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# A descriptive study of reading miscues of Spanish-speaking elementary school children.

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A DESCRIPTIVE STUDY OF  
READING MISCUES OF SPANISH-SPEAKING  
ELEMENTARY SCHOOL CHILDREN

A Dissertation Presented

By

DIANA T. RIVERA VIERA

Submitted to the Graduate School of the  
University of Massachusetts in partial fulfillment  
of the requirements for the degree of

DOCTOR OF EDUCATION

February 1978

Education

A DESCRIPTIVE STUDY OF  
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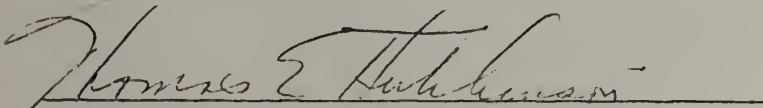
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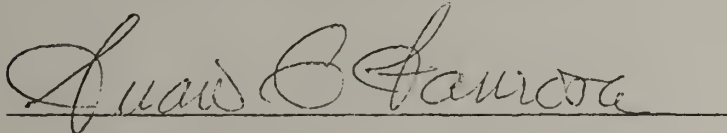
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School of Education



To Payo and my

small friends

in Manuel A. Pérez

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## ABSTRACT

A DESCRIPTIVE STUDY OF  
READING MISCUES OF SPANISH-SPEAKING  
ELEMENTARY SCHOOL CHILDREN

(February 1978)

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In recent years, a number of studies have addressed the question of how children process reading within the framework of a psycholinguistic model. Most of these studies have addressed the oral reading behavior of English-speaking subjects reading in their native language. Kenneth Goodman (1965), who developed this psycholinguistic model, has hypothesized that the most important indicators of reading comprehension are those miscues the subject produces which are syntactically and semantically acceptable.

The major purposes of this study were: (1) to explore the relationship between the percentage of syntactically and/or semantically acceptable miscues made during oral reading and comprehension scores for a group of proficient and non-proficient Spanish-speaking subjects reading seven stories in Spanish which were said to be at different levels of reading difficulty; (2) to analyze the miscues made during oral reading using the RMI questions in order to determine

if previous findings of miscue research were also valid for this different linguistic population; and (3) to explore what differences there were, if any, in the use of reading strategies in Spanish.

The study conducted was exploratory. The subjects were eight Spanish-speaking Puerto Rican third grade students enrolled in an inner-city elementary school in San Juan, Puerto Rico.

The instrument used to obtain the measurements desired was the Reading Miscue Inventory (RMI) developed by Yetta Goodman and Carolyn L. Burke (1972).

Results of the study indicate that the percentage of syntactically and/or semantically acceptable miscues produced by a reader had a significant relation to reading comprehension scores.

When comparing the proficient and non-proficient readers it was found that proficient readers rely most on the syntactic and semantic cue systems in reading rather than on grapho/phonic information.

Results of the study appear to support previous miscue research findings regarding the use of cue systems by proficient and non-proficient readers. No important differences were found in terms of the reading process regarding Spanish and the use of the RMI as a research tool for studies with Spanish-speakers seemed valid.

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## C H A P T E R I

## A. The Problem

In industrialized societies such as the United States and Puerto Rico, socio-economic advancement is deeply dependent on an individual's capacity to be successful in educational endeavors. As minimum educational requirements for employment continue to rise, it becomes vital that individuals prepare themselves academically as best they possibly can in order to make an adequate living.

Since the development of compulsory mass education it has been traditionally understood that it is the school's responsibility to provide students with the necessary skills to be successful.

Academic success within our educational system is highly dependent on the individual's reading ability. From the second grade on the school curriculum relies almost exclusively on reading.

Although there has been wide recognition that reading instruction is one of the basic skills that students must develop, the fact remains that many of the students enrolled in our public schools have considerable difficulties in reading. In Puerto Rico pupil retention in schools is a problem; a large number of students drop out of school and most of those that drop out have very limited reading skills or are completely illiterate.

The approach in dealing with this state of affairs has been similar to that used to address other problems in society. William Ryan (1972) has labelled this approach as "blaming the victim."

In Puerto Rico, students' reading ability is frequently evaluated through the use of standardized reading tests designed and normalized for Puerto Rico. These tests, however, only provide percentages and norms so that their use as diagnostic tests which can provide some valuable information to the classroom teacher is very limited. Evaluations are frequently made when a new political party is in power as an assessment of the previous administration's work. During the last 12 years Puerto Rico has experienced a change in government every four years. Results of reading achievement are passed on from the Department of Education, which is the centralized educational agency, to the district superintendents. Superintendents discuss results with the school principals who fall under their jurisdiction and principals discuss results with the teachers in their respective schools. Results invariably indicate that the reading achievement of pupils in inner city schools and in the highlands is below the expected reading level for their grade. Teachers, who are frustrated by the results of their efforts, continue to pass on the responsibility for poor results to their students. The process of "blaming the victim" implies that reading problems are a result of the students' limited capacity, which in turn

is caused by the pupils' environment. Teachers and administrators point out that the school system is doing all it can but that the disadvantages the students bring are the cause of the reading problem. They contend that one cannot expect more from students who are "culturally disadvantaged". Monies are frequently secured to develop enrichment programs which will hopefully make up for the deficiencies in the students environment. The theory of cultural deprivation is maintained by blaming the victim.

The researcher contends that this approach to the "reading problem" has permeated research efforts in reading as well as reading instruction. By blaming the victim we have guided our educational efforts in the wrong direction. Notably missing has been an attempt to understand what the reading process involves. We have viewed the reader as a passive component in reading and have not recognized the wealth of knowledge that the reader, a language user, brings to the reading situation. We have done quite the contrary; overstated the readers' disabilities or handicaps. Our lack of knowledge has led us to implement different reading programs in schools in such a way that teachers have become mere implementors of one reading method or another with little theoretical knowledge of the process.

In the last decade, Kenneth Goodman and others have re-examined our views of the reading process and have suggested a new approach to reading research. The two most important



contributions of this new approach are: the reading model which has evolved and the theoretical position which underlies the model.

The theory of the reading process that is being developed envisions the reading process as an interaction between language and thought. In this interaction the reader, who is a language user, is an active participant who brings his/her acquired skills in language use to the reading situation. By observing the behavior of the subject during oral reading we can use the reading model in the analysis of what the reader is doing to get to the meaning of the material. The basic assumption is that the goal of reading activity is to comprehend.

Research studies conducted with a clear theoretical model in mind, such as that developed by Kenneth Goodman can produce a greater understanding of the reading process. Research data produced can be useful not only for the specific conclusions it arrives at but also as data to support or reject the assumptions on which the reading model is based. These findings can have a direct impact on our approach to reading instruction.

The second major contribution made by the Goodman Reading Model is most related to its approach to the reading problem. The assumptions underlying the theory, because of their psycholinguistic nature, recognize the wealth of information and skills that the subject brings to the reading situation.

