition of teaching rhetoric to become useful for discourse linguists such as Pike (1954) and Grimes (1975)" (p. 16).

While acknowledging a debt to numerous other linguists for their insights regarding text analysis, for this study the analyst has chosen to follow in the cognitive tradition and to use the linguistics model of tagmemics as developed by Pike. His theoretical tagmemic framework was chosen because of the way it clarifies coherence related factors.

In an early article, Pike (1959) provides a basic introduction to language from the perspectives of particle, wave, and field (terms are borrowed from physics). These concepts were later applied to the writing process by Young, Becker, and Pike (1970). It was first thought that their heuristic procedure would provide a useful model for analyzing the texts in this study since various respected experts in the field of writing have found it quite useful. Couture (1986) refers to the Young, Becker, and Pike volume as a "highly regarded text" (p. 70) and no less a writer than Winterowd (1976) has observed regarding it that
"Tagmemics, the grammatical theory identified with Kenneth Pike,...has had significant impact on the teaching of composition, primarily through an excellent textbook based on tagmemic theory" (p. 208). This in spite of Kneupper's (1980) view that it is in need of a revision. Odell (1970) also used the tagmemic heuristic as the basis for his dissertation and refers to it heavily in his classic work, Evaluating Writing, which he co-authored with Cooper (Cooper & Odell, 1977). For this current study, however, it soon became evident that Pike and Pike's (1983) more recent work in which they posit what they term the referential hierarchy would be a better tool for discovering how students build coherence into their writing.

The most comprehensive presentation of tagmemics is found in Pike (1967) which presents a strong emphasis on language in context. Pike and Pike (1983) describe the importance of context to tagmemics as follows:

The Tagmeme, as a unit-in-context, rejects any approach to language which abstracts items from context under the assumption they can be understood in isolation from larger context, or by abstracted formal or logical internal description alone. Everything gets part of its nature from its relation to other items in the system. The relation includes that of the immediately-containing larger unit, the class of which it is a member, the impact on behavior or on the understanding of meaning which it elicits, and the coherence with a background with which it is integrated or by which it is controlled. (p. 78)
Pike and Pike see language as composed of three interlocking hierarchies: phonological, grammatical, and referential. Their referential hierarchy will be the main tool for the analysis of the texts in this study. According to Pike and Pike,

Reference has to do with what a stream of speech refers to—what it is talking about. It refers to qualities, identities, events, and purposeful sequences of events which make up the total macro-event. If these events were historical they could have been photographed, or if imaginary could have been drawn; in both cases they can be talked about. (p.6)

The referential hierarchy is a relatively recent addition to their theory and thus has not been fully worked out for all genres although Poythress (1978, 1982a,b) has applied it to the analysis of New Testament Greek and Howland (1981) has used it for a very thorough analysis of a story in the Carib language of Central America. Howland has made a major adaptation, however, in positing three interlocking hierarchies of (a) Events, (b) Participants, and (c) Setting and Props. Much work remains to be done in this area.

Summary

Reading and writing are currently seen as involving similar processes so that insights into one transfer readily into the other. Recent findings within the field of reading involving the importance of schema theory and the larger context of text processing have implications for text
production and, more importantly, for the construction of coherent texts. Coherence is seen to involve not only textual features, but extra-textual features such as the sociocultural background, as well as the knowledge and experiences, of the reader. Specificity is also seen to be a factor closely related to the background of the reader.

Since the concept of coherence in text processing and production is rather vague in the literature, understanding may be aided by looking at it through another lens. Although the heuristic procedure developed by Young, Becker, and Pike (1970) was extremely useful to writing teachers, that book is now dated. Pike and Pike's tagmemic theory has moved beyond that and it is time to apply some of their more recent work to text production. For this study, their referential hierarchy is used to analyze descriptive texts in order to explore those factors contributing to textual coherence.
CHAPTER III

METHODS AND PROCEDURES

The following chapter contains a description of the procedures which were followed in determining the way college students develop coherence in their composition of descriptive texts. First, the process of data gathering is explained; then, the texts are detailed; next, the survey instruments are described; and finally, the data analysis is made explicit.

Data Gathering

Because of the current trend toward more naturalistic studies, the descriptive texts needed for this study were collected from volunteers in two college classrooms: one at North Texas State University, and one at the International Linguistics Center, an extension campus of the University of Texas at Arlington. Students were asked to produce two descriptive paragraphs during one writing session: first, one of a general nature on the topic of fall (or autumn) and then, following an intervention taken from Allen (1982) regarding the use of the five senses, they were each given a packet containing 5 to 10 leaves and asked to use their senses to describe them.
In an attempt to develop a context for this writing, the first part of the session was spent on a lecture dealing with the current interest in writing. A holistic view of language arts was presented along with a discussion of early writing and invented spellings (c.f., Bissex, 1980). It was noted that reading teachers are becoming more and more involved in writing since the two fields are now seen as being closely related. The students were then told (the following is a transcription from tape):

Rather than spend time talking about writing this morning, what I would like you to do is to take a piece of paper and I would like you to write a descriptive paragraph for me about fall. I'm not going to grade this. I don't care about your grammar or your spelling. I want you to communicate with me. I just want you to write a descriptive paragraph about fall.

Students spent 10 to 12 minutes writing. Then they were told:

Now as I told you, this book [Allen, 1982] has been fascinating to me. In here she says she has a method which she has used with native Americans across the U.S. and up into Canada. It has been very successful. She says, "I can walk into a school and I can say 'I can teach you to become a writer just like that [snap of fingers]. It is almost as fast as making instant coffee.' Sounds too good to be true, doesn't it? Anyhow, her method is to go in and to make the students aware of their five senses. She says that everything that we have ever learned since we were babies has come to us through the five senses: either things we have seen or we have heard or we've smelled or we've tasted or we've felt. And she says that if you can make yourself aware of what you are seeing, what you are feeling, what you are tasting—if you can make yourself aware of it and then write those things down so someone else can taste it and see it.
and smell it, then you are far on the road to becoming a good writer. So she says it is almost like magic—this ability to use your senses and then to write them down on paper so someone else can experience those things you are experiencing.

Packets of leaves were distributed to the subjects.

Now I want you to turn your paper over and I want you to use your senses—I can't guarantee that the leaves are edible, but as much as possible I want you to use your five senses, your five doors, use your eyes, your nose, your mouth, your ears, your hands to describe these fall leaves.

There was much boisterous response as they examined their leaves and good-natured comments such as "This isn't poison ivy, is it?" or "Those of us from New England don't think these leaves cut it." One student asked "Can we use our imagination?" The reply was "Describe these leaves, because you can sense these leaves." Students spent 10 to 15 minutes writing and then were debriefed regarding the focus of this study.

Texts

For this study fifty pairs of written descriptive texts were examined. These texts were from two sources: undergraduate students in the school of education at North Texas State University and graduate students in the department of Foreign Languages and Linguistics at the University of Texas at Arlington. These two groups were
chosen because the author is interested in the writing strategies of students in those two disciplines.

In order to determine the homogeneity of the two groups of students, a multivariate analysis was used to test for a difference between two independent groups. For 2 and 47 degrees of freedom an F ratio of between 3.15-3.23, or by extrapolation an F ratio of 3.19, would be needed for significance at the .05 level. In this instance the computed F was only .406 which indicates that there is no significant difference between the texts produced by the two groups.

The topics of fall and leaves were chosen based on the work of Allen (1982) who has observed,

My ways of helping students practice are almost as many and varied as the classes. The way I select usually depends on what is available for sensory examination. Teachers at Intermountain School will remember that I brought to our first meeting red and yellow leaves I had found beneath the trees on campus. I gave those teachers the [description of using the five senses]. . .and they wrote far better than any of them knew they could. In a few minutes they learned a great deal about fall leaves and even more about how to express themselves in words. (p. 24)

As an example of the kind of writing done using this activity she presents several drafts of a poem done by Carl Vicenti, then a sophomore student at Albuquerque Indian School:

FALLEN LEAF
You, rough edged, yellow thing
With a sour taste.
Smooth and then
Blowing in the grass
Wet and moist
Lying there, eyes shut,
Holding your breath,
Waiting for the snow to fall. (p. 28)

A further reason for choosing these topics was their
ambient nature—all subjects were experiencing them to a
greater or lesser degree depending on their awareness of the
environment at the time the texts were gathered. The intent
here was to utilize what Goffman (1974) terms the natural
frame. Jones (1983, p. 26) gives the following example of a
natural frame:

A typical Autumn frame includes knowledge of
those things which happen in that time of year,
such as leaves changing color and eventually
falling off the trees, weather getting colder,
including occasional frosts, birds flying south,
and squirrels gathering nuts for the winter. All
of these happenings are seen by most people as
natural happenings that occur again and again,
inguided by human intelligence or purpose.

All texts were typed as received with any spelling
errors uncroected—realizing these are first drafts. In
spite of much current evidence which supports the importance
of the revision process, for this study the focus was on
first drafts because of the fact that descriptive texts do
not exhibit the broad differences in vividness which are
usually found in narrative (Longacre, 1981). Titles (where
used) were included since the authors may be presumed to
have considered the title as part of the text.
Survey Instrument

The two survey instruments found in the Appendices were used to objectify the analysis of the texts. The first is Bamberg's scoring rubric for coherence and the second is Pike's four-cell tagmeme for the referential hierarchy.

Scoring Rubric

Integral to holistic scoring is the use of a rubric or scoring criteria guide. Although this is presented to the graders before the reading begins, they are free to interpret it and adapt it so that it becomes a useful tool for them for the actual texts they are given. It then becomes a basis for a consensus of ranking, but should not be viewed as giving absolute scores. Appendix A (from Bamberg, 1983) was used by two trained graders to evaluate each text for coherence on an adapted four point scale.

For this study absolute scores were not mandatory since the purpose was to obtain a relative ranking which could be the basis for the further selection of five high- and low-coherence texts on each of the topics following the procedure used by Witte and Faigley (1981). For both the fall texts and the leaves texts those with the three highest scores were used and then two more texts were chosen from those receiving the next lower score. For example, high scores on the fall texts ranged from 8–9 with one receiving a score of 9, two receiving a score of 8.5, and seven
receiving a score of 8. The texts receiving scores of 8.5 and 9 were chosen for further analysis and two of the remaining group of seven were arbitrarily chosen for a total of five texts. A similar procedure was followed for the high-coherence leaves texts and the low-coherence texts on both topics in order to obtain a total of twenty texts for analysis of the referential hierarchy.

**The Four-cell Tagmeme**

Appendix B shows Pike's four-cell tagmeme which was used for analysis of references to the real world. The positing of the referential hierarchy is a relatively new attempt by Pike to account for references to the "real world." Basic to the referential hierarchy is the idea of "item-in-context." As K. Pike (1982) observes,

> For the narration of an event to be intelligible to a hearer [or reader], there must be a degree of cohesion of actual expectancies of the hearer with the expectancies expected of him by the speaker [or author], and a degree of coherence—if the hearer thinks that facts are being recounted—with the view of reality as believed in by the hearer. (p. 100)

Thus Pike contends, in contrast to many other linguists, that we must not be limited to the text, itself, but must go beyond the text both to understand and to analyze it. He goes on to state

> We assume here that a person lives in referential space—in interlocking tacit or implicit frames of reference of time sequence, spatial array, physical...
relationships, logical coherence, social structures, psychological involvement, belief systems about reality, intersecting events, and others. No person can bring into words all at one moment the content of each of these in all its detail. (p. 103)

Because of the need to handle these various perspectives, Pike posits the four-cell tagmeme with its residual constructs of particle, wave, and field. In lay terms, K. Pike (1982) describes the latter as follows:

Within tagmemic theory there is an assertion that at least three perspectives are utilized by Homo sapiens. On the one hand, he often acts as if he were cutting up sequences into chunks--into segments or particles. At such times he sees life as made up of one "thing" after another. On the other hand, he often senses things as somehow flowing together as ripples on the tide, merging into one another in the form of a hierarchy of little waves of experience on still bigger waves. These two perspectives, in turn, are supplemented by a third--the concept of field in which intersecting properties of experience cluster into bundles of simultaneous characteristics which together make up the patterns of his experience. (p. 13)

The four-cell tagmeme (cf. Appendix B) begins with the first cell entitled SLOT. This contains the dynamic wave perspective and in the referential hierarchy is concerned with spatiotemporal references and relative prominence, that is, whether the event is nuclear or marginal to the larger text, although notation of relative prominence is found under Class.

The second cell is entitled CLASS and contains the more static particle perspective. In the referential hierarchy
this cell contains the actual events as set forth in the text.

The third cell is entitled ROLE and is a relatively new and important addition to the theory (i.e., it was not included in earlier versions which only dealt with particle, wave, and field). For the referential hierarchy this cell contains the purpose or reason for each event listed under Class.

The fourth cell is entitled COHESION and contains the relational or field perspective. In the referential hierarchy it is concerned with the larger sociocultural system against which the events may be interpreted.

Data Analysis

Four types of data analysis were done. First, three naive readers chose which member of each pair of texts by the same author they preferred. Next, a holistic grading was done by two trained evaluators. Then, the analyst examined the texts in relation to references to the real world. Finally, a multivariate analysis was done to determine which independent variables were significant in differentiating quality and topic.

Comparison of Pairs of Texts

Three naive readers who were medical technicians with only a high school education, were asked to rate which of
each pair of texts by the same author they considered to be more coherent. Interrater reliability for their choices was only 52% so their responses were not used. Instead, the holistic coherence grades assigned to each text by the two linguists who were trained evaluators were used to measure the relative quality within each pair of texts.

**Holistic Grading**

The practice of holistic grading was first developed by the Education Testing Service in the late 1960’s (White, 1985). In spite of almost twenty years of use, the procedures are still in the process of refinement.

Cooper, in one of the most definitive pieces of work dealing with the evaluation of student writing (Cooper and Odell, 1977), has a chapter discussing holistic grading. He defines it as "a guided procedure for sorting or ranking written pieces" (p. 3). He describes the process as follows:

The rater takes a piece of writing and either (1) matches it with another piece in a graded series of pieces or (2) scores it for the prominence of certain features important to that kind of writing or (3) assigns it a letter or number grade. The placing, scoring, or grading occurs quickly, impressionistically, after the rater has practiced the procedure with other raters. (p. 3)

Although there is debate in the literature as to the differences between holistic grading and "primary trait scoring," it might be more appropriate for this study to use
the latter term since the focus was primarily on the "primary trait" of coherence. However, grading for this study will follow White (1985) who chooses to consider the similarities between the two types, rather than the differences, thus the more general term, holistic grading, will be retained.

The texts were graded holistically for coherence (cf. Appendix A) by two graders who are both experienced linguists who have worked within the tagmemic model. One has also taught high school English and the other has had extensive editing experience and is a member of the Society for Scholarly Publishing. It was planned that where there was a difference between the graders, a third grader would be used, however, this was not necessary since they differed in so few cases.

White (1984) makes a powerful argument for the use of holistic grading:

Writing, like reading, is an exercise for the whole mind, including its most creative and imaginative faculties. The rapid growth of holisticism in grading reflects this view of reading and writing as activities not describable through an inventory of their parts, and it serves as a direct expression of it: by maintaining that writing must be seen as a whole, and that the evaluating of writing can not be split into a sequence of objective activities, holisticism reinforces the vision of reading and writing as intensely human activities involving the full self. (p. 409)

It seems philosophically difficult to evaluate a holistic concept such as coherence by recourse to lower level
phenomena such as analytic scoring of various sub-skills which are thought to relate to the writing process.

White (1985) presents quite a detailed description of the organization and management of a holistic essay reading session. According to him, factors such as the environment in which the reading is done and "considerations of food and drink are by no means trivial" (p. 152). He suggests that the room must be well-lit, quiet, and there must be sufficient space. For this study, the reading was done in an office with good lighting and each reader was seated at an individual desk to ensure sufficient workspace. The desks were across the room from one another and the evaluators were seated with their backs to each other. Coffee, cold drinks, homemade cookies, and fruit were provided in the room for whenever the evaluators agreed between themselves they wanted a break.

Reliability

To ensure the reliability of the holistic grading as much as possible, the first five of White's procedures for holistic grading were incorporated: (a) controlled essay reading which provides for all texts to be read at the same time and place; (b) use of a scoring criteria guide or rubric which for this study is Appendix A; (c) use of sample papers for practice scoring--these were from an earlier pilot study; (d) checks by the analyst on the reading in
progress to guard against drift from original criteria; and (e) multiple independent scoring, i.e., the use of two evaluators. His sixth procedure was not included since that deals with the evaluation and long term record keeping which must be done when readings are done repeatedly as in a professional testing service (White, 1984, p. 404-05).

Even though White observes that when "all six are observed with sensitivity and care, high reliability of scoring has been achieved" (p. 404), he nevertheless cautions that "There is some uncertainty at this time as to just how reliable controlled essay readings may be." He continues, "Unfortunately, statisticians have reached no agreement about ways to measure comparative reliability of readings, and there are many different ways of computing reading reliability. Reports of reliabilities in the .90 range occur from time to time...but it is rarely clear how these numbers are derived" (p. 405).

Raymond (1982) shares this concern regarding statistical reliability and cautions that since language is a living vital thing it is not amenable to the same types of analysis and quantification which are appropriate to the hard sciences. He states that:

Pure objectivity in the evaluation of writing is, by the nature of writing, impossible. Even if a computer were to attack the task with programs to measure every nuance of style and meaning known to researchers, the results would still be subject to review by anyone willing to review them. Good writing, ultimately, is writing that is perceived
to be good. In evaluation, perception may not be all, but it is a sine qua non. Perception may be codified, guided, corroborated, or refined in any number of ways; but it can never be entirely quantified or eliminated. This means that our research will forever be inconclusive, especially when compared with the more precise results of science. (p. 403)

He further contends that we should not "feel guilty for failing to achieve a degree of precision that cannot and should not be achieved" (p. 403).

Training

Reading of the sample papers began about 8:30 in the morning. Each of the two evaluators was given a copy of Bamberg's scoring rubric (Appendix A) and a set of sample papers. Their goal was to develop an agreement between the two of them as to how to evaluate the sample papers. According to Raymond (1982) "Although training sessions for raters are normally motivated by the desire to achieve inter-rater reliability, their chief value is that they require evaluators to examine their assumptions critically and to arrive at an institutional policy about what is important and unimportant in writing" (p. 401). Similarly White (1985) contends that holistic reading must be done within a "community of assent." He further contends that "readers must have the opportunity to grade those [sample] papers, to argue out differences, to come to an understanding of the ranking system, and even to make
changes in the scoring guide if they agree to do so" (p. 164). In fact, the latter actually happened in this reading when the two evaluators decided that a four point scale did not give enough distinctions and they decided to add pluses and minuses to the grades they assigned, which would make a nine point scale. They felt, however, that for the texts in this study, none was poor enough to fall within Bamberg's lowest category, so they agreed not to use 1 or 1-. Therefore they were actually using a seven-point scale.

When it was determined that there was general consensus on the interpretation of the criteria to be used for scoring, the reading of the actual papers began. This was about 9:00 a.m. Each evaluator had a complete photocopied set of the texts and grades were placed in the top left corner of each page. During the reading, the analyst kept a close check on the reading to assure that the evaluators were not drifting from the standards they had originally agreed upon.

The evaluators continued until 12:00, at which time they decided to continue reading until done, rather than breaking for lunch. Since checks on the reading in progress indicated that they were not suffering from fatigue which might cause score drift, they were allowed to continue. They completed the task at approximately 1:00 p.m. They were then taken to lunch in a unique tea room. According to White (1985) "Extra attention to these creature comforts
says more loudly than do words that the readers are special people doing a special task, and it reinforces the importance of the enterprise" (p. 153). Since the evaluators were personal friends they were not reimbursed for their services.