This departs significantly from our previous approach to reading instruction. In the past we have been concerned with the effectiveness of a variety of "reading methods" used in reading instruction with little regard for what the reader brings to the reading situation. We have not examined our students' reading behavior to determine what the reader is telling us about his/her strengths and weaknesses. By not recognizing the psycholinguistic nature of the process we have ignored the study of the interaction between the reader and written language. In many instances our teaching methods have hindered our students' development of reading strategies because they have focused our attention on the method and not the reader. When our objectives are not accomplished we hold the reader responsible. We say that he/she is incapable of learning to read, and that, given the conditions in which they have been raised; parents who don't help them develop their vocabulary, deficient pronunciation, too little reading material available in the home, lack of motivation due to the dynamics of their social environment, etc., one cannot expect proficiency in reading ability.

The so called "reading problem" of "disadvantaged students" is clearly a case of "blaming the victim".

Goodman maintains that by recognizing the psycholinguistic nature of the reading process we are in fact restructuring our whole conception of what the important components in the process are. Teachers roles as reading instructors must be

re-evaluated so that we may observe a student, acknowledge his/her strengths and build on these through the development of activities which will enhance their effective use of reading strategies. Goodman is manifesting in a subtle way that we must stop blaming the victim.

Reading research using the Goodman Reading Model as a theoretical construct has been produced since the mid 1960's. Because of its recent development and the descriptive nature of the data produced, its major efforts are directed towards the accumulation of data which can document the model's postulates. In addition to producing data to test and improve the model, the people involved in miscue research have very consistently made specific recommendations based on their findings directed to the classroom teacher in an effort to provide guidelines which will improve teacher effectiveness as facilitators in reading instruction. This is an additional contribution of miscue research to reading instruction; it has maintained its focus on the ultimate goal of reading research: to generate knowledge which can be translated into more effective reading instruction by providing educators with a clear understanding of what reading activity involves.

Research in reading must be evaluated on the basis of its contribution to our knowledge of the reading process and to what extent the knowledge gained has a direct effect on improved learning situations.

Since 1898 when Puerto Rico became a possession of the United States, the Puerto Rican school system, its curriculum and objectives have been a carbon copy of those developed for the United States. Puerto Rico spends one third of its national economic resources in public education and yet, considerable numbers of public school students are functionally illiterate.

Of the studies conducted in miscue research, only one has addressed the research question in terms of the oral reading behavior of native Spanish-speakers reading in Spanish.

Puerto Rico needs to begin research efforts within a clearly stated theoretical model such as Goodman's which can serve as the basis for improved decision-making in the area of reading instruction. This research project is the first study in miscue research which is conducted with Puerto Rican subjects reading in their native language.

One of the principle assumptions of the Goodman model is that the ultimate goal in reading is comprehension. Reading proficiency must then be defined in terms of how well the subject is using reading strategies to construct meaning. In this quest for comprehension, the subject uses reading strategies which may or may not facilitate the achievement of the goal.

Goodman sustains the notion that the most important single indicator of a reader's proficiency is the semantic acceptability of his/her oral reading errors. Yet, this



specific variable has not been singled out previously in order to explore the validity of this assumption.

This study attempted to explore the relationship between the percentage of semantically and/or syntactically acceptable miscues made during oral reading of a story and comprehension scores for a group of proficient and non-proficient Spanish speaking readers reading seven stories in Spanish which are said to be at different reading levels.

The instrument used in the study was the Reading Miscue Inventory (RMI) which is a diagnostic instrument developed by Yetta Goodman and Carolyn L. Burke in 1972. The RMI provides for the examination of errors made during oral reading in a series of categories, one of which is the semantic acceptability of the errors made. It also points out procedures for obtaining comprehension scores for the materials used in oral reading.

By analyzing the subjects' reading errors in the category of semantic acceptability, the researcher could explore how this category relates to comprehension.

If Goodman's assumption about importance of this variable as an indicator of comprehension is valid, it could be expected that the greater the percentage of semantically acceptable miscues, the higher the scores on comprehension. By using seven stories graded in reading difficulty, it could be expected that as reading material becomes more

difficult, comprehension and production of semantically acceptable errors would be reduced.

Findings in miscue research which will be discussed in the following chapter have also suggested that: (1) the use of reading strategies varies when subjects are reading materials which are difficult for them. Results have indicated that as the materials become more difficult for the reader the use of semantic cues is reduced in the proficient reader and greater use is made of grapho/phonic and syntactic cues (Carlson, 1970). (2) the use of reading strategies vary in poor and proficient readers with a greater dependency on grapho/phonic and syntactic cues in the poor readers while proficient subjects use syntactic and semantic cues more extensively and with greater success (C. L. Burke & Goodman, 1970). (3) people learn to read only once and that although specific reading strategies may vary when reading different languages, the process of deriving meaning from systematized graphic display is the same (Buck, 1973).

The design of the study tried to address these assumptions documented in previous miscue research in addition to addressing the specific question of whether or not an important relationship exists between the semantic acceptability of oral reading miscues and comprehension. ✓

The researcher's interest in using the RMI with Puerto Rican subjects reading in Spanish served a two-fold purpose. First, to explore the specific relationship proposed, and

second, to examine the importance of each question asked in miscue analysis for subjects reading in Spanish.

Although it has been suggested that people learn to read only once, it is understood that there may be variations in the use of different reading strategies when reading in different languages. By examining the results of this specific study, the researcher could investigate which of the findings indicated in other miscue studies are applicable to this linguistically distinct population. Results could indicate the relative importance of the different miscue categories for reading comprehension and also, the pattern of use of reading strategies for Spanish. One important consideration in the study was sampling from Puerto Rican subjects born and raised in Puerto Rico who had no previous significant contact with a second language such as English. The objective was to secure subjects whose miscues would not indicate language interference since it could affect the patterns of use of reading strategies.

The use of a Hispanic population could also appraise difficulties in the design or use of the RMI for a substantially different population.

#### B. Purposes of the research

The following are the major purposes of the study:

a) to explore the relationship between the percentage of semantically acceptable reading miscues and the subjects'

comprehension of the material across seven stories of increasing difficulty for Spanish-speaking subjects reading in Spanish.

2) to analyze the miscues made during oral reading in different categories presented in the RMI to determine if previous findings of miscue research are equally valid for this distinctively different linguistic population.

3) to explore what differences there are, if any, between the use of reading strategies in Spanish and in English.

4) to explore the validity of the use of the instrument for a population which is culturally and linguistically different.

5) to develop the procedures for the retelling and calculation of comprehension scores in more clearly observational or measurable terms so that they can be more rigorously validated in research studies.

6) to provide data and stimulate further research into the nature of the reading process within this theoretical model using Spanish-speakers reading in their native language specially for the Puerto Rican population.

### C. A psycholinguistic view of reading

"Reading is the receptive phase of written communication" (Goodman, 1967, p. 1). It is understood as a process by which meaning is derived from written language. "The reader, a user of language, interacts with the graphic input as he



seeks to reconstruct a message encoded by the writer" (Goodman, 1969, p. 15) so that reading becomes an active process in which the objective is to achieve comprehension of the material. The reader must "actively bring to bear his knowledge of language, his past experience, his conceptual attainments on the processing of language information encoded in the form of graphic symbols in order to decode the written language". Reading must, therefore, be regarded as an interaction between the reader and written language..." (Goodman, 1967, p. 1) so that it represents an interaction between language and thought. It is, therefore, a psycholinguistic process.

A basic assumption underlying the theory is that "the reader uses his intuitive knowledge of the way his language works to help him make useful predictions about the material on the printed page" (Sims, 1972, p. 4).