Analysis of Referential Hierarchy

Once the texts were graded for coherence, five each of the high- and low-coherence texts on both topics were analyzed for reference to the real world. The basis for this analysis was the procedure outlined in Pike and Pike (1983, p. 35-73), however, as they themselves readily admit the theory and thus the procedure are still in the process of formation. Note their comment that "each factor we have spoken of, especially role and cohesion, merits considerably more study—and in some instance very extensive studies" (p. 66). E. Pike is currently using the referential hierarchy to analyze a hortatory text—a genre not yet attempted in this theoretical framework (personal communication, 1988).

The four-cell tagmeme can be used to describe not only the referential hierarchy, but the grammatical and phonological hierarchies as well. For this study, however, only the referential hierarchy was analyzed since it was considered to be more pertinent to an analysis of coherence. In addition, the four-cell tagmeme can also be used to examine any level of the linguistic hierarchy (from larger
to smaller these consist of macro event, vector, complex, event, identity, relations). For this study only the higher levels were analyzed.

Class

According to Pike and Pike, the first step in analyzing the referential hierarchy is to "list in chronological order the smallest events that we understand to have happened as communicated to us by the stream of speech" (p. 37). It must be noted that while it is appropriate when working with narrative texts to focus on events, it is much more appropriate to look at states when working with descriptive texts. This is in spite of the fact that according to Pike and Pike, when analyzing narrative texts "State is considered to be derivative of action, hence is stated as action" (p. 37). In this study of descriptive texts it was decided to keep the focus on states where that was what the authors chose to write about since observer viewpoint is significant to tagmemic analysis. As K. Pike (1977) has noted:

It is talked about elements...which form the basis of linguistic referential analysis. The study of the "thing-in-itself" apart from talking observers or participants, is not part of the tagmemic aim of linguistics. This constraint on the field of study helps to prevent the whole world from entering the analysis of a clause...; the world is in the background, waiting to be talked about, or to be drawn on by allusions to its parts as props or settings of acts, but it intrudes only
when the purpose of narrator, actor, or undergoer finds it relevant. (p. 349)

E. Pike (personal communication, 1987) has agreed to the adaptation in this study which keeps the focus on states as long as it is understood that these states are derived from underlying events.

It is also worthwhile to note in terms of procedures that either events or states are always expressed in present tense under class. Any reference to tense is recorded under slot.

Slot

References to time, place, and relative prominence are included under slot. Once the class elements (events or states) have been determined, they are then placed in chronological order where possible. For some texts and/or some genres where chronology is either not recorded or cannot be reconstructed, the events are placed according to their location in space. For some texts neither location in time nor space can be determined.

Although relative prominence is a feature of Slot, it is noted under Class. For this study prominence will not be addressed since the analyst prefers to consider the top two cells (Slot and Class) as being more text related while the bottom two cells (Role and Cohesion) are more related to the larger context. According to Jones (1977), prominence or
judgments of nuclearity may be determined more by the reader's purpose than by purely textual concerns. Because of this, the analyst contends that it is inappropriate to include such reader related concerns under the more strictly textual orientation of Slot and Class.

Role

The next step is to determine the role for each event/state. Pike and Pike describe the role as "the purpose or reason for the occurrence of that event." In analyzing role, "Purpose takes precedence over reason and is introduced by to, whereas reason is introduced by because" (p. 37). It is interesting to note Pike's (1977) earlier observation that

The addition of purpose [role] as such a feature...has been a crucial turning point in the development of this approach. It allows a hierarchy of purposes (with subgoals to help reach main goals) to lead to the representation of conceptual movements within the referential system; it allows an event sequence as a whole to be called a single vector moving from one point to another to achieve a purpose, as deduced by the analyst, and as being so viewed by the actors involved. (p. 349)

At this point in the analysis there is a chart with three columns. The first column contains the referential Slot and includes the spatiotemporal references found in the text. The second column contains the referential Class of events (or states) which are also found in the text. The
third column contains the referential Role (purpose or reason) which may or may not actually be found in the text itself, but is often deduced by the reader (or analyst) and thus may differ from reader to reader.

When role is deduced by the reader it appears in square brackets. Pike and Pike (1983) contend regarding what they include in brackets that "if their deduction is wrong, to that extent they have misunderstood" either the author or the real world events described (p. 41). If one accepts Smith's (1978) view of reading that the meaning of the text resides in the reader and not in the text itself then one would be forced to reject Pike's view that analysts are wrong to the extent they have misunderstood the author's intent. The assumption follows that to the extent that Role and Cohesion for a given text differ from reader to reader, to that extent the text becomes something different.

Cohesion

The fourth column contains the referential Cohesion. According to K. Pike (1981) "We specify in these cells factors of background situations, background beliefs, implicit assumptions, attitudes, and truth-versus-falsehood" (p. 57). Almost without exception, the cohesion cell was deduced by the analyst.

There was a slight difference in the way cohesion was analyzed for the two topics. Since the students were told
to "use their five senses" in writing the leaves texts, this was taken into account in the analysis so that although there may have been a number of different ways of measuring cohesion, the analyst chose to look specifically for references to the senses.

**Multivariate Analysis**

Once the twenty texts had been analyzed for the dependent variables of Slot, Class, Role, and Cohesion in terms of Pike and Pike's referential hierarchy, scores were then calculated for Slot, Role, and Cohesion. The number of events/states found under Class for each text was the basis for computing the proportion scores for the other three dependent variables. The proportion scores were then transformed using an arcsign transformation. A two by two MANOVA was then computed based on the transformed scores for the independent variables of topic (fall and leaves) and quality (high and low, as determined by trained raters using the criteria in Appendix A) and the three dependent variables of Slot, Role, and Cohesion.

**Summary**

In this chapter, the methods of evaluation and analysis used in the study were outlined. First, fifty pairs of texts were evaluated by three naive graders and also by two linguists who were trained as evaluators. A total of twenty
texts were then analyzed using Pike and Pike's referential hierarchy. Finally, a multivariate analysis was done to determine which of the dependent variables of Slot, Role, and Cohesion were significant in determining quality and topic for these texts.

Throughout this study the focus was on the holistic nature of the texts as a means of communication between human individuals with their backgrounds and experiences. As White (1984) has so aptly observed:

Holisticism says that the human spirit and its most significant form of expression (writing) must be seen and understood not in parts, but as a whole, face to face as it were, almost sacramentally. Even the meanest bit of halting prose, even the most down-trodden of our fellow creatures, deserves to be taken as a living and vital unit of meaning, an artistic and human whole, not merely as a collection of scraps and parts. (White, 1984, p. 409)
CHAPTER IV

FINDINGS AND OBSERVATIONS

The purpose of this study was to examine descriptive texts produced by college students in order to determine the differences between high- and low-coherence texts. In this chapter, the findings are presented as they relate to this purpose and to the research questions. First the comparison of the holistic quality of each pair of texts on the two topics, fall and leaves, is discussed. Then the results of the holistic evaluation of coherence of all the texts is given. Next the analysis of Pike's four-cell tagmeme for the referential hierarchy is presented for twenty of the texts. Finally, observations are made regarding the features from the four-cell tagmeme found to be significant for quality and topic.

General versus Specific Texts

For this study the students were first asked to write a descriptive paragraph on the very general topic of fall. Then, after a presentation on the use of the five senses, the same students were given a packet of leaves and asked to write a paragraph describing these specific objects.
This section seeks to answer Research Question 1: Of each pair of texts generated by a given author, which is preferred by readers?

As stated earlier, psychologists, as well as composition teachers, have discussed the importance of sensory impressions. This would lead one to believe that encouraging students to use their five senses and providing actual specific objects would result in a better textual product. For this study, however, just the opposite was found to be true. One of the naive readers consistently chose the fall texts over the leaves texts rather indiscriminately, merely dismissing the latter with the observation that they were "boring." This individual chose the fall texts 96% of the time. The second reader chose the fall texts 86% of the time, while the third reader chose the fall texts only 58% of the time. Such disparate responses resulted in an interrater reliability of only 52% and therefore these responses were not used.

Instead, scores from the two trained evaluators were used for the following statistical analysis. These two linguists did a holistic (or primary trait) evaluation of coherence on each of the texts in this study using an adapted four point scale. The two grades for each text were then summed and the sums for each pair were examined as to whether the relative score on the leaves text was higher, lower, or the same as the score on the fall text. Of the
fifty pairs of texts, in thirty three instances (or 66% of the total pairs) the fall texts were more coherent than the leaves texts; in nine instances (or 18% of the total pairs) the fall texts were judged less coherent than the leaves texts; while in eight instances (or 16% of the total pairs) the grade remained the same. Results from both the naive readers and the trained evaluators showed a preference for the fall texts.

A repeated-measures design was employed in which each of the fifty subjects received two treatments. The results of the ANOVA are shown in Table 1.

Table 1
Comparison of Pairs of Texts by Same Author

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<td>22.09</td>
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With 1 and 49 degrees of freedom, the $F$ value of 23.75 is significant at the .001 level. These results indicate that there is a significant difference between those texts on the
topic of fall and those on leaves, with the holistic quality going down on the latter.

Holistic Grading

This section seeks to answer Research Question 2: Which texts are rated high- and low-coherence by trained evaluators?

Two linguists were trained to do the holistic evaluation for this study. Once they had developed what White (1985) terms a "community of assent" using sample texts, they discussed Bamberg's rubric and, after gaining permission from the analyst, they adapted Bamberg's four point scale to a seven point scale. The graders' decision to adapt the scale was quite appropriate in that White (1985) states that "readers must have the opportunity...even to make changes in the scoring guide if they agree to do so" (p. 164). Once these decisions had been agreed upon, they graded the actual texts using Bamberg's rubric. Results of this holistic scoring, or more appropriately "primary trait" scoring since it was looking specifically at coherence, are presented in Table 2.
Table 2

Holistic Scores

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<tr>
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<th>Score 2</th>
<th>Sum</th>
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<th>Score 2</th>
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Scores in this table were interpreted in light of White’s (1984) criteria. According to him, once the two evaluators have scored each text, “The two scores should be added together to create a full-range distribution of scores. A one-point difference is allowable...An excellent reading on a six-point scale will have 5% or fewer discrepant scores; an average reading will have 7-10% of its scores more than one point apart” (p. 405).

For this study, the interrater reliability was computed separately for the fall texts and for the leaves texts. For the fall texts 50% of the scores were identical; 50% were one point apart on a seven point scale, (or one half point

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</tbody>
</table>
apart on a four point scale); and no scores differed by more than one point. According to White's criteria, this gives 100% reliability for the fall texts.

For the leaves texts 28% of the scores were identical; 66% differed by one point on a seven point scale; and 6% differed by two points. It is interesting to note that both graders stated that they found the leaves texts more difficult to grade than were the fall texts. Customarily, the texts which differed by two points would have been read by a third evaluator; however, since the reliability was 94% on these texts even without a third evaluator, and according to White this is between an average and an excellent reading, it was decided to dispense with the third reading. Interrater reliability for both sets of texts is found in Table 3.

Table 3

Interrater Reliability for Holistic Grading

<table>
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<tr>
<th>Difference</th>
<th>Fall</th>
<th>Leaves</th>
</tr>
</thead>
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<td>28%</td>
</tr>
<tr>
<td>1</td>
<td>50</td>
<td>66</td>
</tr>
<tr>
<td>2</td>
<td>0</td>
<td>6</td>
</tr>
</tbody>
</table>
Although this reading seems to have been well within the accepted range of reliability, it is worthwhile to recall White’s (1984) observation that “statisticians have reached no agreement about ways to measure comparative reliability of readings” (p. 405).

Four-Cell Tagmeme

Within Pike’s theory of tagmemics, a linguistic unit is described by four cells: (a) Slot, (b) Class, (c) Role, and (d) Cohesion (note the explanation regarding each of these cells in Chapter 3). Each of the twenty texts was analyzed in terms of Pike and Pike’s referential hierarchy for these four cells. The analyzed texts are found in Appendix D. The actual scores for this analysis are shown in Table 4.
Table 4

**Actual Scores for Four-Cell Analysis**

<table>
<thead>
<tr>
<th>Slot</th>
<th>Text</th>
<th>Time</th>
<th>Location</th>
<th>Class</th>
<th>Role</th>
<th>Cohesion</th>
</tr>
</thead>
<tbody>
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<td>1</td>
<td>11</td>
<td>6</td>
<td>7</td>
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<td>111</td>
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<td></td>
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<td>232</td>
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<td>1</td>
<td>25</td>
<td>8</td>
<td>11</td>
</tr>
<tr>
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<td>9</td>
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<td>6</td>
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<td>7</td>
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<tr>
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<td>137</td>
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<td></td>
<td>212</td>
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<td>8</td>
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<tr>
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<td></td>
<td>12</td>
<td>5</td>
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</tr>
<tr>
<td></td>
<td>311</td>
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<tr>
<td>Low Leaves</td>
<td>319</td>
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<td>458</td>
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</table>
This section seeks to answer Research Question 3: In what ways do writers incorporate a slot or wave view?

Within a text, the referential Slot shows the location in time and/or space in which the events listed under Class took place. Also included under Slot is the relative prominence of each Event in its larger context; however, notations of nuclearity versus marginality appear under Class in the analyzed texts shown in Appendix 4 for reasons stated earlier.

Time. Regarding temporal references, there is a tendency for the better texts to keep a chronology moving through the text and to include references to at least three if not all four seasons. An interesting example is found in text #232 where we find "previous falls," "summer," "fall," and "winter" all explicitly mentioned in the text. In fact, sentence 4 of this text serves as a transition between a personal description and a factual description: "These colors seem to be a last glow before the green of summer fades into the black and white scheme of winter." Here we see what seems to be a very deliberate attempt on the part of the author to make the time framework explicit by fitting fall into its immediately preceding and succeeding context.

On the other hand, two of the low-coherence texts show no spatiotemporal reference whatsoever. Others such as #137
and #458 mention only the season of fall. In text #137 the last part of the final sentence "of life gradually preparing to sleep" may be a veiled reference to winter, but it is not explicit enough to state unequivocally. These are extreme examples, but show the kinds of differences found between the two sets of texts. The presence or absence of temporal reference is an important factor differentiating high- and low-coherence texts.

**Location.** In examining more closely the actual scores in Table 4, it can be noted that both the high- and low-coherence fall texts had an equal number of references to location, that is, only two of the high-coherence texts (#101 & #232) and two of the low-coherence texts (#121 & #125) had references to location; however, as the statesman, Henry Clay has been quoted as saying, "Statistics are no substitute for judgment." In examining the references to location in the high-coherence texts one finds location clearly stated early in the text (in the first or second sentence). On the other hand, note the low-coherence text #121 where in the title we are given the vague location "I [sic] least where I come from" and we are not told until next to the last sentence that the location is probably Indiana. Even then it is not clear that Indiana is the location for the whole text. So there is a qualitative difference in the way locations are stated which is not
reflected in the statistics. As will be discussed below, the leaves texts did not include any references to higher level geographic locations.

Since the focus of this study is the higher level features which are evident in coherent texts, only higher level or geographic locations have been noted above, thus locations such as sitting "around the crackling fire" (text #101) or raking the leaves "into a big pile" (text #301) were not considered to be locations on this level.

In the leaves texts, there are no references to higher level locations in either the high- or low-coherence texts. In a text such as #301, we find the leaves on the tree and then on the ground. It may be that such lower level locations may have to suffice; however, for this study it was decided that since only geographical locations were included under Slot for the fall texts, the same should hold true for the leaves texts with the result that no locations were found for the latter.

Class

This section seeks to answer Research Question 4: In what ways do writers incorporate a class or particle view?

Class contains the substance of reference, that is, the events/states which are described in the text. Because it is the most substantive of the four cells, it was used to calculate the proportion scores for the other cells. In
the referential hierarchy references to class are always in the present tense. Since class was the base from which proportion scores were computed, it has no proportion score itself and no transformations were involved. As a result, discussions of Class will incorporate actual number of references to events/states from Table 4.

There is one item of special interest here. It would be expected based on findings from other studies (e.g. Witte and Faigley, 1981) that high quality texts would tend to be longer while poor quality texts would tend to be shorter. This, in fact, was what happened in the fall texts which showed a mean of 13 events/states in high-coherence texts as opposed to a mean of 8.2 events/states in low-coherence texts. This, however, was not the case with the leaves texts where the low-coherence texts (M=9.6) were slightly longer than the high-coherence texts (M=9.4). Although the difference was not large it is still of interest because it is contrary to expectations.

**Role**

This section seeks to answer Research Question 5: In what ways do writers incorporate a role or pragmatic view?

Role contains the purpose or reason for each event/state listed under Class. Authors supplied an average of 5.3 reason/purposes for the high-coherence texts as opposed to only 1.8 for the low-coherence texts. In terms of quality,
Role was much easier to analyze in the high-coherence texts than in the low-coherence texts. In the latter one finds that spelling and/or grammar can make the assignment of purpose or reason rather difficult. For example, Text #444 states "Their intricate shapes with never on exactly the same, could only be formed by nature." One must first determine what possible meanings the writer might have had in mind and then based on that guess, determine what the role might be. Similarly, spelling problems can so obscure the meaning that it is very difficult to determine the role. For example in Text #319 we find, "The simbol type tinker of leaves rubbing against leaves is dull, but still orchestra a synthphony that is nice to here."

Another problem encountered in the analysis of Role was the need to form a dichotomy from what may more properly be thought of as a continuum. Each item under Role was marked as being either in the text or supplied by the analyst. In reality it was very difficult to make Role type assignments which necessitated a choice between only two options. It may have been more useful to borrow at least a three-way option such as that proposed by Pearson and Johnson (1978) who suggest that information can be "textually explicit," "textually implicit," or "scriptally implicit."

Another concern when dealing with Role is the possibility of different perspectives. These are allowed and often even encouraged by Pike; however, they can result
in a less than elegant analysis. As an example, when stating a reason for why leaves change color, does one use the popular reason that it depends on cool temperatures or an explanation such as the following by Brackman (1987)?

When the daylight hours shorten and temperatures begin to drop, a layer of tissue begins to form at the base of the leaf petiole. This abscission layer eventually cuts off all nutrition to the leaf, ceasing the production of chlorophyll. The existing chlorophyll in the leaf begins to break down and unmasks other pigments which provide the autumn leaf color....Yellows and oranges are caused by the presence of two different pigments—xanthophyll and carotin....Another pigment, anthocyanin, results in red and purple leaf colors. (p. 34-35)

Other reasons can be given for why leaves change color such as "it's because of the variety of the tree" or "God/nature made them that way." Any of the above reasons would be acceptable under Role, but could lead to a lack of agreement between various analysts.

Cohesion

This section seeks to answer Research Question 6: In what ways do writers incorporate a cohesion or field view? Cohesion contains the sociocultural background which places the text in a larger perspective. Typical types of cohesion which were found in more than one text included the following. For the high-coherence fall texts: 22 instances in cohesion with nature; 9 instances with author evaluation; 5 instances with typical human activity. For the low-
coherence fall texts: 11 instances in cohesion with nature; 5 instances with author evaluation. For the high-coherence leaves texts: 12 instances in cohesion with sight; 5 instances with smell; 8 instances with touch; 8 instances with personification; 6 instances with nature; 5 instances with author evaluation. For the low-coherence leaves text: 27 instances in cohesion with sight; 10 instances with touch; 5 instances with smell. There seems to be a tendency for the high-coherence texts to have a wide variety of items under cohesion, while the low-coherence texts seem to be more limited.

In terms of cohesion, it may be worthwhile to examine one text in more detail. The author of Text #125 chose to write about fall on the beach in Southern California. There is something jarring about this topic—even to someone from Southern California, since for most of us, our schema for fall does not include beaches and surfing.