Prediction or "hypothesis testing" becomes necessary during reading because the reader has a limited capacity for processing and storing visual information. Thus, the reader cannot depend solely on the visual information displayed in the printed page. He must use his previous knowledge of the rules that govern his language to make successful predictions of the text while reading. The idea is to pick and choose from the available information only enough to select and predict a language structure which is decodable (Goodman, 1969).

Visual information must, therefore, be complemented by other sources of information. This non-visual information comes from the reader's previous experiences as a language user.

Noam Chomsky re-emphasized the distinction between two levels of language which become specially important in this psycholinguistic view of reading.

The physical aspects of a sentence, the ink marks of paper, represent it's surface structure while the meaning derived from the surface structure is defined as the deep structure. These two levels of language are bridged by syntax. Syntax, or the set of rules that determine how words are organized in sentences, allow the reader to reach the deep structure or meaning of the material being read. These syntactic rules, which are not formally taught, are the means for arriving at the meaning of the sentence or it's deep structure. The reader utilizes his knowledge of the rules that govern a language to gain comprehension.

Miller (1965) illustrated the importance of syntax as the bridge between the surface and deep structures of language. One of Miller's examples illustrates this relationship. In the sentence They are hunting dogs, one can assign different deep structures to the sentence depending on how the words are grouped. The deep structure is different if we group are hunting as the verb or if we group hunting dogs as the noun.

Taking into account the syntactic structure of the sentence is important to determine the deep structure of the sentence.

The reader must then rely not only on the graphic display of the ink marks, but also on his previous experience with language to arrive at the meaning. He needs to determine if what he is reading sounds like language to him; if it makes sense.

In this active process of information processing, the reader utilizes three basic kinds of information. These are:

Grapho/phonic. This is the information from the graphic system, and the phonological system of oral language. Additional information comes to the reader from the interrelationships between the systems. Phonics is the name for instructional strategies which attempt to teach those relationships.

Syntactic Information. This is the information implicit in the grammatical structures of the language. The language user knows these structures and, therefore, is able to use this information before he learns to read his native language. Reading, like all language processes, involves a syntactic context.

Semantic Information. As he strives to recreate the message, the reader utilizes his experiential conceptual background to create a meaning context. If the reader lacks relevant knowledge, he cannot supply this semantic component and he cannot read. In this sense, all readers regardless



of their general reading proficiency are incapable of reading some material in their native language (Goodman, 1969, p.17).

The reader makes choices which he thinks fit the semantic, syntactic and grapho/phonic constraints of the language in an effort to comprehend. Reading becomes a psycholinguistic guessing game which involves guesses and predictions in which these three cue systems function as verification strategies. The phonemic/graphemic, syntactic and semantic cue systems act together to produce redundant interrelated information. Proficient readers use the least information needed to arrive at the meaning.

Goodman explained that:

Since the reader's goal is meaning, he uses as much or as little of each of these kinds of information as is necessary to get to the meaning. He makes predictions of the grammatical structure, using the control over language structure he learned when he learned oral language. He supplies semantic concepts to get the meaning from the structure. In turn his sense of syntactic structure and meaning make it possible to predict the graphic input so he is highly selective, sampling the print to confirm his prediction. In reading, what the reader thinks he sees is partly what he sees, but largely what he expects to see. As readers become more efficient, they use less and less graphic input. (K. Goodman, 1973)

The mistakes the reader makes during oral reading are viewed, within this theory, as a natural part of the reading process. The reader while sampling, uses the different cue systems available. Goodman has assumed that "the responses to the graphic display are caused and are not accidental or capricious" and that "observed responses which do not correspond



to expected responses are generated through the same process as expected ones" (Goodman, 1969, p. 12).

The term miscue is introduced to replace the term error in order to avoid the negative connotation of the latter term. Miscues indicate a deviation from the expected response, but this doesn't imply that all miscues are necessarily negative and that good reading is free of miscues.

The ultimate goal of reading is comprehension so miscues must be evaluated based on the degree to which it disrupts the meaning of the written material. The number of miscues a reader makes is less significant than the meaning of the language which results when a miscue has occurred. (Y. Goodman, 1972)

When a reader says: "He looked at the tiny bird" instead of "He looked at the small bird", he is indicating comprehension of the text. He has translated the term to one with the same deep structure. This would be considered a high quality miscue.

Miscue quality becomes more of an issue within this view of reading. When miscues are analyzed in terms of the degree to which they disrupt or alter the meaning of the material we are faced with varying degrees of quality of a miscue and possibly an indication of the sampling strategies the reader is using.

Goodman contends that by comparing the way in which oral reading miscues differ from the expected response we can gain insights into how the reading process is operating in a particular reader. Research studies based on Goodman's model of

reading comprise a sub-field in oral reading studies known as miscue research.

#### D. Specific Problem

The present study proposes to explore through the analysis of young children's reading miscues how the percentage of semantically\* and/or syntactically\*\* acceptable miscues made during oral reading relate to comprehension scores\*\*\* as measured by the Reading Miscue Inventory (RMI) procedure for a group of non-proficient readers and a group of proficient readers as well as within each child when given seven stories to read in Spanish which are said to be at different reading levels.

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\*This in an operational procedure detailed in the RMI which determines the acceptability in meaning of miscues made during oral reading.

\*\*This in an operational procedure detailed in the RMI which determines the grammatical acceptability of miscues made during oral reading.

\*\*\*Obtaining comprehension scores is a process which consists of two parts. The first part being the collection of data by having the reader do the retelling of the story. The researcher has developed an operational definition and procedure for the retelling. The measurement of comprehension scores is the second part and an operational procedure has been established in the RMI.

## E. Definition of Terms

1. Miscues: Any observed responses produced by the reader during oral reading which differs from the expected response.

2. Syntactically acceptable miscues: Miscues which result in a sentence with completely acceptable grammar. The syntactical acceptability focuses on the success with which the reader is coping with the structure of the text sentences. An example of a complete acceptable syntactical miscue is the following:

reader: The plants ate the ripe grapes.

text: The boys ate the ripe grapes.

There are instances in which the miscue produces acceptable syntax only with the prior portion of the sentence or with the portion following the miscue. These are considered partially acceptable syntactical miscues and are not the concern of this study. An example of partial acceptability:

reader: He take David every day.

text: He took David every day.

The miscue is grammatically acceptable only with the portion following the miscue: "take David every day" and is not acceptable with the portion prior to the miscue "He took."

3. Semantically acceptable miscues: Miscues which have completely acceptable meaning.

The words in a sentence have both a grammatical organization and semantic organization. There can be acceptable grammar without acceptable meaning. It is grammatically acceptable to say The plants ate the ripe grapes although it is not semantically acceptable to do so.

The semantic acceptability focuses on the success with which the reader is producing understandable structures. Miscues can occur in semantically acceptable sentences which differ from the text meaning. When a reader says: "She had a little canary" for "She had a small canary" the miscue is not only semantically acceptable but also retains the meaning of the text. This doesn't necessarily occur all the time and the concern in this study is whether the miscue is semantically acceptable with no consideration for the fact of the retention of meaning:

The following is an example of a semantically acceptable miscue:

reader: He was folding a check.

text : He was holding a check.

There are instances in which the miscue produced is partially acceptable with regard to prior parts of the sentence or with regard to the portion of the sentence which follows the miscue. These partially acceptable semantic miscues are not the concern of this study. An example of this type of miscue:



reader: Susan was hoping around the house.

text : Susan was hopping around the house.