Significance of Tagmemic Analysis

This section seeks to answer Research Question 7: What features from the referential hierarchy contribute to textual coherence?

The basic research design for this part of the study was a two by two design which was used to investigate the interaction between topic (fall and leaves) and quality (high and low) for the twenty texts chosen for this more
detailed analysis. The purpose for this was to gain a better understanding of the interrelationship of the complex factors involved in composing a coherent text. Textual coherence at this point was measured by trained evaluators, not the general reading public.

Proportion scores were calculated for the dependent measures used in this study: the three cells of Slot, Role, and Cohesion. To obtain the percentage values for Slot, the total number of references to time and location for each text was divided by the total number of event/states under Class for that text. Class, the second cell, which contains the basic event/state, is not shown since it was the value used to calculate the other three proportion scores for each text. Scores for Role were obtained by dividing the number of times the author of the text supplied a purpose/reason by the total number of event/states for that text. Cohesion scores were obtained by counting the number of separate topics (i.e., separate entries in the Cohesion column) in a given text and dividing that number by the total number of event/states for that text. Table 5 shows the non-transformed proportion scores for Slot, Role, and Cohesion for each of the high- and low-coherence texts on the two topics used in this study.
Table 5

Non-transformed Proportion Scores for Four-Cell Analysis

<table>
<thead>
<tr>
<th>Text</th>
<th>Slot</th>
<th>Role</th>
<th>Cohesion</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>High Fall</td>
<td></td>
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<td>.55</td>
<td>.64</td>
</tr>
<tr>
<td>111</td>
<td>.71</td>
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<td>.43</td>
</tr>
<tr>
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<td>.28</td>
<td>.32</td>
<td>.44</td>
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<td>.38</td>
</tr>
</tbody>
</table>

An arcsine transformation was used to accommodate for the use of proportion scores. The transformed proportion scores used for this analysis are shown in Table 6.
Table 6

Transformed Proportion Scores for Four-Cell Analysis

<table>
<thead>
<tr>
<th>Text</th>
<th>Slot</th>
<th>Role</th>
<th>Cohesion</th>
</tr>
</thead>
<tbody>
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</tr>
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</tr>
</tbody>
</table>

Means and standard deviations using the transformed scores are found in the following table.
Table 7

Group Means and Standard Deviations of Transformed Scores

<table>
<thead>
<tr>
<th>Quality</th>
<th>Slot</th>
<th>Role</th>
<th>Cohesion</th>
<th>Slot</th>
<th>Role</th>
<th>Cohesion</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>High</td>
<td>M</td>
<td>1.398</td>
<td>1.466</td>
<td>1.628</td>
<td>1.090</td>
<td>1.740</td>
</tr>
<tr>
<td></td>
<td>SD</td>
<td>.362</td>
<td>.270</td>
<td>.237</td>
<td>.307</td>
<td>.407</td>
</tr>
<tr>
<td>Low</td>
<td>M</td>
<td>1.176</td>
<td>.756</td>
<td>1.742</td>
<td>.514</td>
<td>.912</td>
</tr>
<tr>
<td></td>
<td>SD</td>
<td>.260</td>
<td>.530</td>
<td>.564</td>
<td>.477</td>
<td>.196</td>
</tr>
</tbody>
</table>

A two way MANOVA was performed, followed by univariate and discriminant analyses. These addressed the issue of variation across text topic and quality conditions. The MANOVA indicated a nonsignificant interaction effect for Quality x Topic, $F(3,14) = 1.235$, $p = .334$. However, significant main effects were found both for Quality, $F(3,14) = 6.374$, $p = .006$ and for Topic, $F(3,14) = 4.875$, $p = .016$.

Of the three dependent variables only Slot revealed significant main effects for both quality ($F = 6.124$, $p = .025$) and topic ($F = 9.048$, $p = .008$). Role proved to be significant for quality ($F = 21.179$, $p = .001$) but not for
topic ($F = 1.656, p = .217$). Cohesion was found to be nonsignificant for both quality and topic.

### Quality

For quality main effect the dependent variables of both Slot and Role were significant: For Slot $F(1,16) = 6.124, p = .025$, while for Role $F = 21.179, p = .001$. Cohesion remained nonsignificant $F = 1.39, p = .256$.

#### Slot

Slot is one of the major factors differentiating high- and low-coherence texts. Mean transformed proportion scores for slot were 1.244 for the high-coherence texts and .845 for the low-coherence texts. As seen above, this was significant at the $p = .025$ level.

#### Class

In terms of quality, the difference for Class (i.e., references to events/states) between high- and low-coherence texts showed means of 11.2 and 8.9 respectively. The shortest text was one sentence containing four events/states while the longest contained twenty-five events/states.

#### Role

Role contains the purpose or reason for the event/state found under Class. The qualitative difference between the
transformed high- and low-coherence scores for Role showed means of 1.603 and .834 respectively. The analysis of variance indicated role to be significant in differentiating quality.

Cohesion

Cohesion shows how the event/state fits into the larger cultural, logical, or natural context. Mean transformed proportion scores for cohesion were 1.737 for the high-coherence texts and 1.543 for the low-coherence texts. The analysis of variance indicated this to be nonsignificant.

Topic

For topic main effect only the dependent variable of Slot proved to be significant $F(1,16) = 11.450, p = .004$. Both Role and Cohesion proved to be nonsignificant: For Role $F = 1.656, p = .217$, while for Cohesion $F = .299, p = .592$.

Slot

Mean transformed proportion scores for slot were 1.287 for the fall texts and .802 for the leaves texts. The analysis of variance indicated this to be significant.
Class

The actual mean number of references to events/states for Class were 10.6 for fall texts and 9.5 for leaves texts. There was no significant difference for class between the two topics.

Role

Mean transformed proportion scores for Role were 1.111 for the fall texts and 1.326 for the leaves texts. Although Role was nonsignificant in differentiating topics, it is interesting to note that this is the only instance where the mean score was higher on the leaves texts than on the fall texts.

Cohesion

The mean transformed proportion scores for Cohesion were 1.685 for the fall texts and 1.595 for the leaves texts. As noted above, the nonsignificance found for Cohesion may indicate that a different method for quantifying the data could be more useful in clarifying coherence-related factors.

Summary

In this chapter the issue of specificity was examined for the fifty pairs of texts used in this study and it was found that contrary to common textbook instructions, the use
of specificity did not improve the coherence of the texts. In fact, the ANOVA showed a significant difference ($F(1,49) = 23.75, p = .001$) between the general and specific texts, with the holistic quality going down on the latter.

Next interrater reliability was examined for the holistic scores and found to be 100% for the fall texts and 94% for the leaves texts. This is well within an acceptable range.

The analysis of twenty of the texts was then described in terms of Pike and Pike's referential hierarchy.

Finally, the significance of Slot, Role, and Cohesion was examined for the independent variables of quality and topic. Slot was found to be significant in differentiating both quality ($F(1,16) = 6.124, p = .025$) and topic ($F(1,16) = 11.450, p = .004$). Role was significant only for quality ($F(1,16) = 21.179, p = .001$). Cohesion was found to be nonsignificant for either quality or topic. Class was discussed only in terms of actual number of events/states filling that column since it was the base number from which other scores were computed. These results suggest that the better texts have more spatiotemporal references which help to develop a real world context for the text, which in turn, leads to better coherence. Further implications will be presented in Chapter 5.
CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

For this study an attempt has been made to build a bridge between the disciplines of linguistics (text analysis) and composition (text production). The text analysis was done following the theoretical model of linguistics known as Tagmemics. This chapter will seek to summarize the findings from this analysis and to apply them to the teaching of composition.

Summary

Until relatively recently reading (text processing) and writing (text production) were seen as opposite processes with the former being considered to be passive and the latter active. This is no longer an accepted view, in that now both reading and writing are seen to be active processes. With this new perspective comes a shared interest in both text processing and production since they are seen to be similar processes. One means of gaining insights about texts is by examining them from the perspective of linguistics.

Until recently linguists have limited their focus to nothing higher than the sentence level. In fact some, such
as Gutwinski (1976), contend that a higher level focus is inappropriate. However, there are those in linguistics circles who are making giant strides in the study of textlinguistics (e.g., Enkvist, 1978; Grimes, 1975; Halliday and Hasan, 1976; Longacre, 1983). This current interest in textlinguistics, is beginning to catch the attention of those in other disciplines, especially those in writing theory.

In the field of writing there is a concept that is currently in the process of redefinition, that is, the concept of coherence. Although the term has been in use more than a century, there has not always been a clear definition of it. As recently as 1970, Winterowd misused the term in his classic work "The Grammar of Coherence," which he now admits should have been entitled "The Grammar of Cohesion." It was not until about a decade ago that coherence began to be separated from cohesion (Enkvist, 1978; Moe, 1979). Tierney and Mosenthal (1984) and Witte and Faigley, (1981) proved quite convincingly that coherence and cohesion are not one and the same. Cohesion is now thought of as being limited to textual features, while coherence is thought of as including those features which give unity and flow, not only within the text, but beyond it (Carrell, 1981; DeBeaugrande & Dressler, 1981; Phelps, 1985; Tierney & Mosenthal, 1983; Werth, 1984; Winterowd, 1985). There has been very little work thus far which has addressed
the issue of coherence as currently defined (e.g., Bamberg, 1983, 1984; Fahnestock, 1983; Marzano, 1983).

In the section above, we see that an interdisciplinary approach was employed which incorporated the fields of reading, writing, and linguistics. In the following section we will review the purpose of the study, the procedures which were followed, and some of the results.

**Purpose of the Study**

For this study descriptive texts written by college students were examined in order to identify the factors which differentiate quality (high- versus low-coherence texts) and topic (general versus specific texts). Sub-purposes included:

1. The comparison of holistic quality of texts on a general topic (fall) to those on a specific topic (leaves).
2. The holistic scoring of texts to distinguish between high- and low-coherence texts.
3. The identification of references to the real world in five each of the high- and low-coherence texts following the model developed by Pike and Pike (1983).
4. The comparison of evaluations of textual coherence to the authors’ inclusion of information from Pike and Pike’s referential hierarchy.
**Procedures**

A total of fifty students from two universities (The University of Texas at Arlington and North Texas State University) were asked to compose a descriptive paragraph on the topic of fall. They were then encouraged to use their five senses, were given leaves, and asked to compose a paragraph describing the leaves. The fifty pairs of texts thus elicited were then evaluated by three naive graders who were asked to state which of each pair of texts by the same author they preferred. The texts were also scored by two linguists who were trained as evaluators using the procedures set forth in White (1985). Five high- and five low-coherence texts on each of the two topics (a total of twenty texts) were then analyzed using Pike and Pike's (1983) referential hierarchy. A multivariate analysis was done to determine which of the dependent variables of Slot, Role, and Cohesion were significant in determining quality and topic for these texts.

**Results**

**Specificity**

The issue of specificity was examined for the fifty pairs of texts. The three naive readers achieved only 52% interrater reliability. It should be remembered that following Phelps (1985) the focus at this point is on the process of rating, not on the text as product. It seems as
though the process focus as it relates to coherence was borne out in the evaluations of these text pairs.

Because of the failure of the naive readers to achieve interrater reliability, their scores were not used. Instead the scores assigned by the trained evaluators were used. The findings showed that contrary to both the advice of experts and common pedagogical procedures, the use of specificity did not improve the coherence of the texts. The ANOVA showed a significant difference $(F(1,49) = 23.75, p = .001)$ between the general (fall) and specific (leaves) texts. In fact, the scores were lower on the specific texts where sensory input was incorporated. These results would suggest that coherence is not an entity contained solely within the texts, but includes factors imputed to the texts by the readers because of their varying backgrounds and training. While coherence was not achieved without reference to the texts, neither was it found exclusively within the texts.

**Holistic Scoring**

Two linguists were trained as evaluators. The interrater reliability of the holistic scores as assigned by these two trained raters was 100% for the fall texts and 94% for the leaves texts. This is well within an acceptable range.
Referential Hierarchy. Twenty of the texts were analyzed in terms of Pike and Pike's referential hierarchy. It may be instructive at this point to look in more detail at these twenty texts.

High-Coherence Fall Texts. According to Shaughnessy (1977), basic writers do not know how to move back and forth between various levels of specificity. She suggests that details in and of themselves are not important, but that what is needed is the ability on the part of a writer to vary the perspective from the general to the specific or vice versa. Two texts show outstanding examples of this. Text #232 describes the larger setting as "the mountains of Pennsylvania," then more specifically just one mountain "there, across the fog-cloaked valley, rose a giant of a mountain," and eventually we are given the very detailed information that "the young colts, so sure of their spindly legs now, trot around their paddocks as if getting plenty of leg-stretching." Here we see varying degrees of abstraction. Similarly, Text #248 begins with the "whole process of change" and leads us to the detail "the giggles of trick-or-treating children warm our hearts." A further example is found in text #254 where in a very nice case of parallelism on two levels we are first told that "people are everywhere" and then more specifically that "sweaters are everywhere."
The high-coherence texts are also distinguished by their focus on people, either through the use of personification or a description of actual people and their activities. The major theme of Text #101 is a feeling of nostalgia because of shared friendship/fellowship with people in the past. In Text #232 we see the author sitting and looking out the window. In Text #248 we see the giggling children who are trick-or-treating, as well as the personification of "the earth as she settles into winter." In Text #254 we are told explicitly that "people are everywhere," then that "autumn seems to send people outside," followed by references to football and lawn work which imply that there are people involved.

Text #111 is a high-coherence text even though it does not fall under the above categories. This text does not use many details, nor does it refer to people, it is nevertheless a well-constructed text because of the use of metaphor. The author no doubt assumes that since we all can experience sunset each day, and fall is similar to sunset, there is no need to clutter the text with unnecessary details. This is an excellent example of an author's taking the background knowledge of the expected audience into account in the construction of a text. In the above examples we have seen various levels of abstraction, incorporation of the human component, and the use of metaphor, all used as positive composition strategies.
Low-Coherence Fall Texts. There are no similar patterns in the low-coherence texts. In Text #121 we see the author walking in the woods, however, the picture becomes rather vague as to whether the Canadian geese, ducks, rabbits, and squirrels were part of the walk or part of a general memory of fall.

Text #125 is fascinating in that although there is a definite reference to people (both the author and his wife, the tourists, and an implied reference through the mention of football and outdoor sports), yet this was evaluated as being a low-coherence text. Part of the reason may be that for most of us the first thing that comes to mind regarding fall is not the condition of the beach. Another reason may be the use of head-tail linkage, for example, "The surf in California starts to pick up and all the tourists are off the beach. The beach is probably...." Although this is a feature widely used in other languages such as some of the languages of the Philippines, it is not widely used in English.

Text #137 is extremely short with only two sentences and these are quite vague in spite of their reference to sensory perception: "Fall is a breath taking sensation to experience. One is compelled to stop and consider the beauty and awesomeness of the sights; the fragrance of nature's odours; the sounds of movement, of life gradually preparing to sleep." A similar vagueness is found in text
where we are told that "All of the animals are climbing trees and dancing in the wind." The analyst has an irresistible flashback to the childhood nursery rhyme with accompanying illustrations of the cow jumping over the moon. With this background, it is not difficult to conjure the picture of a holstein dancing from the limbs of a tree. It is to be assumed that is not what the author of this text had in mind, however, it is a plausible interpretation from the actual words which were used. Text #212 also contains a number of vague, existential questions such as "Why do the leaves fall? Why is the wind much colder?" which do not seem to be a search for scientific answers.

Text #222 seems to be an attempt to make a play on words with the word fall. This attempt which could have been quite clever seems to fail, possibly because so much focus was placed on the form of the word fall that its related concepts could not be developed.

It is interesting to note that the low-coherence texts on both topics were much more difficult to analyze than were the high-coherence texts.

High-Coherence Leaves Texts. As was seen for the high-coherence fall texts, the high-coherence leaves texts showed a similar strong tendency towards personification. Text #301 expresses this personification through the tree's rejection of the leaves and the fact that now the leaves "long for a sense of belonging again" and "they try to exude
a rubbery earthy smell to entice the passer by." These all show intent on the part of inanimate objects.

In text #311 we also see personification through the use of well-chosen words which could refer to either leaves or people "They are tired with seamed, leathery faces...They have lived their lives well, gathering and processing food for later generations."

Text #448 has an implied personification through the use of terms more usually applied to people, but here applied to leaves "They may be old and wrinkled with veinous skins, or supple and vibrant with smooth skins." It is not a normal collocation to find the surface of leaves referred to as "skins."

Reference to the mortality of both leaves and people helps to tie several of the texts together, for example, see Text #311 where we are told regarding the leaves: "They are tired with seamed, leathery faces from a lifetime of enduring sun and wind. Some are yellow with age, some brown and bent. They have lived their lives well, gathering and processing food for later generations. But now they are tired and have gently fallen to a bed of well deserved rest." We do not usually think of leaves as being "tired" or having "faces" or engaging in purposeful behavior such as "processing food for later generations." All of these references may secondarily apply to leaves, but primarily may be considered to refer to people. According to Pike, it
is possible to have dual cohesion in a text. Such dual cohesion is found in the above text through the use of figurative language since the events are in cohesion with both the world of nature and with the world of human concerns.

A similar use of metaphor is found in Text #404 where we are told "The leaves of fall are symbolic of death" and in Text #442 which states that "Fall leaves are useful...for reminding us of the changes in life. They are like a signal to get ready because we are all mortal. Fall leaves remind me of old people who are sweet and gentle and full of wisdom." We are later told in text #448 that "They live short but colorful lives; like falling stars, they brighten the earth briefly and are swept away" which is no doubt a reference to the mortality not only of leaves, but also of humans. The same type of dual reference can also be seen in Buscaglia's (1982) popular book and film, The fall of Freddie the Leaf, which many individuals see as a commentary on human life and death.

In the above texts, we have seen two major features which distinguish high-coherence leaves texts. The first of these is the same as was seen in the high-coherence fall texts, that is the use of personification or reference to persons. A second feature, possibly related to that human focus, is the use of leaves to make a statement about human mortality.
Low-Coherence Leaves Texts. The low-coherence leaves texts were quite detailed in their descriptions, however, as expected based on Shaughnessy (1977), they do not move through various levels of abstraction, but stay at lower levels. Text #319 is extremely detailed but the detail is not placed within a larger context so there is little reason for those details which are given. A further problem with this text is the difficulties its author had with spelling and grammar. Text #337 likewise focuses on details, here the detail of color, without explaining why these details are important. Texts #444 and #458 similarly focus on what the leaves look like without reference to any other levels of abstraction.

Text #436 is of special interest in that the promise in the first sentence is that this is going to be about color and shape, however, the rest of that paragraph contains more references to touch than to color and shape. Furthermore, the format says that this may not be a paragraph, but merely ideas that have been jotted down. If so, this may be an example of what Jensen and DiTiberio (1984) have described regarding writing style being closely related to psychological preferences. The author of text #436 may be one of those who begins with the smaller details and then, with every revision, adds more of the larger structure.
Statistical Significance

The significance of Slot, Role, and Cohesion was examined for the independent variables of quality and topic. Slot was found to be significant in differentiating both quality ($F(1,16) = 6.124, p = .025$) and topic ($F(1,16) = 11.450, p = .004$). Role was significant only for quality ($F(1,16) = 21.179, p = .001$). Cohesion was found to be nonsignificant for either quality or topic. Class was discussed only in terms of actual number of events/states filling that column since it was the base number from which other scores were computed.

Conclusions

While recognizing the limitations stated earlier in this study, (i.e., the focus on text as product and reader response as process; the choice of tagmemics as the theoretical model; and the use of descriptive texts), a number of observations can be made.

Specificity

The results of this study have reinforced Shaughnessy's observation that an author must be able to move readily between levels of abstraction. Related to this, encouraging students to use their five senses in order to improve the quality of their writing did not prove viable, partly
because for many of them, this merely kept their writing at a lower level of abstraction.

Part of the reason for the lack of success with a sensory approach to writing pedagogy may be the differentiation between what Adelstein and Pival term "Personal Description" versus "Factual Description." The former they describe as being organized logically by "space, time, or both," while the latter is usually organized spatially. Regarding style, they suggest that for the former "Details are essential," while for the latter, there is "No need to attract reader interest." The tone of the former is personal, expressing feeling, while the latter is "Factual, serious, formal" (p. 111-12). If one accepts this dichotomy, then the fall texts would, for the most part, be personal descriptions, while the leaves texts would be factual descriptions. In actual fact, the better of the leaves texts did not incorporate factual description, but evidenced a heavy tendency toward personification with more of the writer's feelings expressed. This tends to support the fact that these are two different types of texts.

Another reason for the difference between the leaves texts and the fall texts may be a pragmatic one related to author purpose/perspective. Grimes (1975), for instance, has observed that

Description and characterization are well known factors of literary composition; they illustrate how the speaker, in addition to telling what
happened, may want the hearer to associate further attitudes or visual images with the things he distinguishes. The level of detail that is managed here is completely under the speaker's control in the sense that it does not depend merely on the hearer's ability to distinguish one referent from another. The speaker may go to any lengths he likes to build up detail, color, and spice in what he says. (p. 176)

This is similar to Pike's view that "Different people who report an event and feel differently about it may show differences in the way they tell the story" (1981, p. 54). Pike treats these observer differences as part of the referential hierarchy.

Holistic Scoring

The use of holistic scoring done by trained raters proved to be feasible. Attempts at holistic scoring by naive readers, however, were not useful.

Referential Hierarchy

The analysis of the referential hierarchy revealed various factors which contribute to the differences between high- and low-coherence texts on both of the topics used in this study. Use of reference to persons or personification is probably the most distinguishing factor of high-coherence texts. Related to this is the use of objects as metaphor to explain the human condition. The use of metaphor is no
doubt effective because it serves to expand the referential cohesion of a text.

On the other hand, the low-coherence texts are distinguished by a certain vagueness. Analyzing either Role or Cohesion for these texts involves a great deal of uncertainty, since the authors have not supplied enough purpose or context. For instance, the low-coherence leaves texts contained a great deal of detail, however, this detail was not placed in a larger context so it was up to the reader or analyst to decide why these particular details were incorporated.

Statistical Significance

These results suggest that the better texts have more spatiotemporal references which help to develop a real world context for the text, which in turn, leads to better coherence. They also suggest that better texts give more purposes/reasons for the statements made under Class.

Referential Slot seems to be the most significant factor which enables a reader to picture the scene or as Pike and Pike (1983) suggest "If these events were historical they could have been photographed, or if imaginary could have been drawn" (p. 6).

Referential Role helps a reader to understand the purpose/reason why an author chose a certain perspective for focus or prominence.
Implications

The evaluation of preference between the repeated measures (i.e., for each pair of texts by the same author) needs to be examined further. Requiring a preference between matched pairs obscured the fact that in some instances both texts by a given author were equally high in coherence. It is worthwhile to note that, based on the holistic evaluation by trained raters, of the high-coherence texts, three on both topics were by the same authors. Scores for these pairs of texts by the same authors were as follows:

Text #101 Score 8.5 Text #301 Score 8.5
 #111  8  #311  8.5
 #248  8.5  #448  7.5

For this study the focus was on texts, not authors, however it is interesting to note that while three of the authors had high-coherence scores on both topics, the author of the highest scoring text of all (text # 232) did not do comparable work on the second topic, but went from a score of 9 on the fall text to a score of 6.5 on the leaves text. Although some authors did comparable work on both topics, a high score on one text did not ensure a high score on the other.

It may be that one of the reasons that many of the leaves texts did not show clear spaciotemporal references was that the analyst was the one who had given the authors
the leaves. Because of this the authors may have assumed that the analyst was also their audience and it would have been redundant to specify such things as time, location, and just which leaves were being described.

The importance of the author's context and audience may be seen in the work of Graves and Hansen (1984). It may be that one reason for the success of what they refer to as the "author's chair" is the immediate chance for reader response that this provides for an author. One student author is chosen to sit in the author's chair while the other students are encouraged to ask questions about the text that author has composed. Based on the questions asked, the author has an opportunity to realize vague areas that need to be explained further for his/her audience. Similarly, the use of dialogue journals provides authors with very concrete response from their readers and a chance to clarify their original intentions regarding the text.

Another interesting factor which emerged from these texts was that fall was seen by almost all the authors as being a positive thing. This may be a culturally determined phenomenon. During the pilot study for this research, only one text expressed negative reactions to the season of fall. That text described fall as being "cold and dreary," and was from an international student. For this current study, one author did question why she liked fall so well after she had just listed some rather uncomplimentary features of the
season, however, the norm is that fall is seen to be a "favorite season."

Recommendations

Methodological Recommendations

If this study were to be replicated it might be wise to train the "naive" readers in the same manner as the evaluators in order to achieve greater interrater reliability.

Although the texts used in this study were descriptive in nature, similar work needs to be done for other genres. Pike and Pike (1983), and Howland (1981) have applied the study of the referential hierarchy to narrative texts. E. Pike (personal communication) is currently working on an analysis of hortatory texts using the referential hierarchy. Much more work needs to be done on a variety of text types.

Further work is also needed to see if the findings of this current study are generalizable to other languages. It should be noted that Howland made major changes in her conceptualization of the referential hierarchy when she applied it to the Carib language of Central America.

Based on Werth's (1984) view that coherence should be thought of as a cover term which includes the three sub-areas of cohesion, collocations, and connectors, one would suppose that it would be profitable in further research to
examine not only the referential hierarchy, but the grammatical hierarchy as well.

**Slot.** E. Pike (personal communication) is currently refining the kind of time under Slot to accommodate possible future time such as is found in Text #301 where we are told that "Perhaps some children will gather them together into a big pile and jump into their midst with cries of delight" and "Perhaps someone will put them into a big pile and set them on fire." These events are hoped for, but their realization may be thwarted. Contrast this with a text such as #111 which states regarding the similarities between fall and sunset that "Color flares briefly and then recedes to rest and wait for a fresh burst of life in the spring like a new dawn." There is a much greater degree of certainty that these latter events will actually come to pass than there is that some children will play in the particular leaves described in text #301. These different types of time may need to be accounted for in the analysis.

Further work is also needed to examine the phenomenon found in this study that the leaves texts (probably what Adelstein and Pival would term "factual description") did not have any temporal references and only lower level spatial references.

**Class.** It may be instructive to compare events under Class with number of T-units or sentences or words per text
to see what differences, if any, exist between such measures.

Role. As mentioned earlier, it may be that rather than marking whether the purpose/reason is actually stated by an author or is implied by the analyst, it may be more useful to develop other categories such as that suggested by Pearson and Johnson (1978).

Cohesion. For this study an attempt has been made to quantify the results of a tagmemic analysis. This is a departure from traditional tagmemics, which is a form of descriptive linguistics, in which results are usually merely described with no attempt to quantify them. It may be too early in the development of the referential hierarchy to attempt to quantify a degree of Cohesion.

There may be a number of reasons that Cohesion failed to show a significant effect; however, a major reason may be that cohesion is a factor related to the society as a whole and should be measured by the amount of agreement between various readers/analysts. It is probably not a factor that can be measured quantitatively by any one person's reaction to a given text.

In terms of Role and Cohesion, it was impossible to keep the analysis exclusively at one level of the hierarchy. To the extent that the analyst has described different levels, this may support Stanovich's interactive compensatory model of reading and expand his theory beyond word attack skills
to apply to comprehension also. Further work in this area could provide a major contribution to the field.

One further observation should be made. Even though the student writers had been told not to be concerned with spelling and grammar but to focus on communication, Bamberg contends that problems in these areas can be detrimental to coherence, which in fact was found to be the case. Note, for example, the sentence from Text #119 which reads "The squares were gone, the bugs had dwindled to a bear handful." Some readers have assumed that the word squares was an attempt to write "squirrels," but this is impossible to ascertain with any degree of certainty. Because such vagueness detracts from coherence, if the study were to be replicated, subjects should be encouraged not to disregard spelling and grammatical concerns.

Pedagogical Recommendations

Regarding specificity, teaching procedures for descriptive texts should incorporate world knowledge instead of limiting the subject matter. This is especially true for adult learners since they bring a rich background of knowledge and experiences to the writing situation.

Rather than emphasizing the use of the five senses, teaching procedures should show the students how to move through various levels of abstraction, whether or not these levels include sensory detail.
Regarding the referential hierarchy, students should be encouraged to locate their texts in both time and space in order to develop an adequate context for their readers. They should also be encouraged to include purposes and reasons for the statements they make about events or states. Furthermore, students should be encouraged, where appropriate, to include a focus on humans and their activities. Such a focus on people can be either literal or figurative.

Concluding Thoughts

In spite of those who would suggest otherwise, extratextual concerns are an appropriate and viable domain for linguistic study. In light of current trends in reading theory and psychology, those features which are outside the text cannot and should not be ignored, especially if we are to learn more about text production and those factors which enhance coherence in text production.

Phelps has made a major contribution to what is known about coherence with her suggestion that texts should not be analyzed in terms of either process or product, but should be seen as both. In this study an attempt has been made to examine text production considering both the existing documents, and the process the reader or analyst may be going through to re-construct or re-create the meaning of the text.
A further focus of this study has been the attempt to apply Pike and Pike's referential hierarchy to an analysis of a genre previously unanalyzed in this model, that of description. The referential hierarchy, and the tagmemic theory of linguistics from which it comes, have been shown to be appropriate tools for the analysis of writing. As Pike has observed regarding the application of tagmemic theory to composition instruction:

If tagmemic formulas can help students learning to write expository prose in English, we regard that outcome as an incidental but appropriate outcome of the very different purpose for which they were developed: to provide a generally useful scheme for studying the structures of the languages of the world. (Pike, 1981, p. 64)
APPENDICES
APPENDIX A

MEASURES OF COHERENCE
APPENDIX A

Measures of Coherence

Essays meeting the following criteria will be rated "fully coherent" (4) on the four point holistic coherence rubric:
- writer identifies topic
- writer does not shift topics or digress
- writer orients the reader by describing the context or situation
- writer organizes details according to a discernible plan that is sustained throughout the essay
- writer skillfully uses cohesive ties such as lexical cohesion, conjunction, reference, etc. to link sentences and/or paragraphs together
- writer often concludes with a statement that gives the reader a definite sense of closure
- writer makes few or no grammatical and/or mechanical errors that interrupt the discourse flow or the reading process

Essays that are partially coherent (3) will meet enough of the criteria above so that a reader will be able to make at least a partial integration of the text.

Essays will be rated incoherent (2) when some of the following prevent a reader from integrating the text into a coherent whole:
- writer does not identify the topic and the reader would be unlikely to infer or guess the topic from the details provided
- writer shifts topics or digresses frequently from the topic
- writer assumes the reader shares his/her context and provides little or no orientation
- writer has no organizational plan in most of the text and frequently relies on listing
- writer uses few cohesive ties such as lexical cohesion, conjunction, reference, etc. to link sentences and/or paragraphs
- writer creates no sense of closure
- writer makes numerous mechanical and/or grammatical errors, resulting in interruption of the reading process and a rough or irregular discourse flow.

Essays receiving the lowest score (1) will be literally incomprehensible because of missing or misleading cues which prevent readers from making sense of the text.

(Bamberg, 1983, p. 428)
APPENDIX B

A FOUR-CELL REFERENTIAL EVENT TAGME
APPENDIX B

A four-cell referential event tagmeme

<table>
<thead>
<tr>
<th>Slot</th>
<th>Class</th>
</tr>
</thead>
<tbody>
<tr>
<td>Where the subevent occurred [in time or space]; as nuclear or marginal to the including event</td>
<td>What happened, emically defined as being members of a paraphrase set acceptable to the narrator</td>
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<thead>
<tr>
<th>Role</th>
<th>Cohesion</th>
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<tbody>
<tr>
<td>Why the actor performed the event—or the cause deduced by the narrator</td>
<td>How the event coheres with the underlying belief system of the narrator, or of the hearer as expected or reported of him by the narrator (or with truth as seen by the &quot;outside&quot; analyst in relation to some other frame of reference)</td>
</tr>
</tbody>
</table>

Adapted from Pike (1982, p. 101)
Fall brings feelings of nostalgia. Fall always meant weekend retreats to the Appalachian Mountains. The air smelled so fresh and crisp. The trees would be changing into such a variety of beautiful hues that one couldn’t help but get caught up in a feeling of happiness. Then there were times of just being together with special people at the retreat. We would all sit around the crackling fire mesmerized by the leaping flames in the big fireplace. Apples would be munched—it wouldn’t be a fall retreat without a big bowl of delicious red apples laying around. Hot apple cider with hints of cinnamon spiced up cool evenings and a table of homemade cookies sat to tempt everyone into fatness. Hikes through the woods brought everything together as God’s presence seemed so close. These memories were what helped us get through the hum-drum pace of life in the cities.

These leaves are making one more attempt to be noticed before they return to the dust of the earth. Their crisp crackliness is as if they were crying out to the person stepping on them. "Please notice me." They can no longer be sweet and fragrant, but they try to exude a rubbery earthy smell to entice the passer by to soak in their presence. These leaves seem to have a longing look. They have been rejected by the tree that held them for such a long time, and now they long for a sense of belonging again. Perhaps some children will gather them together into a big pile and jump into their midst with cries of delight. Then, they would be happy. Perhaps someone will put them into a big pile and set them on fire. Then they could produce a beautiful smoke-flavored fall aroma. Then, maybe someone would take notice of them one more time.
The time of year when the daylight hours begin to grow shorter and the temperature begins to decrease is the fall season. The flowers begin to wither and the leaves on trees and bushes take on a variety of colors before they fall to the ground, leaving the plants looking like skeletons. It is a time of anticipation; we anticipate the cold winter weather, wind, snow, and ice. It is a time of year for certain cultural activities such as school, football and preparing the house and family for the winter weather. Fall is a transition time from outdoor summer activities to more indoor winter activities.

The fall leaves before me are not appealing to the eye. The underside of the leaves are a pale green color. They feel rough as the veins of the leaves are evident as you run your finger over them. The topside of the leaves have a smooth, shimery surface but are a mixture of drab, brown colors. The leaves have no odor; no fragrant aroma to indicate the type of tree that they came from. They are limp, still retaining some moistness since they do not crinkle when you squeeze them in your hand. They would likely have no appeal to any animal that normally eats leaves as a part of its diet. These leaves before me are simply unappealing, in every sense of the word, compared with other leaves that I have examined.
Fall is perhaps the most beautiful season to me. I love the crisp cold on my face as I walk or sit on my balcony. The trees every day change colors and green turns to red, orange, brown and I see God’s master ability as a painter at work. The clouds make such beautiful shapes and the sky seems a deeper blue. The squirrels are so busy burying nuts and I love to watch them running around and carefully picking spots to dig holes and bury their treasure. As the leaves fall, suddenly I see the artistic shape of the branches that were there all the time but now lift their arms to God and throw beautiful shadows on the pavement. The blue jays are busy picking the acorns and pounding them vigorously on the branches to get the meaty nut for themselves and their raucous cries seem to warn others that this is "my" territory. How beautiful the geese look as they fly in "perfect" formation across the sky. I just love fall for now until winter comes and I’ll love all over again.

As I look at the leaves the colors draw my eyes. On each bunch of leaves the colors have a wide range of blending from greens up to red. On one stem the leaves were hanging on top of each other so even on one leaf were the pattern of the other leaf overlap and the colors on one leaf alone went from green to yellow and blending of red. The veins look like a flow of blood vessels twisting over the leaf. As I shake the leaves it sounds like little toes tapping lightly on the stairs. Maybe a tiny little elf running down the tree. There is a little sniff of dirt but perhaps it is just a little bug who left his imagination behind. The front of the leaf feels like velvet smoothed out on a bed but the back feels like little roads running in carefully planned order from the center highway out to the ends of the leaf. As I bite the leaf it tastes a bit like cardboard at first but I chew slowly and a new taste forms in my mouth. It tastes a little like mustard but with a slight bitterness in my mouth. I wonder how the worms enjoy it with so little flavor but I guess they don’t need salt and pepper or sugar as I do. Maybe I would be slender and active as they if this were my diet!
In Texas, fall is my favorite season. After the long, dry, hot summer the crisp, coolness of fall is a refreshing experience. In the morning I run around the house and open as many windows as I can to let in the delightfully cool air in the house. Even the birds and squirrels in our trees seem to be invigorated by the coolness. I enjoy walking out the front door and taking a deep breath of the crisp air. I even enjoy the endless task of sweeping the fallen leaves and acorns from the front walk. Fall in Texas is actually a drab season color wise. There aren't the deep reds and vibrant yellows mixed with the dark greens of pine needles but it still is my favorite season.

I hold four hard yellow green stems in my hand. The stems are pliable but firm. The green leaves on them are turning a dull brown but first turn yellow. All the colors are dull. The leaves once soft as they grew on the tree are on the way to their death. As the leaves change color they seem to loose their life until they become crisp, crunchable, dead things that can be blown from the tree by the hard wind or beating rain. Because all the leaves are from an ash tree (I think) they all have the same shape. Some are small and others are big. The bugs have eaten many meals from them and have left holes to prove they were here once.
Fall is one of the most beautiful times of year. Greens turn to reds, browns, yellows and oranges. The countryside is always filled with a blaze of color. Trees shed their leaves and blanket the hills so that hills and dales are laid to rest for winter's oncoming white. Clouds fill the sky and birds on their southward journeys fill the air. It's time to consider, nature is preparing for another new year.

Some long; some round; some whole; some broken. Some red; some green; some yellow; some orange. These are the shapes and colors of fall leaves. Nature never looks or smells much better. Fall is here and leaves change their color. One of the best times of year for leaf hunting. What beauty God has made even in a single created thing. Veins of red stretching like bolts of lightning out their middle. A little red, a little yellow, greens are turning all colors. That is the beauty of God's own creation.
Fall—the name was perhaps chosen because of the falling of leaves at this time of the year. But I think of the season rather as a gentle receding, a slowing down in preparation for the resting time to follow.

I love fall in the same way that I love the time each day just at, and after, sunset. It is a soft time of year, as sunset is a soft time of day. Color flares briefly and then recedes to rest and wait for a fresh burst of life in the spring like a new dawn.

Leaves

They are tired with seamed, leathery faces from a lifetime of enduring sun and wind. Some are yellow with age, some brown and bent. They have lived their lives well, gathering and processing food for later generations. But now they are tired and have gently fallen to a bed of well deserved rest.
Fall is a refreshing time of year. It's the season when the heat of summer fades away and the air becomes cool and crisp. There is also a freshness in the air as the first cold front moves through. Fall is also the season when the leaves change color and fills the whole creation with vivid hues of orange, red, purple and yellow. Fall is the time of year when I think about going to the mountains to enjoy the colors and the coolness of the air. It also makes me think of buying fresh apples and boiled peanuts when I'm in the mountains. Fall is the time of year when I most feel like going for a long hike. In short, Fall is a beautiful time of year.