The miscue is partially acceptable because it is acceptable with the sentence portion prior to the miscue.

Susan was hoping around the house.

#### F. Rationale and significance of the research

Given the in-depth analysis of miscues which is required when using the RMI in a study, miscue studies using the Goodman Taxonomy or the RMI must use relatively small numbers of subjects. Each study addresses a specific research question and also provides documentation to support or reject other postulates of the reading model. There are theoretical assumptions which have been consistently supported in the observed behavior of subjects across various studies. These findings, which will be discussed in the following chapter, indicate some patterns in the use of reading strategies. These patterns seem to be rather consistent across children involved in the studies. On the other hand, alterations from these patterns can be expected when the language is other than English, which has been the language involved in the studies conducted in miscue research. The researcher considered it important to observe the oral reading behavior of Spanish-speakers reading in their native language to explore the validity of the model's assumptions for native Spanish-speakers reading in Spanish.

If we were to find that the nature of the variations in the use of Spanish doesn't affect the validity of prior conclusions, we are making a contribution to the model by increasing it's generability to another language. If, on the contrary, we find that the differences are major, we can help document what theoretical assumptions may in effect be generalizable to Spanish and which hypotheses appear to be valid only within the constraints of the language involved in miscue research to the present, English.

It has been suggested that there is a significant relationship between the semantic acceptability of errors and comprehension. If in fact this tendency is manifested in the study, we are reinforcing the picture concerning the use of reading strategies and their effective use in the acquisition of meaning. The establishment of relationships among the different miscue categories and reading comprehension is vital in the design of learning situations directed towards the development of reading skills. The objective is not to develop a new reading method or to continue the trial-error use of the methods presently used, but to generate knowledge within a clearly stated reading model which will expand our understanding of the process as educators in the hope that this will have direct applicability to improved reading instruction for children in our schools. We hope to be able to make specific recommendations regarding reading instruction in light of our findings.

By exploring possible differences in reading strategy use we could make a contribution to the field of bilingual education. Goodman's psycholinguistic approach to the reading process has already given ammunition to supporters of bilingual education supporting the notion of teaching reading in the child's dominant language first before introducing reading in a second language. Findings regarding use of reading strategies in Spanish could be significant for second language instruction.

As we have stated in prior sections of this chapter, Puerto Rico has uncritically transposed most educational trends found in the United States to the Puerto Rican educational setting. The researcher, concerned with this trend, recognized the importance of testing the use of the RMI with Puerto Rican subjects to see the validity of the use of the instrument. In addition to this, the researcher wanted to develop further some procedures in the RMI such as the retelling and computation of comprehension scores. These procedures are described in very general terms. By making these procedures more rigorous we could improve the use of the RMI as a research tool. This could encourage the involvement of more people concerned with reading instruction in reading research. Further sophistication of the RMI for research use could be an advantage given that many people concerned with reading research do not have the expertise necessary to use the Goodman Taxonomy.

This study is also the first to be conducted in miscue research concerning a Puerto Rican population and the researcher hopes that it will stimulate others in Puerto Rico to continue research in this sub-field of reading research.



## C H A P T E R    I I

### A.    Review of Oral Reading Research

Reading research has been numerous over the years. A great many studies dealt with the analysis of oral reading errors. In 1968, Weber reviewed the literature comprising research in oral reading errors and suggested that two streams of thought were evident. Most studies looked at oral reading research as a means to establish norms in reading skills. They conceived reading errors as "signs of imperfect learning" (Weber, 1968) and assumed that reading errors are caused solely from inaccurate perceptions of the written word.

Other researchers, such as Kenneth Goodman (1965), have studied reading errors as a means to determine the kinds of information the reader is using to gain meaning from the material. He has proposed that by studying the features of an error we can delineate the specific strategies or cue systems the reader is using successfully for deriving a message from print. Therefore, errors are not viewed as inaccurate perceptions of the written word but as indicators of the reader's use of available information to arrive at the comprehension of the material.

Attempts made to compare the findings of previous studies in oral reading have been hindered by arbitrary classification systems which have not allowed a comparison across studies.

These arbitrary taxonomies have resulted, in many instances, because of the lack of a clear theoretical model of reading so that resulting data cannot be analyzed in an integrated fashion to explain the phenomena under study. (Spache, 1964; Weber, 1968)

Goodman has been very critical of this procedure for "without a theoretical framework in which to deal with errors and other oral reading phenomena, many insights into the reading process have been lost" (Goodman, 1969, p. 11). He contends that oral reading studies must part from a clear theoretical model of the reading process translated into a taxonomy which can generate hypothesis, predict and explain reading behavior.

Because reading theories have been built on partial views of the reading process other problems have been evident in reading research. One of the most important has been that the taxonomies developed have had little regard or consideration for the linguistic function of reading errors. Many errors were lumped together although they were not equally significant. By failing to separate linguistic levels, many taxonomies have produced overlapping categories so that in scoring, a single error can be found under several categories. Most classification schemes have been based on the whole word and this deep interest has stood in contrast to the relative neglect of written words as linguistic units represented graphically. Goodman has stated that: "Reading research has always dealt with linguistic questions if only by ignoring them." (Goodman, 1969, p. 11) "Notably missing", he points

out, "has been an awareness of the nature of language and language use" (Goodman, 1969, p. 15).

The concern and dissatisfaction with the atheoretical approach of previous research in reading led Kenneth Goodman and others to develop a psycholinguistic model of the reading process and a taxonomy based on this model with the purpose of yielding evidence about the validity of the underlying theory.

### B. Related Research in Miscue Analysis

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Some important findings were implicit even in research prior to miscue analysis research which indicated or suggested how reading is processed. As early as 1930, Payne suggested some factors which seemed to affect the results of oral reading errors. Payne pointed out that errors were affected by: the degree of graphic similarity of the word and vocabulary the child is learning at that given time, by the phonic similarity of the word and the error, and by the frequency of the word in the language. Payne asserted that the children in the study seemed to try to make sense of the reading or were trying to read for meaning and that the graphic display was only one important aspect of the stimulus (printed word).

In 1937, Swanson and Fairbanks found some significant differences between poor and proficient readers not covered by their systems of classification. They indicated that

proficient readers made substitutions in the text that didn't alter the meaning of the text while non-proficient readers made substitutions which were very distant from the original meaning of the text.

Fairbanks (1937) also found that proficient readers were more aware of their mistakes, an assumption which was evident in the number of self-corrections they made while reading. Mac Kinnon's study in 1959 indicated that many of the reader's miscues demonstrated the reader's sensitivity to the grammatical structure of his language rather than to the visual forms of words. The study suggested that children attempted to read the sentences as grammatical wholes rather than word for word.

Weber's study in 1968 found that there was an inverse relationship in beginning readers use of graphic and syntactic cues so that the more proficient they become in reading, the greater the use of syntactic cues rather than graphic ones.

These findings suggest a basis for Goodman's position that the more proficient readers will tend to become more sophisticated in their sampling strategies of cue systems as they become more proficient.

Miscue studies exploring Goodman's reading model began in the 1960's. We will analyze findings to the present within this specific research area to determine what data has been provided to substantiate or reject some of the hypotheses presented by Goodman and others.