The leaves are dry and different colors. They have a musty smell. They have a rough texture on some sides, but some sides are very smooth. They make a crackling noise when crused. The leaves have many veins on them. Some are brown, others yellow with green, and others mostly green with some dark spots and faint patches of yellow. Some bugs are on some leaves and one has an old cocoon or spider's web. The web is sticky. Aaagh! There's a spider under the web! The spider is small and lite brown and white. He has a fuzzy rear section. He doesn't move much, only when poked.
Fall is the time of year when the world is getting ready for its winter sleep. It is a beautiful time of year when the air is bright with sun but cool and invigorating. There are many delightful things to do in the fall such as going walking in a woods of maple, shuffling one’s feet through fallen leaves; having bonfires; going on hayrides & to football games. Fall is also a sad time when rains & wind knock the dead leaves to the ground and leaves the trees & plants bare and bereft. When fall is over its glow is turned to the stark beauty of winter.

The leaves are all quite dried out and brown. The maple leaf is most brown and a true brown and the others are brown on one side and pale green on the back. The brown is shaded from dark to lights with red tones. They don’t look like they’ve been dry for too long, though, since they’re not too broken up, although they are all slightly curled by the dryness.

There is 1 maple leaf and several with small leaves growing from a single stem. The stems are also brown and dried.
Fall in New York

Fall in New York is probably the most refreshing season. It comes along at the tail end of summer, just when you’re beginning to get tired of the hot muggy weather, and are longing for a change. I always look forward to seeing the changing colors of the leaves. There are usually about two weeks during the beginning of October when the leaves start turning from green to yellow, orange or red. Almost daily the colors deepen, and then the leaves start to fall to the ground. Some people just rake them into piles and dispose of them. Kids enjoy playing in the piles of leaves. I like to just let the leaves fall where they will and not do anything with them but enjoy the colors.

I never really thought about it before, but I guess you could say fall is the most distinctive of seasons. It has something special that sets it apart from the other seasons. It conjures up images of hayrides and apple cider; of seeing your breath in the cool, crisp air; of knowing that Thanksgiving and Christmas aren’t far off. If you want to experience fall in all its glory, take a trip to upstate New York in October, and feast your eyes on the beauty of God’s creation.

These fall leaves are not the kind I’m accustomed to but I’ll try to do them justice.

The biggest of the leaves looks like an upside down heart. It is green with flecks of yellow and brown; the brown is where it’s dying. The tip of the leaf is starting to curl down, and there are holes here and there on the surface of the leaf. It has a sturdy stem and a series of small veins running off of a central vein. The crisscrossing of these veins looks like hundreds of little cells. The leaf has a leathery feel and on the back you can feel the veins.

There are two other kinds of leaves in my collection. Three of them look like maple leaves, of varying sizes. One is green & brown, one a combination of green, brown & yellow & the other primarily brown. These leaves feel more like paper than leather; they’re thinner and smaller than the first leaf. They have three main points, the middle one being the tallest; and there is a series of dips & points in between the larger points (kind of like scallops).

The third set of leaves have several oval leaves attached to a central stem. One is yellow & green; the other two are green, yellow & mauve (purple). They’re unique.
The leaves crunched underneith my feet as I walked among the maples of hilly southern Ontario. The cool brisk breeze came of the lake and I sat on an old fallen stump to take in the scene. The colors and shapes are too much to articulate. As the leaves withered from lack of nutrients from their supplier, they turned fiery red, bright orange and soft warm yellow. The creaky arms which held them were a dull, mournful grey and brown. The geese flew over head making honking noises as they formed a shacky vee. The squares were gone, the bugs had dwindled to a bear handful. But on occasion if you got right down on your hands and knees and began to separate the carpet on the ground, you would find a multitude of living things preparing their cozy little homes that will soon be insulated by a blanket of snow. Yes, I took a deep breath as I thought of the closure that fall brings to a busy summer. All seems dead, but the anticipation of new life to come, brings hope and endurance. My breath wafts out of my mouth in a vague haze and disappeared about a foot away from my face. How much this is like our lives, here one moment gone the next. Oh for the spring of the soul to be born anew in the maples of hilly southern Ontario.

Some of the leaves were soft and leathery while others are a plastic stiff. Yet some are so crisp as crumble at the pressure of my fingers squeezing them into each other. The smell reminds me of so many fall days where the trees release in a final gasp, their life for the winter. The smell is often sweet like honey and spice, but more akin to the musty stagnated smell of a wasps nest that has be abandon for years and cracked open to be explored. The colors are a mixture of light brown fading ever so gradually into a dark moev (purplish) only to be separated by dusty green shade. Others are cheery lime green that have traces of yellow. The lines and shapes of the veins and stems run in all directions, but predominantly fan out from a central purposeful mode. The thickness of the channels diminishes as the once functioning hollows carried food to the more extended regions of the leaves. The intersection where various leaf attach to the mainstem, is a large (relative to the stem itself) knob or welt indicating an extra strength or security to keep them in place. The symbol type tinker of leaves rubbing against leaves is dull, but still orchestrate a symphony that is nice to hear.
121 Fall (I least where I come from)

In the fall, the leaves turn colors of orange, brown, red & yellow. I love to walk in the woods and see and hear the leaves all around. Fall is, also, cool weather. As I walk, the cold is felt on my toes, fingers and face. Fall is also, seeing Canadian geese and ducks in the sky going somewhere; rabbits and squirrels gathering food food winter before the snow. Speaking of snow, Sometimes the snow comes early to Indiana and the flakes start falling before the leaves fall off the trees. These things are what I remember about the fall.

321 Fall Leaves in Dallas

The leaves in the fall, at least in the city of Dallas, are just dead leaves. The green has been drained out of them and the surface has become a pale yellow. Or else the cool night air has attacked them and they have turned brown are a dull red hue. Mostly they look sick or beyond to dead. The texture of the leaves has remained soft and pliable and they don't smell of decay, but they're dead! Some people may tell you that the fall leaves are so pretty this year in Dallas, but all I see are bare trees are trees with dead leaves on them. I guess, when you don’t have any idea what fall in Indiana is like, you would appreciate the fall in Dallas. At least it is a break from the summer heat.
Fall, in Texas, is rather boring. Green becomes brown, then disappears altogether—(except on the little dwarfish mesquite trees.) Warm lingers too long, crisp is rather unusual. Hunting is restricted to the rich—those who own private property.

At home, in Virginia, in the Blue Ridge, fall is real. Vibrant colors, piles of leaves, cold mornings with warm afternoons, small trails of white smoke from isolated chimneys, guns, dogs, and hunting licenses bought and paid for—that is fall. Not drab, not the same, not boring. Frost, snow, firewood, sweaters and color—those are elements of fall. Real fall.

Like I said, from green to brown, with little in between. Boring. Summer hanging on refusing to die. Even the leaves, especially the leaves, illustrate it. They smell summery, you know, like the smell you notice when you trim your hedge. They don’t crumple or crackle or fall to pieces—they’re leathery; if you couldn’t see them you might think they were green & fresh. Granted, they rustle, but it’s a watered down rustling, not the good ole "I’m-about-to-fall-off-the-tree-so-goodbye-for-now" rustle, but rather a "I’m-a-leaf-so-I-have-to-rustle" rustle. As to taste, well, I’m not into leaf eating, so maybe we’ll go w/ 4 out of 5 senses. I bet they taste worse than Virginia leaves to a leaf conissouer. We’d have to ask a caterpillar. Fall here is lingering, reluctant death. Real fall is graceful, enthusiastic transformation, just look at the leaves.
Fall

Fall is the time to go back to school. For some of us, Ann and I, we have always been going back to school in the Fall. In Southern California, where we are from, Fall is a lot like summer but a little cooler. Fall is also a time for football and outdoor sports. The surf in California starts to pick up and all the tourist are off the beach. The beach is probably the prettiest at this time. It is free of clutter, the waves are bigger, and all the trash is picked up from the summer.

Fall leaves

These fall leaves look brown at first with green as the second main color. However, after looking more closely at them, I can see the different shades the leaf has turned between it's green to brown process of dying. There are reds, maroons, & yellows mixed into the brown & green of the leaves. Each leaf has it's own proportion of coloring. Some are more green others more brown.

These leaves must not have been dead to long because they don't break-up when I crunch them. Then don't even make much noise when crunching them. They don't smell very much either. I don't know what they smell like, maybe like fresh air, maybe like grass.
Fall is a special time of year for me. I enjoy the change in weather, from the warm summer to a cooler & crisp temperature. It is fun to wear sweaters and jackets and mittens. The trees in fall change color. The forests can go from different shades of green to various shades of greens, oranges, yellows, & browns. The leaves become more crisp and rough. They make a crunching sound when you step on them. In the fall, I enjoy having a fire in the fireplace and drinking hot chocolate. Fall also leads us into Thanksgiving and Christmas which are fun times of the year too. I enjoy fall and the change in the weather.

Fall leaves from Texas are very unusual. They make a rustling sound when you crumple them in your hands. Depending on the time that you gather them, they can be smooth & crinkly, or rough and crinkly. Their colors are bright green, yellows and maroons. Some have not arrived at their permanent fall color. The leaves are different shapes and sizes. There are large green & yellow leaves, medium size oval shaped green, yellow & maroon leaves; smaller round yellow & orange leaves. Possibly in New England the colors of leaves may be different from the leaves in Texas. The colors of Texas fall leaves are unusual, especially if you are from southern California.
I really enjoy the fall season. The cool air is so refreshing and the breezes that come so good to smell. In New England—my home—the leaves turn colors w/ the first frost. They are so beautiful w/ yellow, red, orange, green, and combinations thereof. To watch these leaves and to see them fall is a good way to spend a peaceful afternoon. It’s also fun to jump into a big pile of leaves that someone has raked. They smell like the earth and make you feel so close to nature and the way things began: I like fall best when it doesn’t rain alot. When it rains things get mushy and you can’t go out and enjoy the season. I really enjoy going to the mountains and finding a flowing stream and watching the leaves float on the water as well as in the air. And to hike up a mountain and see the tops of all those trees w/ all those colors—looking sort of like a bumpy multicolored carpet—it’s gorgeous.

Fall leaves are so unique. They show the passing of summer w/ the changing of color. Some red, some yellow, some orange, some still green while others are turning brown. The green ones are still supple. You can practically watch them change color—the yellow & brown seem to creep in from the edges. When the leaves are brown they start to dry out. They stay soft at first, but then they get dry and crumply. When they are dry, they will fall apart in your hands making this crackling, crunchy sort of noise. Sometimes when a lot of them are falling down from the tree you can hear them as they land and tumble along on top of other leaves that have already fallen. The leaves smell different when they are brown then when they are green. The brown ones smell more like dirt—kind of earthy. The green ones smell kinda like the grass or the fresh air that comes with the season.
Ah! The oppressive heat of summer is at last behind us! The air changes now from the still, simpering shimmering blanket heavily weighing upon the body and spirit to the bracing breeze laden with the scent of decaying leaves. The sky turns from its brassy, dust-and-pollution laden paleness to the sharp piercing blue that lifts the soul. The new odors and colors are only the forunners of things to come, however. The chill speaks of the ever-increasing/ever lengthening visits of the north wind. . .

I have before me a collection of leaves of various types of trees. Some have turned to gold, amber rust and brown, while a few including the big spade-shaped one still cling to their summer attire. But to me one of the most memorable things about leaves especially these fall leaves is the unique smell. The drier brown leaves don’t have as much odor as the green and yellow-red ones. The smell makes one think of outdoors, of raking leaves into piles, and jumping into them. It’s a “fresh” scent that has nothing to do with the so-called fresh scent of manufactured products. It is something akin to the smell of apples in a basket. The leaves are of all shapes and textures. Some are long and tapering like a pianist’s fingers, some are heart shaped, cluster’s about a stem. Most show evidence of the attacks of various insects. . .
Fall is cool. This is nice when you work in an unairconditioned warehouse. In the summer you work until the stomach cramps hit, & then you know it's the water fountain or the hospital, regardless of supervisory disapproval. But the fall is mellow. Little sweat, little stress, & more money with the Christmas rush! Unfortunately, "the fall" & "the comprehensive examination" are mutually inclusive. Even the best of times are the worst of times.

Leaves are boring. They're allright on trees, & provide some summer shade. But in the fall they fall, & sit there, in the glorious greens & browns & yellows & oranges & reds, wet on the bottom & a fire hazard on top, having to be raked. So you rake & you rake & your rake some more, & you're 1/4th of the way through the yard! with broken blisters on your hands & an aching back. You throw gasoline on a few piles & burn them, & choke on smoke, & turn the whole yard a nice gray dinge. Yes, descriptive paragraphs on leaves are fun.
Leaves are turning colours. The maples are red, the Birches are yellow the Evergreens are still green. The ground is covered with a wide mat of colour. The breeze is cool, the air is crisp and yet full of invigorating odors. Trees are barren yet not lonely. The sound of blowing leaves brings a warmth to ones ears. It's Fall in Ontario.

The fall leaves have wonderous beauties to the observer. They vary in colour. Some are green with tinges of yellow or red others orange, or red or brown. All are full of blemishes, holes and spots. They have a leathery texture on top, are rough underneath and are a crinkled shape. Is this decay or is this beauty. The odor is magnificent in some and nigh existent in others. The existing odor are deep and rich; enjoyable an in no way repugnant. They tend to crackle when touched. Some of the stems are brittle. What a beautiful sensation to one's senses.
Fall is a breath taking sensation to experience. One is compelled to stop and consider the beauty and awesomeness of the sights; the fragrance of nature’s odours; the sounds of movement, of life gradually preparing to sleep.

337 Fall Leaves
The color spectrum is wide, giving an array of color. There is the soft greens of spring advancing to the more bold and dominating hue. However, that is not the beginning but only the commencement. A soft yellow is observed darkening to a burst orange shade and even to a brown. Brown is not the colour of being past the stage of beauty but only adds to the array. Enhancing the spectrum are leaves of red. They blend into the spectrum yet they stand out, as unique, as the ultimate.

One one leaf the colorurs do not occur in isolation. Each leaf is unique, an individual.
I was just thinking this morning that Fall is really here. It was cool out, a little breezy, leaves were on the ground crunching under my footsteps, and the trees are getting bare branches. This morning I could see the breath of the construction worker outside my house. That is one of the signs of Fall, when you can see your breath as you breathe outside. Besides the coolness there's a crisp feeling in the air. Another sign of Fall arriving is when the leaves begin to change color. It's so refreshing to look down the hill by my house and see greens, yellows, brown, and a touch of red in the trees.

When I first smelled these leaves, I thought, "Oh no, they're going to set off my allergies." They have a strong odor that's not particularly pleasant and makes it hard for me to breathe. The leaves themselves are of variegated color. Parts of each leaf are a reddish brown, yellow, and yellow green. The leaves are not completely crisp, but they are drying out. They feel and sound somewhat like paper when you touch them. You can feel ridges on the underside of the leaves when you touch them. Interestingly, the underside of the leaves are not as colorful, green with varying shades of brown. Even the stem is turning brownish. Most of the leaves have been chewed on or something—they have chunks taken out of the edges. When you hold them up to the light, the light illuminates all the veins in the leaf and kind of makes the colors brighter.
When I think of fall I think of beautifully colored leaves covering my yard. Our family would spend a Saturday afternoon raking these leaves up. This is a romantic time of year for me. With the first frosts of winter and the nip in the air I want to be held and cuddled. Life and nature are peaceful in the fall. Everything seems to be at rest after the long hot summer.

This is also an exciting time because school starts. There are new teachers, new classes and new faces. There are many social activities to help start friendships. This time also holds memories for me. I remember my decision to follow Christ and my first year away from home. I think of my friends still in high school and my father’s birthday.

Fall is one of my favorite times of year. It is beautiful, peaceful, and also sentimentally special to me.

Leaves in the fall are very different than leaves any other time of year. Some smell sweet giving the air a sweet, fresh smell. They come in a variety of colors ranging from brown, through red to golden yellow. Their sizes also vary. Some are bigger than my hand others are as tiny as my little finger. The shapes of these leaves are sometimes funny and always strange, but never exactly the same. Of course, all fall leaves make noise. They rustle around moved by the wind or a steady walk, but they always say hello.
Fall is the most depressing season of the year. The weather is drizzly, cold, and foggy. All of the fun and beauty of summer die when fall comes. It is when school starts. It is also when the time changes and it gets dark earlier. Fall is not a good time of the year.

The leaves of fall are dry, coarse, and old. They smell stale. Their colors are drab brown and yellow. If you bend the leaf, it breaks. It isn't fresh like the spring and summer leaf, it's just the opposite, dry and decayed. The leaves of fall are symbolic of death.
Fall is a beautiful season. The leaves begin to change to many different colors. The weather changes, too. It starts getting cold and drizzly. Although the trees are beautiful at the first of the season, fall is also a lonely time of year. The summer fun is over; people begin to settle down. Because of the weather (cold) it is more difficult to decide to go somewhere. Layers of clothes are put on; gloves and hats and sweaters are brought out again from the back closet. Fall is a season for coziness with the fireplace and family (and a time to look forward to spring).

Fall leaves have different characteristics than just another leaf. The leaves have a softness to them. They feel soft and look soft. They have beautiful shades of different colors, such as browns, reds, yellows, oranges, pink, green. Each leave is individually beautiful, but these leaves together make up a scene almost to beautiful for words. There is no way to describe the full beauty of a fall scene. It is always a sad feeling when the leaves begin to fall off the trees and lose their wonderful, natural colors.
My eye for the changing of seasons is the hill behind my grandparents' home. The hill has changed its beard from the green hues of summer grass to that of gray stuble. The trees of the hillside have brightened their wardrobe only to become naked through the onset of winter. All of the lovely wildflowers of the hilltop have went into hiding, preparing to escape back onto the landscape with the first bird of spring. The animals are scurrying around collecting food and building their winter homes. The animals know instinctively that the cool crisp air is going to become cold and harsh as soon as the trees shed their bright garments. Many people see autumn as a drab time of year but I don't. Some think it's the end of a beautiful season. I think it's the beginning. I think it shows us their is beauty in any ending or begging of a cycle. The only problem I have is I can't really tell if it is a beginning or an end.

The leaves crinkle as I squeeze them in my hand. The jagged edges of the leaves poke into my hand. Some of the leaves are smooth and waxy on top. One has jagged saw-tooth edges, one is shaped like my hand, and yet another one is oval shaped. Not any of the leaves are really alike they remind me of snowflakes. They smell musty like the dirt on the hillside behind my grandparents' house. It's a good smell though. I wish I had a big pile of leaves, red, orange, and gold, good clean leaves, so I could play in them. Maybe I could take a walk in the woods and step on them and hear their midribs snap under my feet, or smell the air of the forest smelling like new dirt. What a wonderful thought, to be alone with the multicolored autumn leaves.
Fall

Fall, a time of year that comes and goes much too fast. The leaves are a beautiful variety of orange, brown, and gold. Piles of leaves on the ground just waiting for kids of all ages to play with and drag their feet thru. Squirrels are everywhere gathering food to store. It's a beautiful time of year.

The leaves are red, brown, yellow, and orange; some feel like your touching plastic. Others are like touching leather, some feel like felt. Some leaves are newly fallen and fold, bend and twist. Others are old and crumple in your hand with age. Each leaf gives a message with its size, color, and shape about the very tree it came from.
Fall

The leaves are falling. The ground is now an orange-brown hue. All of the animals are climbing trees and dancing in the wind. My thoughts seem to wander as I am surrounded by these changes. Why do the leaves fall? Why is the wind much colder? Why are the squirrels gathering nuts in their nest? Maybe someday I will understand.

Fall leaves are quite fragile. In the wind, they fall from the trees and dry in the sun's rays. The texture is smooth and feels like leather. The faces of the leaves are multicolored. At first glance, one might just notice the brown hue. But suddenly the leaves look different. They have particles of green, yellow, orange and red hue in them. How different the leaves look now. Oh, what it must feel like flying in the wind as if one was sliding on a pool of water.
Fall is one of the four seasons of the year. To me, fall is the most beautiful time of year with the leaves turning golden and auburn colors. The sound of the falling leaves is so peaceful. The cool brisk air makes the season that much more inviting. Fall is almost like springtime even though there are some differences. Fall comes before winter and spring comes before summer. Fall weather gets us prepared for the cold wintery days ahead. If only fall could last the whole year through; what a beautiful world we would have. During the fall season there are many chores that need to be done. Leaves on the ground need to be raked and put in bags. The grass needs to be mowed very short. These main two jobs gets everybody ready and excited for the cool weather.

The leaves in my envelope are very colorful. They all smell so fresh. It is like an outdoors smell. One leaf is a very pretty red-orange color and it feels smooth and cold. It has little black dots on it from when it started dying. There is a brown leaf that is more wintery looking. It is a rough and dry leaf. The type leaf that it is, is a typical leaf that anyone would imagine. The yellow leaf feels like it has a layer of fuzz on it. That particular leaf is like a little tickler. All of these leaves are different in every way. They have their own personality that neither one of them can be alike, except that they are fall leaves. They feel, look, smell and hear differently. The sound of leaves depends on how the leaf falls. Some make flowing, falling noises while some fall straight from the tree to the ground.
Fall is a season of change; of new beginnings. It is a time of clean crispness and new romance. As the leaves fall and the air turns slightly colder no one can help but feel nostalgic about good times past and anxious about those soon to come. With the change of season from summer to fall, comes a fresh promise and with that promise a hope. A promise that this is the beginning of a new year and things will be different and a hope that this time they will be better.

Leaves

They look to the eye dry and light but to the hand they feel crisp and crackle when held too tight. They smell of past memories and distant hope. When in clusters, whether on the ground or in the trees they are known as a sight of beauty and they have an underlying meaning of change. That is understood by all. Leaves represent our destiny as well our past.
Fall is the time of year in which many important things take place. The trees begin to change to many vivid, beautiful colors. You can see leaves that are orange, red, yellow, brown, and sometimes still green. The leaves will then fall from the trees and the trees will more or less go to sleep. In the fall people begin to anticipate the coming holidays and being able to sit in front of a fire on a cool day. When fall arrives they know that Christmas is just around the corner. The days of fall are usually cool and crisp and very comfortable for most people. It's not too hot like in the summertime or too cold like in the winter. Also, the animals begin to do the things that they need to do to get ready for their winter sleep.

Fall leaves come in many forms and sizes. Some are short and round and others are long. Many leaves have points that come out from the center stem. Leaves have different textures. Some of them might be hard and dried up. These will crumble in your hands if you're not careful. Others will be very soft. The surface is never smooth. It has ridges all over it. Fall leaves come in many different colors such as red, yellow, brown, and orange. There are no two leaves that are totally alike. When you smell leaves they have their own perfume that isn't like anything else.
220 Fall
In the fall, the leaves on the trees begin to change from a green color to colors of red, gold and brown. The air begins to get cooler, and the children go back to school. When I think of fall I think of raking leaves, wearing sweaters and shorter days. I can see boys making piles of leaves in the front yard and jumping in them. I can drive down the street and see all the pretty colors. I also think of Halloween, and dressing up for a costume party. I think of Thanksgiving and being with my family, and cooking a giant turkey. Fall is a nice season, and filled with many special things.

420 Fall Leaves
Fall leaves are quite unique. Sometimes I'm afraid to pick one up for fear it will crumble right in my hand. The colors of fall leaves are brilliant. Brown red, yellow, gold, almost like a sunset or a warm crackling fire. They are light as air and gently fall from the trees as if they had wings to carry them. The leaves have no scent but the air during fall smells crisp and clear.
What is fall? Fall is a time of the year when many changes occur. After a good summer vacation, many young (and some old) people return or "fall" back into school. The weather begins to change as the temperature begins to "fall". The leaves on all the trees change into beautiful colors and then "fall" off their branches. Another word for "fall" is autumn, but autumn is not as easy to define as "fall" is. You can get a mental picture of what the season is when you hear the word "fall." Maybe they should change the word "summer" into "sun", or, maybe change "spring" into "bloom", or even change "winter" onto "cold". Well, anyhow, even if the other season's descriptor words don't change, you can always count on "Fall" and you'll always be able to remember what happens during that time of the year.

Fall leaves can be described in five different ways: how they look, how they smell, how they feel, how they sound, and sometimes how they taste. Fall leaves are beautiful colors of brown, red, orange, and yellow. They smell kind of like the earth's soil. Some feel crispy and crackly, while some feel smooth. They usually make cracking and crunching sounds if you crumble them up. They even have an interesting taste to them--well it's not pleasant, but it's a taste! I think fall leaves are God's way of telling everyone on earth that there is still some beauty left in this crazy world we live in--sometimes it will fall right on top of you and sometimes you just have to reach down and pick it up!
Fall

Fall is the time of year when the leaves change color from a green shade to rusty brown and begin to fall. The weather starts cooling down and your wardrobe shifts white to khaki.

When you think of fall you think of the holiday season approaching as well as Christmas and bare trees.

Fall is a pleasant time when the evenings are cool and a stroll around the neighborhood sounds quite pleasant.

Fall means that everyone rakes leaves even the girls because there are so many. Fall is a time to look back and cool down from summer and warm up for winter. Fall is a mediator.

Fall leaves

Fall leaves are different shapes and sizes ranging from a toasty brown to a brick red. Some are even golden yellow. Some are soft and smooth and other are crispy like burnt toast. They crunch, crinkle and slide all piled up one each other. Some look like children's hands and some like tear drops with stems on the end. Each leaf has strong sturdy veins crawling through it helping it hold its interesting shape.

The leaves look bitter as unsweetened chocolate but crunchy like rice krispies.

P.S. If I die from leaf poisoning remember that I sacrificed my body for the future readers and writers because of your experiment.
Fall has always been my favorite time of the year. It is the perfect temperature outside for many fun activities, and the colors of fall are unlike those of any other season. The grass turns to a straw colored carpet on the ground, and the trees change from green to all sorts of red, yellow, orange, and brown shades. I love to go walking in the woods to enjoy the breathtaking beauty of fall.

Leaves come in many different shapes and sizes. In the fall, they are also in many different colors and textures, and they have a smell unique to fall. Maple leaves turn a bright red, then rust colored, and then they turn brown and fall off of the tree. Oak leaves change from green to yellow, then to orange, and then they, too turn brown and fall to the ground. Some of the leaves become shiny and smooth when they change colors, but others become rough. They all are very dry and will fall apart if they are crumpled up in your hand. And all leaves in the autumn have a smell like straw.
Fall is one of the most beautiful seasons of the year. There are so many colors to be seen in the trees and on the ground. This is the time of the year when the leaves begin to turn red, orange, and yellow, but they still have a splash of green. Then, those leaves begin to fall and cover the ground with all their exciting colors. It's so beautiful that you can just sit back and let your imagination run wild.”

I have six leaves. They all feel like cardboard, except for the smallest one and it is very silky feeling. The smallest one has the richest color too, it has the reddish color that a plum has when it is ready to be picked. The next size leaf is a dull yellow with a little bit of a green tint to it. The next three sizes are dull brown colored. They look really tired and ready to settle down for a long winters nap. The biggest leaf of all looks like a cottonwood leaf. It also resembles a starfish. It is mostly yellowish orange but it has some interesting splashes of green, yellow, and red. It's the most exciting leaf of all. They didn't make a sound, & I didn't try to taste them, so this is as far as I can go.
Fall is a busy time of the year. It is a time when school resumes and all the teachers and students are eager for the new year. Sometimes in Texas it hard to say that we have a fall because our summer usually lasts until the middle of October, and then it is usually bitter cold for only a few months. But occasionally, in November, everyone will realize that Fall is upon us. The leaves are changing color and falling and the days are warm while the nights are cool. Children love to play outside and often teachers resort to having class outdoors. Fall is always a refreshing season after our smeltering summers. It gives us a chance to be rejuvenated and organized for the winter Holiday season which brings with it the hustle and bustle of shopping and partying.

Leaves can fall from their branches at different times. Some fall immediately when the weather begins to change. They might be yellow in color and brittle to the touch. Or they might be red and spongy-feeling. Or they could be brown with a soft touch. Those leaves that are brown usually stay on the trees for the greatest amount of time. All of Fall’s leaves are fragile and can be crumpled up easily. The presence of their veins is still noticeable, but they have no life in them. They always retain their stem and no two leaves look the same once they have fallen off the tree.
The most beautiful fall times I have ever seen were in the mountains of Pennsylvania. What a wonder it was to look out my window in the morning; there, across the fog-cloaked valley, rose a giant of a mountain, glowing in its early morning splendour of new misty light, and a myriad of autumn colors. Reds, yellows, browns, oranges and greens formed a kind of Impressionist image before my eyes, as if sponged onto the great mountain. These colors seem to be a last glow before the green of summer fades into the black and white scheme of winter. Autumn is also the time of plenty, when the earth produces its last glorious harvest before the bleak infertility of winter. The beautiful colors are just as vivid in leaves as in harvests, ripe nuts, gourds and pumpkins so symbolic of the time, and colorful Indian corns. The animals, too, seem to know that autumn is a time for plenty, a time for feasting before their winter sleeps and relative inactivity. The fat squirrels busily gather nuts, birds are constantly seen overhead in patterned retreats to warmer climates, and the young colts, so sure of their spindly legs now, trot around their paddocks as if getting plenty of leg-stretching before their winter stabling. Autumn is a time of activity, a time of plenty, a time of joy in the earth before its period of white dormancy.

The leaves have fallen. How bright their colors are! Seldom do we see so many colors, all courtesy of Nature herself. They are brilliant, yet not as brilliant as in the rich climax of summer—for they are becoming brittle now, and they no longer smell fresh and alive, but dead and bitter, earthy like the earth they now cover. Many of the leaves are brown—we do not think they are brilliant. The leaves no longer have the protection of a tree, either. On the ground, they are ravaged by insects, trampled by humans, or raked up and burned. The majority simply rot into the earth. But here again, they are glorious, in their own way, as part of a life cycle so integral to nature.
Fall is the time of year to go back to school. After a hot summer we look forward to cool weather. Trees are at their best in the fall. There is color everywhere we look. It is in the clear blue sky, and the reddish gold of the leaves. School bells are ringing...

So many shapes. The colors are earthy. Reds, browns, golds...

Musty smells Crunchy touches Smooth soft feels Fall leaves.
Fall
Fall is cool & crisp. The leaves are turning yellow, red and brown. Some have fallen off the trees and crunch under my feet. The blustery wind blows them around. It blows from the north, foretelling of the coming cold of winter.

Between the trees, scurrying through the leaves, are the squirrels, gathering nuts for their winter stock. The birds are beginning their long journey south—to escape the bitter cold in the north.

Leaves
The leaves are different colors & shapes. Some lay flat, some curl a little & some are almost folded in half. One looks like it was someone’s lunch. One leaf is rough. With several of the others, you can feel all of the veins. One feels almost like paper and one is soft as velvet.

Some leaves are one color and some have 4 colors combined.

They smell like fresh cut grass, almost spring-like.

Some have several points on them while some only have one point at each end. They all have stems on them.

One of them crunches when you touch it.
Fall

Fall is one of the four seasons of the year. Fall comes right before winter. Fall is the time of the year when the leaves turn many different colors. The tree branches begin to hang low. The color of the grass changes. The birds leave for a warmer climate. All animals begin to grow longer hair for the approaching winter. There is a crisp cool feeling in the air. This is the time of the year when I start to think and prepare for the wonderful Holidays. I start buying sweaters in advance for those winter days ahead. Fall is the season for death, but then we can look forward to spring, the season for birth.

Leaves

In my envelope I have eight leaves. All of which are different in size, color, and shape. The texture of each leaf feels a little different. The leaves have a musty smell. Each leaf is from a different tree. One leaf that I recognize would be from the oak tree. The main colors in my leaves are orange and brown. I like the orange leaves the best they give me a sense of warmth.
Fall

Fall is a wonderful time of year. It's the time when the color of summer turns to many splended colors. Fall has so many beautiful colors. The leaves turn rust, yellow, brown, red and some even stay green. The leaves fall from the tree branches and covers the dying grass making a colorful carpet. The sky also goes through a color change when the season becomes fall. The sky changes from crystal blue to almost gray at times. It has wispy white clouds covering the dull blue background. The wind is no longer a gentle southern breeze but cool whipping gusts from out of the north. As fall is described its a wonder why we love it so much.

Leaves

These leaves. I see some are brown, some are yellow, some are red and one is black. They are all shapes and sizes and some are connected.

These leaves I hear make cracking, crumbling, and rustling sound that make them seem as if they are breaking.

These leaves I hold feel rough, dry and course. The do not bend without cracking or crumbling.

These leaves I smell have no scent at all. They are not sweet, bitter or sour but smell-less.

These leaves I dare not taste.
Fall is a refreshing time of year when the heat of summer is finally relieved and the busy-ness of the year starts to develop. The cooler air, the pretty leaves, the excitement of football games, the new start on activities are all a part of my picture of fall. I remember when I was growing up, we raked the leaves from the maple trees on the farm in Indiana and made them into the shape of houses. We picked up apples in the orchard and took them to a cider mill to be squeezed into cider. Daddy picked corn and soybeans and Mom canned grape juice and pears and peaches and pizza sauce and tomato juice. It was nice to come home from school on a cool, crisp day and smell fresh bread or cookies Mom had baked. Piano lessons started up again and school work seemed extra hard after a summer without it.

The leaves have different hues of color indicative of the changing season; they are brown, and red, or green and yellow. They are in transition to becoming totally brown and crisp so that when you walk through them, they crunch, and break down. This is all part of the process of adding particles to the soil to make it fertile and productive. The leaves should not all be raked up and bagged in plastic to rot without giving back to the land. Down with plastic bags!

Fall leaves are useful for adding beauty to our lives, for reminding us of the changes in life. They are like a signal to get ready because we are all mortal. Fall leaves remind me of old people who are sweet and gentle and full of wisdom from a life well lived and blessed by God. They have some scars on them and they don’t have the fresh green color of spring but their beauty is a deeper sort.
Fall is a special season for me. The cool winds blow the summer’s blustering heat away, and the trees rejoice putting on their finest colors. These colors are very bright against the cold, dark skys that threaten to bring us the snows of winter. I love the contrast of these colors, and when they fall to the ground the rustling of the leaves whisper of the holidays that will soon be here. The season of fall then just seems to fly by as I prepare for winter, not to be remembered until next year when the splendor begins again.

Would any other object look so lovely in their death as the leaf? Their intricate shapes with never on exactly the same, could only be formed by nature. The colors on just one leaf consist of anything from hues of gold, auburn, green, brown, orange, and blue. Their spiccy scent delacately fills the air around them. For their frail apearence they are incridably smooth and elastic. Their sparp points taper off into threads almost to thin to see. The thin stem splits into veins that support the unbrellaed shape of the leaf.
Fall is my favorite time of year. There is a certain crispness in the air that is very invigorating. During fall, there are so many beautiful things for the eye to look upon. Orange, red and yellow leaves are upon the trees and the ground. All the animals are very active at this time of year. It is such a pleasure to watch the little squirrels scurrying around gathering nuts for the winter. Fall even has a smell all its own. People are just beginning to burn fires in the fireplace, and one can just walk outside and smell this and see the smoke curling from the chimneys. It would be such a waste to remain indoors during such a beautiful time of year.

The best thing about fall is the change of color in the leaves. In fall, leaves change from green to different beautiful colors: red, orange, yellow, brown and many shades in between. When these leaves fall from the trees and lie in heaps on the ground, they make rustling and crunching noises when someone walks on them. These same heaps of leaves can make a comfortable place on which to rest. Fall would not be the same without these bright splashes of color.
Fall is a season of sad beauty. The whole process of change signals the ending of a year, the passage of time, and the sigh of the earth as she settles into winter. Although this sadness is almost palpable at times, the exhilarating changes in the sights, sounds, and even the smells brought on by fall compensate for the chill in the air. Colorbursts of trees fill our neighborhoods and the giggles of trick-or-treating children warm our hearts. Pumpkin pie, crackling fires, and piney woods delight our noses. One of the saddest parts of the fall season's beauty is that it is short-lived.

Fall Leaves

They are many different colors, shapes, and sizes, and each one is different—uniquely beautiful. Sometimes they are found together, in groups, and sometimes they are all alone. They may be old and wrinkled with veinous skins, or supple and vibrant with smooth skins. Noisy and restless, they are always in motion and find their way into every neighborhood, every city, and every small town. They are affected by the blowing wind, the shining sun, the falling rain, and the swirling snow. They live short but colorful lives; like falling stars, they brighten the earth briefly and are swept away.
When I think of fall many feeling and thoughts come to mind. As the weather begins to get "nippy" and the leaves begin to turn, there is definitely a feeling of coming holidays. Halloween quickly followed by Thanksgiving gives us pleasant thoughts and memories. If that isn’t enough, we even start having the expectancy of Christmas. It makes me have a nice cozy feeling to hear the autumn winds blow as I sit close to the fire. The leaves on the trees turn and fall. We know fall has certainly arrived when we must get out and rake the leaves. I think of pumpkins, turkeys and kinfokes. These are all pleasant memories for me.

The leaves are all unique. They’ve each come from a different tree and if they could speak they could tell us stories about what they’ve seen, heard, and felt since they were formed early in the spring. Their colors range from hues of yellows, reds, and browns and when placed altogether are truly beautiful. They even smell like fall with bits of dust and a musty tinge. Some feel leathery and tough while others feel brittle and crisp.
Fall

Fall, what a wonderful time of the year. A time when leaves are changing into colorful hues. A time when cool, brisk breezes begin to blow. A time when each individual has a sense of renewal with the changing of the seasons. Fall is also the time for family sharing. Thanksgiving is coming soon. This is our chance to thank God for all the bounty, and the beauty he has given us the privilege to behold.

Fall leaves comes in many different shapes and sizes. Some are big, some are small. Some have curved edges, while others have pointy edges. The colors vary tremendously. Some are red, others are yellow and orange, and some are brown. They are dry to the touch and rough. They have a musty smell that makes some people sneeze. They make a light pleasant noise as they rustle in the breeze.
Fall is a beautiful season. The first thing that stands out are the colorful trees. The leaves have begun to turn vibrant shades of red; gold and orange. They blow in the brisk breeze that has turned from warm summer air into cool gusts from the north. Now, in this cool season, people are everywhere. Unlike the heat of summer, which sometimes is unbearable, the fresh, refreshing air of autumn seems to send people outside. Football and lawn work are a few favorites for this type of weather. And, last of all, sweaters are everywhere. The signs that are associated with fall are beautiful and exciting. This season, unlike the three others, has it's own characteristics that make it the most enjoyable season of all.

Fall Leaves
The leaves that have fallen from the trees are dead. Their color has faded from that brilliant red, gold or orange into a reddish-brown hue. They are stiff and brittle and lifeless. It seems as though they are sad. They would be much happier if they were still hooked on to the tree with the rest of the tree. The leaves sound crackley when they are touched and it's like almost a warning that they will break. The nice thing to remember is that there will be more leaves next spring!
My favorite season is fall. I love to watch the yellow, orange, and red leaves wisp to the ground in the wind. I love to patiently rake all the crispy brown leaves into a large, mountainous pile and leap into it cheerfully. Finally my most favorite thing about fall is taking long walks in the cool wind and watching the frisky squirrels look for acorns as I hold the warm loving hand of a good friend.

Fall leaves feel very crisp and weathered. However, some feel soft and moist on your hand. The leaves smell like the cool air and rustic bark of the trees. The leaves are many different shades of gold and brown. They have many veins that run in all different directions. The sound of leaves falling on the ground is very wispy. As the crispy fall leaves are raked in a pile they sound like a crash.
258 Fall

In the fall the leaves turn pretty colors. They turn green, red, yellow, orange, and brown, then they tumble to the ground. In the fall we gather the leaves from the lawn, and shape up the trees. The fall makes the trees look sad, and bare.