### C. Miscue Research

In the first study conducted in miscue research, Goodman looked at the repetitions made by first, second and third grade readers. He ascertained that early readers recognize the same words when they appear within a passage with greater accuracy than when the words appeared on lists. If a reader is trying to determine or make out words on a reading list, the use of the syntactic and semantic cue systems is not available. The subject must then depend exclusively on the grapho/phonic information available. He also indicated that almost all repetitions were made to correct an error (Kenneth Goodman, 1965).

Yetta Goodman selected six first graders and observed their reading behavior over a one year period. She found that these beginning readers used all three cue systems to some degree but that syntax was more important as a reading strategy than meaning. There was also an inverse relation between the number of miscues per hundred words and the percentage of self-corrections observed. The higher the number of miscues per hundred words (MPHW), the lower the percentage of corrections made. Beginning readers also tended to use intonation correctly from the beginning and their dialect miscues did not affect comprehension.

Y. Goodman suggested that the types of miscues made change qualitatively as reading ability develops and that comprehension tends to increase as a percentage of syntactically and

semantically acceptable miscues increase. (Y. Goodman, 1967)

Goodman and Burke (1968) studied the oral reading behavior of 12 fourth and fifth grade proficient readers reading sixth grade materials. Their purpose was to categorize miscues according to their characteristics and the kinds of information involved in their production. In this detailed analysis of miscues the major contributions were that the researchers demonstrated the importance of self-correction in reading and confirmed the interplay of syntactic, semantic and grapho/ phonic information in the reading process. The study indicated particularly the extent to which syntactic information is used.

Regarding self-corrections, Goodman and Burke discovered that the percentage of self-correction was affected by miscue type and by the syntactic and/or semantic acceptability of the miscue.

In relation to how different variables are related to comprehension, the researchers found that: there was not a significant relationship between the number of MPHW and comprehension.

Allen (1969) explored the relationship of miscues to the reading process by analyzing the substitutions of selected average elementary school children. Many of his findings support findings in Y. Goodman's study of beginning readers. Allen found that "as younger children develop, the graphic and phonemic proximity of their miscues tends to increase."

He found that all the subjects made different types of miscues but the quality of those miscues changed. As Y. Goodman (1967) had asserted, dialect miscues were not corrected and there was no relation between the number of miscues and reading comprehension. There was a marked tendency in all subjects to correct syntactically acceptable miscues more than semantically acceptable ones.)

Allen's study presents a clear and important discussion of the relationship between syntax and meaning which should be kept in mind:

Miscues with no syntactic acceptability will rarely have full semantic acceptability. To this degree, syntax precedes meaning. However, syntactic acceptability does not assure semantic acceptability...the fact remains that the reader can make completely acceptable miscues with regard to syntax and read with little or no meaning.

However, if a miscue has full semantic acceptability, it will most likely be syntactically acceptable. (Allen, 1969)

Carolyn L. Burke studied the oral reading behavior of proficient sixth grade readers in a middle school in Michigan. She wanted to see the range of grammatical restructurings that occur in this population when reading a story selected from an eighth grade reader. Her findings supported Y. Goodman (1969) and Allen's (1969) study regarding the non-correction of dialect miscues. Comprehension scores of these proficient readers had no relation to either the number of miscues or the number of corrections made. She suggested that prior knowledge and experience with the concepts involved in the story appeared more related to reading comprehension.



The major contribution deduced from the data was that there is a greater tendency in readers to correct miscues which are syntactically or semantically unacceptable. The same phenomena was observed regarding the correction of miscues with low graphic similarity. In other words, as the difference widens between the observed response and the expected response regarding graphic proximity and syntactic or semantic acceptability, the greater the probability of self-correction.

This is an indication that the reader is reading for meaning and that the greater the divergence from meaningful production, the greater the tendency of the reader to re-examine his/her production as observed in self-correction behavior.

Y. Goodman and C. L. Burke (1969) were concerned with the grammatical retransformations that occurred in the oral reading of highly proficient readers. Retransformational miscues are those which alter the syntactical structure of the passage. The researchers selected six highly proficient readers from grades two, four and six from an inner city suburb in Detroit, Michigan. For each grade level a story two levels beyond that grade was selected. From the data they inferred that the number of retransformation miscues per hundred words decreased as grade increased. This finding illustrates how increased control over the rules that govern the subjects' language affects reading ability.



Joanne R. Nurss's study (1969) coded the oral reading errors made by second grade children reading sentences of varying levels of syntactic complexity. She wanted to relate these errors to the subject's comprehension of the passage. Nurss concluded that there was a relationship between the number of oral reading errors a child is likely to make and the syntactic complexity of the passage. She suggested that the types of errors which children make appear to indicate comprehension of the sentence.

The most important contribution made by C. L. Burke and Y. Goodman's study in 1969 was that miscues don't always result in changes in meaning. Thus, supporting findings of forementioned studies. It re-emphasizes the importance of analyzing miscues in terms of how they affect a reader's comprehension of the material.

One of the basic assumptions underlying Goodman's reading model is that miscues are produced in response to the same cues which produce expected responses and that the same mental processes are involved in generating both expected and unexpected responses. This is the reason why miscues are not necessarily negative, for they can indicate that the reader is using cue systems adequately. Miscues are indicators of the reader's use of available information and not necessarily, inaccurate perceptions of the written word.

K. L. Carlson (1970) analyzed the pattern of oral reading of six average fourth graders reading a variety of contextual

materials. In addition to reading materials selected from basal readers, the subjects read science and social studies selections. Carlson determined that although all subjects used all cue systems, miscues in the content areas tended to have less semantic acceptability than the miscues in basal reader materials. The subjects appeared to shift their emphasis to a greater concentration on syntactic cues as they read the content area selections. The conclusions of this study suggest that for materials which are more technical and perhaps more complex than basal reading materials, the subjects fall back on their knowledge of the use of language and its syntactical constraints to arrive at the meaning of the selection. It appears to indicate a varying degree of use of semantic cues. It suggests that the harder the material, the lesser the number of semantically acceptable miscues. Thus, in establishing a link between use of cue systems and reading comprehension the use of semantic cue systems seems to be most related to comprehension.

Yetta Goodman (1971) selected four Black children and analyzed the miscues made during eight oral reading sessions over a two year period. The purpose of the study was to observe how the children learned to read and the developmental changes which occurred as they developed from beginning towards proficient reading. Two of the subjects were non-proficient readers and the remaining two were average readers.

Average readers demonstrated more effective use of cue systems. The number of syntactic as well as semantically

acceptable miscues made by average readers was greater than those of non-proficient readers. The average reader's miscues also showed closer grapho/phonic proximity to the expected response. Again we find support for the contention that all readers make use of the three cue systems. What seems to vary is the effectiveness of their use.

The number of miscues showed no relation to the development of reading skills over the two year period. Again supporting the assumption that the quality of the miscues made is the most significant difference between readers with varying degrees of proficiency. Goodman sustained that average readers made more corrections than the non-proficient readers. If the average reader has greater understanding of the selection, it would be expected that he/she would be more aware of how responses depart from the message.