In the fall the grass turns brown, the clouds look dreary and gray, and often we wish for a brighter day. The fall brings lots of moisture in the air. That makes me sticky and uncomfortable. Fall also brings a special holiday, Thanksgiving when we celebrate and gather the harvest for that year.

458 Fall Leaves

The leaves are rough, and have mixed colors of brown and orange. Some are different in shape and texture. They have a stem at the end. Some stems have six leaves combine. One stem contains only one large leaf, this leaf has three colors. Its purple, brown and lime green its a tough leaf. I am examining two types of leaves with different shapes and lines. I think that these leaves come from different trees but each are similar in some way.
Fall is a time when nature prepares itself for the winter months ahead. The trees become barren, and the animals gather food to store for the coming season. The smell of smoke lingers in the air, whether it be from burning leaves or from a warm fire in someone’s home. Fall is also a time for very pleasant weather. The temperature mediates between the hot summer temperatures and the cold winter. Because the weather is so nice, many people spend Fall days outdoors. It is a wonderful time of the year to have a picnic in the woods and to watch the leaves fall. The months from September to November are my favorite time of the year.

Leaves
Fall is a time when leaves die and begin to fall from the trees. As they die, the leaves change from green to beautiful colors of red, orange, brown, and yellow. The changing leaves are a sign that Fall has arrived. The leaves become brittle and dry when they fall. As you walk among trees in the Fall season, the crackling of dry leaves underfoot is heard. The leaves also have a wonderful aroma. The air is filled with their scent. One of the best things about Fall is being able to rake together a huge pile of these beautifully colored leaves, and then dive right into the middle of them.
APPENDIX D

ANALYZED TEXTS
FALL

Fall brings feelings of nostalgia. Fall always meant weekend retreats to the Appalachian Mountains. The air smelled so fresh and crisp. The trees would be changing into such a variety of beautiful hues that one couldn't help but get caught up in a feeling of happiness. Then there were times of just being together with special people at the retreat. We would all sit around the crackling fire mesmerized by the leaping flames in the big fireplace. Apples would be munch- ed— it wouldn't be a fall retreat without a big bowl of delicious red apples laying around. Hot apple cider with hints of cinnamon spiced up cool evenings and a table of homemade cookies sat to tempt everyone into fasting. Hikes through the woods brought everything together as God's presence seemed so close. These memories were what helped us get through the hum-drum pace of life in the cities.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>Time &amp; Location</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>[Past falls]</td>
<td>M: Author &amp; friends go on retreats</td>
<td>[To enjoy nature, friends, God]</td>
<td>[w/ activities of subculture]</td>
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<tr>
<td></td>
<td>Appalachian</td>
<td>M: Air smells fresh &amp; crisp</td>
<td>[Bec in mountains]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td></td>
<td>M: Trees are changing to various colors</td>
<td>[Bec of photosynthesis]</td>
<td>&quot; &quot;</td>
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<tr>
<td></td>
<td></td>
<td>N: People enjoy being together</td>
<td>Bec they were special friends</td>
<td>[w/ need for friendship]</td>
</tr>
<tr>
<td></td>
<td>[Past] Evenings</td>
<td>N: People enjoy sitting by fire</td>
<td>Bec flames mesmerized them</td>
<td>[w/ physical &amp; psychological warmth]</td>
</tr>
<tr>
<td></td>
<td></td>
<td>N: People munch apples</td>
<td>Bec they were available</td>
<td>[w/ party food]</td>
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<tr>
<td></td>
<td></td>
<td>N: People eat homemade cookies</td>
<td>Bec cookies tempted them</td>
<td>&quot; &quot;</td>
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<td></td>
<td>[Later]</td>
<td>N: They drink hot spiced cider</td>
<td>Bec evenings were cool</td>
<td>&quot; &quot;</td>
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<tr>
<td></td>
<td>[Current Fall]</td>
<td>N: They hike in woods</td>
<td>To sense God's presence</td>
<td>[w/ sense of wholeness]</td>
</tr>
<tr>
<td></td>
<td></td>
<td>M: Memories help avoid boredom</td>
<td>[Bec of good times remembered]</td>
<td>[w/ need for remembering]</td>
</tr>
<tr>
<td></td>
<td></td>
<td>M: Author feels nostalgia</td>
<td>[Bec of happy memories]</td>
<td>[w/ &quot;&quot;]</td>
</tr>
</tbody>
</table>
Fall—the name was perhaps chosen because of the falling of leaves at this time of the year. But I think of the season rather as a gentle receding, a slowing down in preparation for the resting time to follow.

I love fall in the same way that I love the time each day just at, and after, sunset. It is a soft time of year, as sunset is a soft time of day. Color flares briefly and then recedes to rest and wait for a fresh burst of life in the spring like a new dawn.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION[w/ similarities between fall &amp; sunset]</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td>M:Fall chosen as season name</td>
<td>Bec leaves fall</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td>Fall</td>
<td>N:Nature is slowing down</td>
<td>To prepare for rest</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>Fall/sunset</td>
<td>N:Author loves fall/sunset</td>
<td>Bec of softness</td>
<td>[w/ author evaluation]</td>
</tr>
<tr>
<td>Year/day</td>
<td>N:Color flares briefly</td>
<td>[Bec of angle/amt of light]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>N:Color recedes to rest &amp; wait rebirth of</td>
<td>[Bec of cyclic nature]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>spring/dawn</td>
<td></td>
<td>[&quot; &quot;</td>
</tr>
<tr>
<td>[Winter]</td>
<td>M:Time of rest</td>
<td>[Bec of change in light and temperature]</td>
<td>[w/ season of Spring]</td>
</tr>
<tr>
<td>[Future]</td>
<td>M:There will be a fresh burst of life</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
The most beautiful fall times I have ever seen were in the mountains of Pennsylvania. What a wonder it was to look out my window in the morning; there, across the fog-cloaked valley, rose a giant of a mountain, glowing in its early morning splendour of new misty light, and a myriad of autumn colors. Reds, yellows, browns, oranges and greens formed a kind of Impressionist image before my eyes, as if sponged onto the great mountain. These colors seem to be a last glow before the green of summer fades into the black and white scheme of winter. Autumn is also the time of plenty, when the earth produces its last glorious harvest before the bleak infertility of winter. The beautiful colors are just as vivid in leaves as in harvests, ripe nuts, gourds and pumpkins so symbolic of the time, and colorful Indian corns. The animals, too, seem to know that autumn is a time for plenty, a time for feasting before their winter sleeps and relative inactivity. The fat squirrels busily gather nuts, birds are constantly seen overhead in patterned retreats to warmer climates, and the young colts, so sure of their spindly legs now, trot around their paddocks as if getting plenty of leg-stretching before their winter stabling. Autumn is a time of activity, a time of plenty, a time of joy in the earth before its period of white dormancy.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Time &amp; Location</strong></td>
<td><strong>Pennsylvania</strong></td>
<td><strong>[To provide location]</strong></td>
<td>[w/ geography of PA]</td>
</tr>
<tr>
<td>Prev falls</td>
<td>M: There is large mountain</td>
<td>Bec of colors</td>
<td>[w/ author evaluation]</td>
</tr>
<tr>
<td>Prev Mornings</td>
<td>M: Mt. of PA are most beautiful</td>
<td>[Bec it is morning]</td>
<td>[w/ typical human activity]</td>
</tr>
<tr>
<td></td>
<td>M: Author looks out</td>
<td>[To see mountain]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Valley is covered in fog</td>
<td>Bec it is morning</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Mountain is across valley</td>
<td>[Bec sun is coming up]</td>
<td>[w/ natural phenomena]</td>
</tr>
<tr>
<td></td>
<td>N: Mountain glows with light &amp; color</td>
<td>Bec of photosynthesis</td>
<td>[w/ geography]</td>
</tr>
<tr>
<td></td>
<td>N: Leaves have become red, yellow, brown</td>
<td>[Bec of slowing photosynthesis]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Mountain looks like impressionist painting</td>
<td>Bec of harvests</td>
<td>[w/ author evaluation]</td>
</tr>
<tr>
<td>Summer</td>
<td>M: Environment is green</td>
<td>[Bec of vivid variety]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td>Fall</td>
<td>N: Time of plenty for people</td>
<td>[Bec unique to that season]</td>
<td>[w/ symbols of fall]</td>
</tr>
<tr>
<td></td>
<td>N: Earth is bountiful</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Harvests are colorful</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Pumpkins, nuts, gourds, Indian corn symbolize autumn</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Animals feast</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Squirrels gather nuts</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Birds fly South</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Young colts trot</td>
<td></td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>[Text is written]</td>
<td></td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>[Future]</td>
<td></td>
<td>[w/ animal behavior]</td>
</tr>
<tr>
<td></td>
<td>M: Winter comes</td>
<td></td>
<td>[w/ nature]</td>
</tr>
<tr>
<td>Winter</td>
<td>M: No leaves are left on trees</td>
<td></td>
<td>[w/ winter season]</td>
</tr>
<tr>
<td></td>
<td>M: Snow falls</td>
<td></td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>M: Environment is black and white</td>
<td>[Bec it is time]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>M: Animals are less active</td>
<td>[Bec of snow]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>M: Only a few birds are left</td>
<td>[Bec of snow &amp; cold]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>M: Colts are in stables</td>
<td>[To avoid snow &amp; cold]</td>
<td>&quot;</td>
</tr>
</tbody>
</table>
Fall is a season of sad beauty. The whole process of change signals the ending of a year, the passage of time, and the sigh of the earth as she settles into winter. Although this sadness is almost palpable at times, the exhilarating changes in the sights, sounds, and even the smells brought on by fall compensate for the chill in the air. Colorbursts of trees fill our neighborhoods and the giggles of trick-or-treating children warm our hearts. Pumpkin pie, crackling fires, and piney woods delight our noses. One of the saddest parts of the fall season’s beauty is that it is short-lived.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td>[Bec of anticipated change]</td>
<td>[w/ author judgment]</td>
</tr>
<tr>
<td>Fall</td>
<td>M: Author feels fall is beautiful but sad</td>
<td>Bec short-lived</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>M: Season’s beauty is sad</td>
<td>[Bec of process of change]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>M: Sadness is almost palpable</td>
<td>[Bec they are pleasant]</td>
<td>&quot;</td>
</tr>
<tr>
<td></td>
<td>N: Exhilarating sights, sounds, &amp; smells compensate for cool weather</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Neighborhood trees are bursting with color</td>
<td>[Bec photosynthesis changes]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>N: Trick or treating children make us happy</td>
<td>Bec of their giggles</td>
<td>[w/ childhood]</td>
</tr>
<tr>
<td></td>
<td>N: We like to smell pumpkin pie, crackling fires, &amp; piney woods</td>
<td>[Bec they are associated with security]</td>
<td>[w/ symbols of fall]</td>
</tr>
<tr>
<td>Winter</td>
<td>M: Earth sighs as she settles</td>
<td>[Bec winter is here]</td>
<td></td>
</tr>
<tr>
<td>Ending of year</td>
<td>M: Changes occur</td>
<td>To signal passage of time &amp; end of year</td>
<td>[w/ personification]</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>[w/ process of change]</td>
</tr>
</tbody>
</table>
Fall is a beautiful season. The first thing that stands out are the colorful trees. The leaves have begun to turn vibrant shades of red; gold and orange. They blow in the brisk breeze that has turned from warm summer air into cool gusts from the north. Now, in this cool season, people are everywhere. Unlike the heat of summer, which sometimes is unbearable, the fresh, refreshing air of autumn seems to send people outside. Football and lawn work are a few favorites for this type of weather. And, last of all, sweaters are everywhere. The signs that are associated with fall are beautiful and exciting. This season, unlike the three others, has its own characteristics that make it the most enjoyable season of all.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Summer</td>
<td>M: Air is warm</td>
<td>[Bec of tilt of earth]</td>
<td>[w/ summer season]</td>
</tr>
<tr>
<td></td>
<td>M: Heat is sometimes unbearable</td>
<td>[Bec of its intensity]</td>
<td>[w/ summer season]</td>
</tr>
<tr>
<td>Fall</td>
<td>N: Fall is a beautiful season</td>
<td>[Bec of colorful trees]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>N: Leaves turn vibrant red, gold, &amp; orange</td>
<td>[Bec of photosynthesis]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: They blow</td>
<td>[Bec of brisk breeze]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Breeze turns to cool gusts</td>
<td>[Bec from north]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: People are everywhere</td>
<td>[Bec of cooler weather]</td>
<td>[w/ human activity]</td>
</tr>
<tr>
<td></td>
<td>N: People go outside</td>
<td>[Bec of good weather]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: They enjoy football</td>
<td>[Bec of cooler weather]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: They enjoy working on lawn</td>
<td>[Bec they are unique]</td>
<td>[w/ sports calendar]</td>
</tr>
<tr>
<td></td>
<td>N: People wear sweaters</td>
<td>Bec of unique characteristics</td>
<td>[w/ human activity]</td>
</tr>
<tr>
<td>Winter</td>
<td>M: Signs of fall are beautiful &amp; exciting</td>
<td></td>
<td>[w/ comfort]</td>
</tr>
<tr>
<td>Spring</td>
<td>M: Fall is most enjoyable season</td>
<td></td>
<td>[w/ author judgment]</td>
</tr>
</tbody>
</table>
121 Fall (I least where I come from)

In the fall, the leaves turn colors of orange, brown, red & yellow. I love to walk in the woods and see and hear the leaves all around. Fall is also, cool weather. As I walk, the cold is felt on my toes, fingers and face. Fall is also, seeing Canadian geese and ducks in the sky going somewhere; rabbits and squirrels gathering food food winter before the snow. Speaking of snow, Sometimes the snow comes early to Indiana and the flakes start falling before the leaves fall off the trees. These things are what I remember about the fall.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time &amp; Location</td>
<td>[Previous falls] / Indiana</td>
<td>N:Leaves turn orange, brown, yellow, red</td>
<td>[Bec of photosynthesis]</td>
</tr>
<tr>
<td></td>
<td>Previous winters</td>
<td>M:Snow comes early sometimes</td>
<td>To see &amp; hear leaves</td>
</tr>
<tr>
<td></td>
<td></td>
<td>M:Leaves fall</td>
<td>[Bec of change]</td>
</tr>
<tr>
<td></td>
<td>[Now]</td>
<td>M:Author remembers previous falls</td>
<td>[Bec unaccustomed to it]</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>To go somewhere</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>To prepare for winter</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Bec snow falls before leaves fall</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>[Bec of lack of nutrients]</td>
</tr>
</tbody>
</table>
Fall

Fall is the time to go back to school. For some of us, Ann and I, we have always been going back to school in the Fall. In Southern California, where we are from, Fall is a lot like summer but a little cooler. Fall is also a time for football and outdoor sports. The surf in California starts to pick up and all the tourist are off the beach. The beach is probably the prettiest at this time. It is free of clutter, the waves are bigger, and all the trash is picked up from the summer.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time &amp; Location</td>
<td>M:Author &amp; wife always go back to school</td>
<td>Bec school resumes</td>
<td>[w/ school calendar]</td>
</tr>
<tr>
<td>Previous falls</td>
<td>N:Tourists fill beaches</td>
<td>[To enjoy]</td>
<td>[w/ vacation]</td>
</tr>
<tr>
<td>Summer</td>
<td>N:There is trash on beaches</td>
<td>[Bec of number of careless people]</td>
<td>[w/ human tendency to litter]</td>
</tr>
<tr>
<td>Fall/S. Calif</td>
<td>M:Author &amp; wife are from California</td>
<td>[To explain different perspective]</td>
<td>[w/ geography]</td>
</tr>
<tr>
<td></td>
<td>M:Fall is like summer but cooler</td>
<td>[Bec still pleasant outside]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>M:Fall is time for football &amp; outdoor sports</td>
<td>[Bec of cooler weather]</td>
<td>[w/ sports calendar]</td>
</tr>
<tr>
<td></td>
<td>N:Surf picks up</td>
<td>[Bec of change in weather]</td>
<td>[w/ cycles of the ocean]</td>
</tr>
<tr>
<td></td>
<td>N:Tourists leave beaches</td>
<td>[Bec of cooler weather]</td>
<td>[w/ vacation, end of]</td>
</tr>
<tr>
<td></td>
<td>N:Beaches are prettiest</td>
<td>Bec free from clutter, waves are bigger, &amp; trash is picked up</td>
<td>[w/ author evaluation]</td>
</tr>
</tbody>
</table>
Fall is a breath taking sensation to experience. One is compelled to stop and consider the beauty and awesomeness of the sights; the fragrance of nature’s odours; the sounds of movement, of life gradually preparing to sleep.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fall</td>
<td>M: Fall is breathtaking to experience</td>
<td>[Bec pleasant]</td>
<td>[w/ author evaluation]</td>
</tr>
<tr>
<td></td>
<td>N: One must focus on the beauty of the sights</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: One must focus on the fragrance of the odors</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: One must focus on the sounds of slowing movement</td>
<td>[Bec season is changing]</td>
<td>[w/ nature]</td>
</tr>
</tbody>
</table>
212 Fall
The leaves are falling. The ground is now an orange-brown hue. All of the animals are climbing trees and dancing in the wind. My thoughts seem to wander as I am surrounded by these changes. Why do the leaves fall? Why is the wind much colder? Why are the squirrels gathering nuts in their nest? Maybe someday I will understand.

<table>
<thead>
<tr>
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<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>[Bec of lack of nutrients]</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td>Time</td>
<td></td>
<td>[Bec seeking answers]</td>
<td>[w/ quest for info]</td>
</tr>
<tr>
<td>Fall</td>
<td>M:Leaves are falling</td>
<td>Bec of leaves</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>N:Author wonders why they fall</td>
<td>[unclear]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M:Ground becomes orange-brown</td>
<td>[Bec seeking answers]</td>
<td>[w/ quest for info]</td>
</tr>
<tr>
<td></td>
<td>M:All the animals are climbing trees and are dancing in the wind</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N:Author asks why the wind is colder</td>
<td>[Bec of uncertainty]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N:Why do the squirrels gather nuts</td>
<td>[Bec of finding answers]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M:Author's thoughts wander</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
"Fall"

What is fall? Fall is a time of the year when many changes occur. After a good summer vacation, many young (and some old) people return or "fall" back into school. The weather begins to change as the temperature begins to "fall". The leaves on all the trees change into beautiful colors and then "fall" off their branches. Another word for "fall" is autumn, but autumn is not as easy to define as "fall" is.

You can get a mental picture of what the season is when you here the word "fall." Maybe they should change the word "summer" into "sun", or, maybe change "spring" into "bloom", or even change "winter" into "cold". Well, anyhow. Even if the other season's descriptor words don't change, you can always count on "Fall" and you'll always be able to remember what happens during that time of the year.

<table>
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<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td>M:Students are on vacation</td>
<td>[Bec school is out]</td>
<td>[w/ vacations]</td>
</tr>
<tr>
<td></td>
<td>N:Students return to school</td>
<td>[Bec school resumes]</td>
<td>[w/ vacations, end of]</td>
</tr>
<tr>
<td></td>
<td>M:Fall is time of year when many changes</td>
<td>[Bec a transition time]</td>
<td>[w/ change]</td>
</tr>
<tr>
<td></td>
<td>occur</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Summer</td>
<td>N:The weather changes</td>
<td>Bec temperature falls</td>
<td>[w/ nature]</td>
</tr>
<tr>
<td></td>
<td>N:Leaves change color</td>
<td>[Bec of slowed photosynthesis]</td>
<td></td>
</tr>
<tr>
<td>Fall</td>
<td>N:Leaves fall off branches</td>
<td>[Bec lack of nutrients]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N:Word fall presents mental image of the season</td>
<td>[Bec of homonym]</td>
<td>[w/ author judgment]</td>
</tr>
<tr>
<td></td>
<td>M:Summer should be called sun</td>
<td>[To follow pattern of fall]</td>
<td>[w/ seasonal characteristics]</td>
</tr>
<tr>
<td></td>
<td>M:Fall is called fall</td>
<td>[Bec many things fall]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M:Winter should be called cold</td>
<td>[To follow pattern of fall]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M:Spring should be called bloom</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
</tbody>
</table>
One More Try

These leaves are making one more attempt to be noticed before they return to the dust of the earth. Their crisp crackliness is as if they were crying out to the person stepping on them. "Please notice me." They can no longer be sweet and fragrant, but they try to exude a rubberv, earthy smell to entice the passer by to soak in their presence. These leaves seem to have a longing look. They have been rejected by the tree that held them for such a long time, and now they long for a sense of belonging again. Perhaps some children will gather them together into a big pile and jump into their midst with cries of delight. Then, they would be happy. Perhaps someone will put them into a big pile and set them on fire. Then they could produce a beautiful smoke-flavored fall aroma. Then, maybe someone would take notice of them one more time.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td>w/ personification</td>
</tr>
<tr>
<td>[Past]</td>
<td>M: Tree holds leaves</td>
<td>[To give life]</td>
<td>w/ nature</td>
</tr>
<tr>
<td></td>
<td>M: Tree rejects leaves</td>
<td>[Bec of photosynthesis]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M: Leaves are sweet and fragrant</td>
<td>[Bec fresh]</td>
<td>w/ smell</td>
</tr>
<tr>
<td>[Now]</td>
<td>N: Leaves are crisp and crackly when stepped on</td>
<td>To cry out for attention</td>
<td>w/ touch &amp; sound</td>
</tr>
<tr>
<td></td>
<td>N: Leaves have a longing look</td>
<td>[Bec they want to belong]</td>
<td>w/ personification</td>
</tr>
<tr>
<td></td>
<td>N: Leaves are seeking attention</td>
<td>To entice the passerby</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Leaves try to exude earthy smell</td>
<td></td>
<td>w/ smell</td>
</tr>
<tr>
<td>[Future]</td>
<td>N: Children may gather them into a pile and</td>
<td>[To enjoy them]</td>
<td>w/ touch (&amp; sound?)</td>
</tr>
<tr>
<td></td>
<td>jump into them with cries of delight</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Leaves would be happy</td>
<td>Beck children play in them</td>
<td>w/ fulfillment of desire for</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>attention</td>
</tr>
<tr>
<td></td>
<td>N: Someone may burn them</td>
<td>To allow them to produce</td>
<td>w/ smell</td>
</tr>
<tr>
<td></td>
<td></td>
<td>beautiful smoke</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Leaves produce beautiful smoke</td>
<td>To attract attention</td>
<td>w/ smell</td>
</tr>
<tr>
<td></td>
<td>M: Leaves return to dust of the earth</td>
<td>[Bec part of natural cycle]</td>
<td>w/ nature</td>
</tr>
</tbody>
</table>
Leaves

They are tired with seamed, leathery faces from a lifetime of enduring sun and wind. Some are yellow with age, some brown and bent. They have lived their lives well, gathering and processing food for later generations. But now they are tired and have gently fallen to a bed of well deserved rest.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLL</th>
<th>COHESION:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>[Past]</td>
<td>M:Leaves live well</td>
<td>[Possibly because they've provided well]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>M:Leaves gather and process food</td>
<td>To provide for future generations</td>
<td></td>
</tr>
<tr>
<td>[Now]</td>
<td>N:Leaves are tired</td>
<td>Bec of lifetime of enduring sun &amp; wind</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:Leaves have seamed, leathery faces</td>
<td>&quot; &quot;</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:Some are yellow</td>
<td>Bec of age</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:Some are brown &amp; bent</td>
<td>&quot; &quot;</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:Leaves gently fall to bed of well deserved rest</td>
<td>Bec they are tired</td>
<td></td>
</tr>
</tbody>
</table>

[w/ natural process]
404 Fall Leaves

The leaves of fall are dry, coarse, and old. They smell stale. Their colors are drab brown and yellow. If you bend the leaf, it breaks. It isn’t fresh like the spring and summer leaf, it’s just the opposite, dry and decayed. The leaves of fall are symbolic of death.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spring &amp; Summer</td>
<td>M: Leaves are fresh</td>
<td>[Bec new]</td>
<td>[w/nature]</td>
</tr>
<tr>
<td>Fall</td>
<td>N: Leaves are dry, coarse, old, &amp; decayed</td>
<td>Bec old</td>
<td>[w/ sight &amp; touch]</td>
</tr>
<tr>
<td></td>
<td>N: Leaves smell stale</td>
<td>&quot; &quot;</td>
<td>[w/ smell]</td>
</tr>
<tr>
<td></td>
<td>N: Colors are drab brown &amp; yellow</td>
<td>&quot; &quot;</td>
<td>[w/ sight]</td>
</tr>
<tr>
<td></td>
<td>N: They break when bent</td>
<td>&quot; &quot;</td>
<td>[w/ touch]</td>
</tr>
<tr>
<td></td>
<td>N: Fall leaves symbolize death</td>
<td>[Bec of similarities]</td>
<td>[w/ death]</td>
</tr>
</tbody>
</table>
442 Leaves

The leaves have different hues of color indicative of the changing season: they are brown, and red, or green and yellow. They are in transition to becoming totally brown and crisp so that when you walk through them, they crunch, and break down. This is all part of the process of adding particles to the soil to make it fertile and productive. The leaves should not all be raked up and bagged in plastic to rot without giving back to the land. Down with plastic bags!

Fall leaves are useful for adding beauty to our lives, for reminding us of the changes in life. They are like a signal to get ready because we are all mortal. Fall leaves remind me of old people who are sweet and gentle and full of wisdom from a life well lived and blessed by God. They have some scars on them and they don't have the fresh green color of spring but their beauty is a deeper sort.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spring</td>
<td>M:Leaves have fresh green color</td>
<td>[Bec they are new]</td>
<td>[w/ sight]</td>
</tr>
<tr>
<td>Fall</td>
<td>N:Leaves are different hues</td>
<td>[Bec it is fall]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N:Leaves are brown &amp; red or green &amp; yellow</td>
<td>Bec in transition</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N:Leaves are becoming brown &amp; crisp</td>
<td>[Bec of shortened days]</td>
<td>[w/ sight &amp; touch]</td>
</tr>
<tr>
<td></td>
<td>N:Leaves crunch &amp; break down</td>
<td>[Bec they are dry]</td>
<td>[w/ touch]</td>
</tr>
<tr>
<td></td>
<td>M:Leaves add particles to the soil</td>
<td>To make it productive</td>
<td>[w/ biological process]</td>
</tr>
<tr>
<td></td>
<td>M:Leaves should not be raked and bagged</td>
<td>[Bec ground needs nutrients]</td>
<td>[w/ author evaluation]</td>
</tr>
<tr>
<td></td>
<td>M:Plastic bags should be banned</td>
<td>Bec they rob ground</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>M:Leaves are useful</td>
<td>Bec they add beauty to our lives &amp; remind us of changes</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:They are like a signal to get ready</td>
<td>Bec we are mortal</td>
<td>[w/ death]</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>[Winter/death]</td>
<td>N:They remind author of old people who are sweet &amp; gentle &amp; full of wisdom</td>
<td>Bec they've lived well &amp; been blessed by God</td>
<td>[w/ personification]</td>
</tr>
<tr>
<td></td>
<td>N:They have some scars</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>N:They don't have fresh green color of spring</td>
<td></td>
<td>[w/ nature &amp; humanity]</td>
</tr>
<tr>
<td></td>
<td>N:Their beauty is of a deeper sort</td>
<td></td>
<td>[w/ author evaluation]</td>
</tr>
</tbody>
</table>
448 Fall Leaves

They are many different colors, shapes, and sizes, and each one is different—uniquely beautiful. Sometimes they are found together, in groups, and sometimes they are all alone. They may be old and wrinkled with veinous skins, or supple and vibrant with smooth skins. Noisy and restless, they are always in motion and find their way into every neighborhood, every city, and every small town. They are affected by the blowing wind, the shining sun, the falling rain, and the swirling snow. They live short but colorful lives: like falling stars, they brighten the earth briefly and are swept away.

<table>
<thead>
<tr>
<th>SLOT Time</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fall</td>
<td>M: Each leaf is uniquely beautiful</td>
<td>Bec they are many different colors, shapes, &amp; sizes</td>
<td>[w/ variety in nature]</td>
</tr>
<tr>
<td></td>
<td>N: Some are in groups/alone</td>
<td>[Bec of variety of tree]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Some are old, wrinkled, &amp; veined</td>
<td>[Bec in process of decay]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: Some are supple, vibrant, &amp; smooth</td>
<td>[Bec recently fallen]</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: They are noisy &amp; restless</td>
<td>Bec always in motion</td>
<td>[w/ sound &amp; motion]</td>
</tr>
<tr>
<td></td>
<td>N: They find their way everywhere</td>
<td>Bec affected by wind, sun, rain, snow</td>
<td></td>
</tr>
<tr>
<td></td>
<td>N: They live short colorful lives</td>
<td>[Bec of their nature]</td>
<td>[w/ purposeful activity &amp; weather]</td>
</tr>
<tr>
<td></td>
<td>N: They are like falling stars</td>
<td>Bec they brighten the earth briefly and depart</td>
<td>[w/ nature &amp; analogy to stars]</td>
</tr>
</tbody>
</table>
Some of the leaves were soft and leathery while others are a plastic stiff. Yet some are so crisp as crumble at the pressure of my fingers squeezing them into each other. The smell reminds me of so many fall days where the trees release in a final gasp, their life for the winter. The smell is often sweet like honey and spice, but more akin to the musty stagnated smell of a wasp's nest that has be abandon for years and cracked open to be explored.

The colors are a mixture of light brown fading ever so gradually into a dark moev (purplish) only to be separated by dusty green shade. Others are cheery lime green that have traces of yellow. The lines and shapes of the veins and stems run in all directions, but predominantly fan out from a central purposeful mode. The thickness of the channels diminishes as the once functioning hollows carried food to the more extended regions of the leaves. The intersection where various leave attach to the mainstem, is a large (relative to the stem itself) knob or welt indicating an extra strength or security to keep them in place.

The simbol type tinker of leaves rubbing against leaves is dull, but still orchestrate a symphony that is nice to here.

<table>
<thead>
<tr>
<th>SLOT Time</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Earlier falls</td>
<td>M: Smell reminds author of fall days when trees go dormant</td>
<td>Bec of memories</td>
<td>[w/ smell]</td>
</tr>
<tr>
<td>M: Smell is sweet</td>
<td></td>
<td>Bec like honey &amp; spice</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>M: But more like musty stagnated smell</td>
<td></td>
<td>Bec like abandoned wasp's nest</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Some leaves are soft &amp; leathery</td>
<td>[Now]</td>
<td>Bec freshly fallen</td>
<td>[w/ touch]</td>
</tr>
<tr>
<td>N: Some are plastic stiff</td>
<td></td>
<td>Bec dried out</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Some crumble</td>
<td></td>
<td>Bec they are so crisp</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Colors are light brown mixed with mauve &amp; dusty green or lime green with yellow</td>
<td></td>
<td>[Bec of slowed photosynthesis]</td>
<td>[w/ sight]</td>
</tr>
<tr>
<td>N: Veins &amp; stems run all directions from central node</td>
<td></td>
<td>To carry nutrients</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Channels decrease in size</td>
<td></td>
<td>[Unclear-- Bec fewer nutrients are moved?]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Place where leaf attaches to stem is enlarged</td>
<td></td>
<td>To give extra strength</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td>N: Leaves rubbing together sound like tinkle of cymbals</td>
<td></td>
<td>[Spelling makes intent unclear-]</td>
<td>[w/ sound]</td>
</tr>
<tr>
<td>Winter</td>
<td></td>
<td>Bec like a symphony?</td>
<td></td>
</tr>
<tr>
<td>M: Trees go dormant</td>
<td></td>
<td>Bec of nature's cycles</td>
<td>[w/ nature]</td>
</tr>
</tbody>
</table>
337 Fall Leaves

The color spectrum is wide, giving an array of color. There is the soft greens of spring advancing to the more bold and dominating hue. However, that is not the beginning but only the commencement. A soft yellow is observed darkening to a burnt orange shade and even to a brown. Brown is not the colour of being past the stage of beauty but only adds to the array. Enhacing the spectrum are leaves of red. They blend into the spectrum yet they stand out, as unique, as the ultimate.

One one leaf the colours do not occur in isolation. Each leaf is unique, an individual.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION: [w/nature]</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td>M: &quot;That is not the beginning but only the commencement&quot;</td>
<td>[Unclear]</td>
<td>[unclear]</td>
</tr>
<tr>
<td>Spring</td>
<td>M: Leaves are soft green</td>
<td>[Bec new]</td>
<td>[w/ sight]</td>
</tr>
<tr>
<td>Fall</td>
<td>N: Leaves chg to bold &amp; dominating colors</td>
<td>[Bec of slowing photosynthesis]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Colors vary widely</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Soft yellow darkens to burnt orange &amp; brown</td>
<td>&quot; &quot;</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Brown isn't drab but adds to beauty</td>
<td>[Bec it enhances the spectrum]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Red leaves enhance the spectrum</td>
<td>Bec they blend into spectrum, yet stand out as unique</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Colors do not occur in isolation on one leaf</td>
<td>[Non sequitur]</td>
<td>&quot; &quot;</td>
</tr>
<tr>
<td></td>
<td>N: Each leaf is unique</td>
<td>Bec an individual</td>
<td>[w/ author evaluation]</td>
</tr>
</tbody>
</table>
Leaves
The leaves are different colors & shapes. Some lay flat, some curl a little & some are almost folded in half. One looks like it was someone's lunch. One leaf is rough. With several of the others, you can feel all of the veins. One feels almost like paper and one is soft as velvet.

Some leaves are one color and some have 4 colors combined.

They smell like fresh cut grass, almost spring-like.

Some have several points on them while some only have one point at each end. They all have stems on them.

One of them crunches when you touch it.

<table>
<thead>
<tr>
<th>SLOT</th>
<th>CLASS</th>
<th>ROLE</th>
<th>COHESION: [w/ senses]</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td>N:Leaves are different colors</td>
<td>[From different PP]--Bec some have only one color, some four colors mixed</td>
<td>[w/ sight]</td>
</tr>
<tr>
<td></td>
<td>N:Leaves have different shapes</td>
<td>Bec some are flat, curled, folded in half</td>
<td></td>
</tr>
<tr>
<td>N:[Bug] ate one leaf</td>
<td></td>
<td>[Bec holes in leaf]</td>
<td></td>
</tr>
<tr>
<td>N:One is rough</td>
<td>[Bec of variety of tree or Bec dry?]</td>
<td>[w/ touch]</td>
<td></td>
</tr>
<tr>
<td>N:On several, veins can be felt</td>
<td>&quot;</td>
<td>&quot;</td>
<td></td>
</tr>
<tr>
<td>N:One feels like paper</td>
<td>[Bec quite dry]</td>
<td>&quot;</td>
<td></td>
</tr>
<tr>
<td>N:One is like velvet</td>
<td>[Bec soft]</td>
<td>&quot;</td>
<td></td>
</tr>
<tr>
<td>N:Leaves smell like fresh cut grass</td>
<td>[Unclear]--Bec like spring</td>
<td>[w/ smell]</td>
<td></td>
</tr>
<tr>
<td>N:Some have several points</td>
<td>[Bec of variety of tree]</td>
<td>[w/ sight]</td>
<td></td>
</tr>
<tr>
<td>N:Some have only one point</td>
<td>&quot;</td>
<td>&quot;</td>
<td></td>
</tr>
<tr>
<td>N:All have stems</td>
<td>[Bec necessary for life]</td>
<td>&quot;</td>
<td></td>
</tr>
<tr>
<td>N:One crunches when touched</td>
<td>[Bec dried out]</td>
<td>[w/ touch]</td>
<td></td>
</tr>
</tbody>
</table>
Would any other object look so lovely in their death as the leaf? Their intricate shapes with never on exactly the same, could only be formed by nature. The colors on just one leaf consist of anything from hues of gold, auburn, green, brown, orange, and blue. Their spicy scent delicately fills the air around them. For their frail appearance they are incredibly smooth and elastic. Their sharp points taper off into threads almost too thin to see. The thin stem splits into veins that support the umbrellaed shape of the leaf.

<table>
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<tr>
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<th>CLASS</th>
<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>N:Leaves look beautiful as they die</td>
<td>[Bec of shape &amp; color?]</td>
<td>[w/ author evaluation]</td>
<td></td>
</tr>
<tr>
<td>N:Their intricate shapes are unique</td>
<td>[Bec formed by nature]</td>
<td>[w/ sight]</td>
<td></td>
</tr>
<tr>
<td>[Spelling/grammar make this unclear]</td>
<td>[Bec of variety]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>N:Colors on individual leaf may vary from gold, auburn, green, brown, orange, blue</td>
<td>[Bec oils are released]</td>
<td>[w/ smell]</td>
<td></td>
</tr>
<tr>
<td>M:Spicy scent fills the air</td>
<td>[Bec not yet fully dried]</td>
<td>[w/ touch &amp; author surprise]</td>
<td></td>
</tr>
<tr>
<td>M:Leaves look fragile but are smooth &amp; elastic</td>
<td>[Bec of type of leaf]</td>
<td>[w/ sight]</td>
<td></td>
</tr>
<tr>
<td>N:Their sharp points taper off</td>
<td>To support shape of leaf</td>
<td></td>
<td></td>
</tr>
<tr>
<td>N:Thin stems split into veins</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
458 Fall Leaves
The leaves are rough, and have mixed colors of brown and orange. Some are different in shape and texture. They have a stem at the end. Some stems have six leaves combine. One stem contains only one large leaf, this leaf has three colors. Its purple, brown and lime green its a tough leaf. I am examining two types of leaves with different shapes and lines. I think that these leaves come from different trees but each are similar in some way.

<table>
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<tr>
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<th>ROLE</th>
<th>COHESION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fall</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>M: Leaves are rough</td>
<td>[Bec dried]</td>
<td>[w/ touch]</td>
<td></td>
</tr>
<tr>
<td>N: They are brown &amp; orange mixed</td>
<td>[Bec of photosynthesis]</td>
<td>[w/ sight]</td>
<td></td>
</tr>
<tr>
<td>N: They are different in shape &amp; texture</td>
<td>[Bec from different sources]</td>
<td>[w/ sight &amp; touch]</td>
<td></td>
</tr>
<tr>
<td>N: They have a stem at the end</td>
<td>[To connect with tree]</td>
<td>[w/ sight]</td>
<td></td>
</tr>
<tr>
<td>N: Some stems have clusters of leaves-- [grammar here is unclear]</td>
<td>[Bec of species]</td>
<td>” ”</td>
<td></td>
</tr>
<tr>
<td>N: One stem has one large tough leaf which is purple, brown, &amp; lime green [sentence structure is confusing here]</td>
<td>[Bec of photosynthesis]</td>
<td>” ”</td>
<td></td>
</tr>
<tr>
<td>M: Two leaves are from different trees</td>
<td>Inferred--Bec they have different shapes &amp; lines</td>
<td>[w/ types of foliage]</td>
<td></td>
</tr>
<tr>
<td>M: Two leaves are similar</td>
<td>[Bec of shared characteristics]</td>
<td>[w/ sight]</td>
<td></td>
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