B. Gutknecht's study (1971) of identified perceptually handicapped children made a significant contribution by questioning the myth that perceptually handicapped children process reading in a different way than so called "normal" children. The data indicated that the same patterns are evident in the perceptually handicapped child's oral reading behavior. Subjects with high comprehension had about the same number of MPHWS as subjects with poor comprehension. The use of syntactic cues was more successful than the use of semantic cues, a pattern which has been observed in most of the miscue studies.



Louise Jensen's study (1972) was directed towards the analysis of miscues produced by subjects with varying degrees of proficiency reading the same material. Her conclusions support previously mentioned studies regarding the use of reading strategies. Proficient reader's miscues had higher syntactic and semantic acceptability. They also depended less on grapho/phonic information and had a high percentage of retransformations which retained acceptable meaning. Proficient readers were more successful in their corrections.

Peter Roush (1972) researched the relationship between prior conceptual knowledge, oral reading miscues, silent reading and post-reading performance. His subjects were 28 fourth graders with average reading ability based on standardized test results and teacher opinion. The subjects were divided into groups based on their conceptual awareness of the material they were to read. The most significant finding not presented in other studies was that prior conceptual knowledge results in readers using alternate surface options in the form of acceptable omissions and insertions. He concluded the "the quality, rather than the quantity of miscues is of paramount importance in reading comprehension". He suggested that prior conceptual knowledge and comprehension are related.

Dorothy Watson (1973) studied the effects on reading behavior of a saturated reading program on 27 fifth grade students over a four month period. There was a significant

statistical gain in the use of syntactic and semantic information and on comprehension scores, hence, suggesting a relationship between the use of these reading strategies and comprehension.

These findings have given coherence to Goodman's Reading Model. They will be re-examined in light of the results of this study to see their validity for the observed reading behavior of subjects reading in Spanish.

#### Summary of Significant Findings in Miscues Research:

##### Types of miscues made during oral reading:

All readers make more than one kind of miscue. (Goodman, 1967; Clay, 1968; Goodman and Burke, 1968; Burke and Goodman, 1968)

##### Number of miscues and reading comprehension:

(1) There was no significant relationship between the number of miscues made during oral reading and reading comprehension. (Goodman and Burke, 1970; Y. Goodman, 1971)

(2) There was no significant relationship between the number of MPHW and reading comprehension scores. (Goodman and Burke, 1968; Goodman and Burke, 1969; Gutknecht, 1971; Y. Goodman, 1972; Rousch, 1972)

##### Dialect and reading comprehension:

There is no significant relationship between dialect miscues and reading comprehension scores. (Y. Goodman, 1967;



Allen, 1969; Burke, 1969; Burke and Goodman, 1970; Jensen, 1972; Sims, 1972)

Intonation miscues:

Readers use intonation correctly from the beginning of their exposure to reading. (Y. Goodman, 1967; Y. Goodman, 1971)

Graphic and Sound Similarity and Reading Comprehension:

(1) Most readers make miscues with strong grapho/phonic similarity. (Clay, 1968; Y. Goodman, 1971; Rousch, 1972)

(2) Readers tend to correct miscues with low graphic similarity and tend not to correct those with high graphic similarity. (Burke, 1969)

Syntactic Acceptability of Miscues and Reading Comprehension:

(1) Self-correction increases as syntactic proximity decreases. (Goodman and Burke, 1968; Burke and Goodman, 1970; Burke, 1969; Gutknecht, 1971; Goodman, 1971)

(2) Average readers make more syntactically acceptable miscues than poor readers. (Y. Goodman, 1971)

Semantic Acceptability and Reading Comprehension:

(1) Average readers make more semantically acceptable miscues than poor readers. (Y. Goodman, 1971)

(2) The lesser the semantic acceptability of a miscue, the greater the probability of self-correction. (Burke, 1969; Menoski, 1971; Rousch, 1972; Gutknecht, 1971, Goodman and Burke, 1968)

Syntactically/Semantically Acceptable Miscues and Reading Comprehension:

(1) Subjects make more syntactically acceptable miscues than semantically acceptable miscues. (Allen, 1969; Menoski, 1971; Y. Goodman, 1971)

(2) Comprehension increases as the percentage of syntactically acceptable miscues increase. (Y. Goodman, 1967; Watson, 1973)

D. Miscue Research of Spanish Speakers Reading in Spanish

Kenneth Goodman has suggested that the reading process is essentially the same across languages. However, there has been only one descriptive study of Spanish-speaking children reading in Spanish. The study, which was based on research done by K. Goodman (1965) with English readers, observed the reading behavior of young native speakers reading in Spanish.

Sarah Hudelson López (1977) investigated whether the subjects could read with equal accuracy from a word list and from a selection containing the same words. The subjects were Mexican-American second and third grade children enrolled in bilingual programs in Texas. These subjects had not begun reading English basal readers.

Hudelson López (1977) found that the subjects could read many more words in the selections than on the word lists. All subjects made corrections of miscues in the selection which they hadn't made on the word lists. Of those miscues which

went uncorrected, most retained the meaning of what was being read. Her study confirmed the contention that Spanish speaking readers use contextual cues when they read in Spanish. This study, the first conducted with Spanish readers reading in Spanish supports some of the findings of other miscue studies.

C H A P T E R   I I I  
P R O C E D U R E   A N D   D E S I G N

A.   I n t r o d u c t i o n

The study explored the relationship between syntactically and/or semantically acceptable miscues made during oral reading of a story and comprehension scores for a group of proficient and non-proficient Spanish-speaking subjects reading seven stories in Spanish which are said to be at different levels of reading difficulty.

The study was concerned with answering the following questions for this specific population.

1. Is there a significant relationship between syntactically and/or semantically acceptable miscues and reading comprehension?

2. Do findings of this study with regards to the analysis of miscues in each of the following categories: dialect, intonation, graphic similarity, sound similarity, correction, grammatical function and meaning change give support to findings of prior miscue studies, conducted with subjects reading in English?

3. How do the findings of this study regarding use of reading strategies of proficient and non-proficient readers compare to conclusions of other miscue research conducted with English speakers?

4. Are there any significant differences observed in the reading activity of Spanish-speaking subjects reading in Spanish?

#### B. General description of the study

The study conducted was exploratory in nature. The methodology followed in the design of the study was the Methodology for the Generation of Knowledge (Hutchinson, 1974)

Miscues studies are in depth studies of small numbers of subjects. They seek to explore or describe in a systematic fashion and based on a reading model, the behavior of subjects while reading orally. The instruments used in miscue research require the detailed analysis of each miscue produced in a variety of miscue categories. Because of the in-depth analysis of miscues, the researcher must use small numbers of subjects and conduct studies which are in fact exploratory.

The subjects in the study were eight Spanish-speaking Puerto Rican third grade students enrolled in Manuel A. Pérez Elementary School, an inner city school in San Juan, Puerto Rico. Four of the subjects were non-proficient readers and the remaining four were proficient.

The instrument used to obtain the measurements desired was the Reading Miscue Inventory (RMI) developed by Yetta Goodman and Carolyn L. Burke in 1972, published by Mac Millan Company.



The instrument details procedures for analyzing miscues and obtaining comprehension scores. The general procedures in the use of the instrument are: selection of stories to be used; preparation of materials (stories) for use of the RMI; preparation of taping procedures for oral reading by the subjects; preparation of retelling procedures and story outlines; analysis of miscues coded in nine categories, and analysis of retelling to obtain comprehension scores following the story outline.

After selection of story materials and subjects was completed, each subject was asked to read orally each of the seven stories. Each story was read on a different day. Stories were not read in the order of progressive difficulty to minimize the effects of frustration and anxiety on the part of the subjects.

Before taping the oral reading the subjects were instructed that they would be asked to retell the story after the reading and that throughout the reading they would not receive any assistance from the researcher.

After oral reading of a story, the subjects were asked to retell the story to the best of their ability. Retelling procedures were operationalized by the researcher. This means that the procedures for the retelling were detailed in observable and measurable terms so that any trained, independent observer could determine if the procedure was in fact followed. This is necessary because retelling procedures

compile the data on which comprehension scores are later determined.

The oral reading and retelling of the stories were taped for each subject for each of the seven stories. Tapes were then utilized to record and code all miscues made by each subject in the RMI sheet for analysis of each miscue made. Tapes were also used to compute comprehension scores which were based on the retelling of the story by the subject using the outline prepared.

The measurements obtained for each subject per story were: comprehension scores and percentage of miscues in each of the following categories: dialect, intonation, graphic similarity, sound similarity, syntactic acceptability, semantic acceptability, correction, meaning change and grammatical function.

#### 1. Rationale for subjects and measurements.

It was the researcher's specific interest to use Puerto Rican subjects reading in Spanish.

It has been stated (C. Buck, 1973) that people learn to read only once and that although specific reading strategies may vary when reading in different languages, the process of deriving meaning from systematized graphic display is the same.

The use of the RMI with native speakers of Spanish reading in their native language, served a two-fold purpose. First, to explore the specific relationship proposed and

second, to examine the importance of each of the miscue categories for subjects reading in Spanish. This is the reason why all nine categories of the RMI were analyzed. By looking at the patterns of miscues which resulted, the researcher could determine if some of the findings of previous miscue research were equally applicable to this population. The use of subjects who come from a different cultural and linguistic background could also appraise difficulties in the design or use of the RMI's procedures for a substantially different population.

### C. Subjects

#### 1. Description:

The subjects were four proficient and four non-proficient Spanish-speaking Puerto Rican children. All subjects were third grade students enrolled in Manuel A. Pérez, an inner city elementary school in San Juan, Puerto Rico.

#### 2. Definition of terms:

a. Non-proficient readers. Those with comprehension scores of 25 points or less on a selected story and who were ranked by their teachers as non-proficient readers. (The 25 point demarcation has been set by the RMI based on previous research experiences with the comprehension scores obtained by non-proficient readers.) It indicates that ineffective use of reading strategies should have a comprehension score of less than 25 points out of 100. The

comprehension score is obtained through the use of a prepared story outline and scoring procedures, using the readers retelling as the basis for computing the scores.

b. Proficient readers. Those with comprehension scores of 50 points or more on a selected story and who were ranked by their teachers as proficient readers. The 50 point demarcation has been set by the RMI as an indication of reading proficiency based on previous research experiences with the comprehension scores obtained by proficient readers. Highly effective use of reading strategies should have a retelling score of 50 or more points out of 100.

c. Spanish-speaking. Those whose parents or guardians answered "no" when asked if their child has resided outside Puerto Rico. Children who could answer specific questions in Spanish and who could not answer correctly the same questions in English.

d. Puerto Rican. Those whose school records indicated that their place of birth is Puerto Rico and had all their schooling in Puerto Rico and that both parents were born and raised in Puerto Rico.

e. Third graders. Those enrolled in the third grade according to official school records.

f. Inner city elementary school. Those located within designated public housing projects in the San Juan metropolitan area.



### 3. Procedure for subject selection:

Public housing project elementary schools in the San Juan metropolitan area were identified using sources from the Department of Instruction of Puerto Rico. After a random selection of a school was made, permission was obtained to conduct the study in Manuel A. Pérez Elementary School.

The school had five third grade classrooms following self-contained ability grouping. The highest ( $3^1$ ) and lowest ( $3^5$ ) track classrooms were selected. The teacher of each class was asked to rank her students according to reading ability. The top six students in class ( $3^1$ ), and the top six students in class ( $3^5$ ) were selected. The rationale for the selection of the top six students in class ( $3^5$ ) was that the students who were at the bottom of the teachers ranking in this class were unable to read complete sentences so that they were unable to complete the tasks required in the study.

A story at grade level which the students had not been exposed to before was selected for the screening of the subjects to be selected for the study. The story selected was: El Zapatero y los Duendes from the book Aventuras Maravillosas, reading level ( $2^2$ ).



(a) Transcript story used for subject selection

STORY                    EL ZAPATERO Y LOS DUENDES

0101                    Había una vez un zapatero muy pobre.

0102                    Como no podía comprar la piel que

0103                    necesitaba, le era difícil hacer zapatos.

0104                    Una tarde el zapatero cerró su zapatería

0105                    y se dijo: - Usé la última piel que me

0106                    quedaba en los zapatos que vendí ayer.

0107                    Ultimamente no he podido hacer más

0108                    zapatos. ¿De qué los haré mañana?

0109                    Y se fue a casa pensando: - ¡Si pudiera

0110                    hacer un trato para comprar piel!

---

0201                    Al día siguiente volvió a su trabajo. Su

0202                    esposa llegó con él a la zapatería. Al entrar

0203                    vieron unos zapatos tornasoles.

0204                    - ¡Señora Zapatera, mira que zapatos

0205                    más lindos! Son de piel tornasol y tienen

0206                    dos perlas preciosas.

0207                    - ¿Quién los hizo?

0208                    - Yo no fui. Son maravillosos.

0209                    Al momento entró una señora que dijo:

0210                    - Quiero comprar unos zapatos tornasoles

0211                    que tengan perlas, pero no puedo esperar.

0212                    - Estos son muy bellos, señora - dijo el

0213 zapatero. - Son los últimos que me quedan.  
0214 - ¡Qué dicha! Son los más lindos del  
0215 pueblo.- Y los compró enseguida.

---

0301 - Señora Zapatera, ya tengo dinero para  
0302 comprar piel - dijo a su mujer.

0303 El zapatero compró piel y cortó unos  
0304 zapatos. Después fue al mercado y con el  
0305 dinero que le quedó, compró algunos  
0306 alimentos para la familia.

0307 Cuando volvió del mercado, invitó a  
0308 almorzar a su vecino, Juanito el ciego.

0309 - Aprecio tu invitación; pero, por qué  
0310 hay convite? ¿Tienes mucho dinero, José?

0311 El zapatero contó a Juanito lo de los  
0312 zapatos tornasoles con perlas. Juanito le  
0313 dijo: - Muchas gracias por el convite.-  
0314 Y se fue tratando de caminar con cuidado.

---

0401 Al día siguiente el zapatero y su mujer  
0402 volvieron a la zapatería. Allí encontraron  
0403 unos bellos zapatos con hebillas.

0404 - María, ¿quién hizo estos zapatos con  
0405 hebillas de perlas? ¿Tú los compraste?

0406 - Yo no he hecho trato con nadie, José.

0407                   Entonces entraron cuatro señoras a la  
0408                   zapatería diciendo: - Queremos unos  
0409                   zapatos con hebillas, bien elegantes.  
0410                   - Miren éstos, señoras. Son muy  
0411                   elegantes, con preciosas hebillas de perlas.  
0412                   Son los últimos que han llegado.

0413                   Las señoras compraron los zapatos. Con  
0414                   el dinero que recibió el zapatero, compró  
0415                   más piel. Pero aquella noche quiso ver  
0416                   quiénes estaban ayudándoles.

1417                   A la media noche, el zapatero y su  
0418                   señora, tras un armario, vieron cómo dos  
0419                   duendecillos trabajaban los zapatos.

---

0501                   Al otro día la zapatera dijo: Esos  
0502                   duendecitos nos han ayudado mucho. Hoy  
0503                   está nublado y parece que va a hacer frío.  
0504                   Necesitan abrigo. Les haré dos abriguitos.  
0505                   - Y yo unos zapatos tornasoles bien  
0506                   elegantes - dijo el zapatero.

0507                   Por la noche, dejaron los abrigos y los  
0508                   zapatos cerca del armario, con una nota  
0509                   que decía: - Para los buenos duendecillos.

0510                   ¡Qué dichosos se sintieron los duendes  
0511                   al ver los abrigos y los zapatos!

---

0601           En seguida se pusieron los abrigos y los  
0602           zapatos. Muy agradecidos empezaron a  
0603           cantar:

|      |                 |                     |
|------|-----------------|---------------------|
| 0604 | Un paso aquí    | Tres pasos más      |
| 0605 | un paso allá;   | tipi, tip, tap,     |
| 0606 | bien elegantes, | doy un saltito      |
| 0607 | tipi, tip, tap  | y vuelvo a empezar. |

0608           Así los sorprendió el lucero de la  
0609           mañana. Los duendecillos desaparecieron.  
0610           Desde entonces, el zapatero vive muy  
0611           agradecido de los duendes.

(b) Outline of story used for subject selection

Nombre: \_\_\_\_\_

Título del Cuento: EL ZAPATERO Y LOS DUENDES

- I. CHARACTER ANALYSIS: Total . . . 30 points . . . \_\_\_\_\_  
 A. Recall: Total . . . . . 15 points . . . \_\_\_\_\_  
 B. Development: Total . . . . . 15 points . . . \_\_\_\_\_
- II. EVENTS: Total . . . . . 30 points . . . \_\_\_\_\_
- III. PLOT: Total . . . . . 20 points . . . \_\_\_\_\_
- IV. THEME: Total . . . . . 20 points . . . \_\_\_\_\_

Recall:Development:

el zapatero (José) . . . . . pobre, bueno  
 Señora Zapatera (María) . . . . . esposa  
 dos duendecillos . . . . . buenos, alegres, pequeños  
 Juanito . . . . . vecino, ciego  
 señora . . . . .  
 cuatro señoras . . . . . compraban zapatos

EVENTS:

El zapatero ya no tenía piel para hacer zapatos.

Quería hacer un trato para poder comprar piel.

Al día siguiente encontró unos zapatos tornasoles en su tienda.

Llegó una señora y pidió unos zapatos como los que quedaban.

Con el dinero de los zapatos el zapatero compró piel y alimentos.

Fue al mercado a comprar alimentos.

Invitó a Juanito a comer a su casa.



Le contó lo de los zapatos.

Al día siguiente aparecieron zapatos con hebillas.

Cuatro señoras vienen a comprarlos.

Compra piel y hace zapatos.

Veló con su esposa por la noche y ve a los duendes.

El le hace zapatos y su esposa abrigos.

Se los dejan con nota de agradecimiento.

Los duendes se ponen contentos y cantan y saltan.

Duendes desaparecen al amanecer.

Zapatero se siente agradecido de los duendes.

#### PLOT:

¿Por qué ocurrió tal cosa? ¿Cuál era el problema o asunto del cuento?

Como unos duendes ayudaron a un zapatero pobre.

Como un zapatero pudo comprar piel para hacer zapatos.

#### THEME

¿Qué crees que el autor o cuento te estaba tratando de enseñar?

Que se debe ser agradecido con los que nos ayudan.

Que siempre puede haber solución a nuestros problemas.

Each of the 12 subjects read the story El Zapatero y los Duendes orally. After oral reading was completed each subject was asked to retell the story to obtain comprehension scores. The researcher used the retelling procedures, which are detailed later in the chapter to elicit information from the subjects regarding the following story categories: character recall, character development, story events, plot and theme. Using the story outline previously prepared, the researcher replayed the taped retelling and awarded points in each story category according to the point limitations set by the story guideline and using the procedures for computation of comprehension scores:

(c) Procedures for computing comprehension scores

1. Compare the transcript of the reader's retelling to the outline of the story.
2. Assign the subject's responses to the appropriate categories and items by making a check mark next to each item that the subject has recalled or answered correctly.
3. When a subject recalls only part of the information, underline the parts of the items which the subject has recalled correctly.
4. If the subject distorts information in some way, underline only the sections of the item recalled correctly.
5. When faced with situations such as those described in steps three and four, divide the points of the item according to the amount of correct information elicited so that the

points withheld are equivalent to the portion of the item not recalled correctly.

6. Fully accept any alternate plot or theme which is consistent with the one provided in the outline.

7. Total the assigned points for each item and category.

8. Total the points of all the story categories to obtain the comprehension scores.

Subjects who obtained scores of 50 points or more and who were ranked by their teacher as proficient readers were selected as proficient readers. The non-proficient readers selected were those whose comprehension scores were of 25 points or less and who were ranked by their teacher as non-proficient readers.

Once procedures for subject validation were completed, the final selection totalled 10 subjects. Although the researcher planned for four subjects in each category (non-proficient and proficient), one additional subject was screened in a given category so that he or she could replace a subject who might suffer from prolonged illness or absenteeism during the time constraints set by the school for the collection of data.

TABLE I  
Comprehension scores obtained in pre-screening of  
subjects with story

| <u>Subject</u> | <u>Comprehension<br/>score</u> | <u>Clasification</u> |
|----------------|--------------------------------|----------------------|
| 1              | 65.48                          | proficient           |
| 2              | 59.98                          | proficient           |
| 3              | 20.14                          | non-proficient       |
| 4              | 15.72                          | non-proficient       |
| 5              | 22.40                          | non-proficient       |
| 6              | 58.96                          | proficient           |
| 7              | 8.00                           | non-proficient       |
| 8              | 17.52                          | non-proficient       |
| 9              | 72.78                          | proficient           |
| 10             | 64.50                          | proficient           |



#### 4. Procedure for subject validation:

The researcher produced a check list for validating that the subjects obtained were the subjects intended. Each subject's school record was checked to assure that he/she was born in Puerto Rico; had all schooling in Puerto Rico and was officially enrolled in the third grade.

Each subject was screened for language by answering questions in English and then in Spanish to insure that they complied with the operational definition of Spanish-speaking. In addition, each child's parents or guardian was interviewed. For all the subjects selected a "no" answer was recorded when parents or guardians were asked if their child had resided outside Puerto Rico.

### D. Data collection

#### 1. Materials and procedures:

##### a. Selection and preparation of story materials.

After final screening and validation of subjects was completed, the stories for the study were selected and prepared. Criteria for selection as well as preparation of the story materials followed the guidelines specified in the Reading Miscue Inventory (RMI). (See appendix A for guidelines of story selection and typescript preparation.)

The basal reading series used was: Por el Mundo del Cuento y la Aventura published in 1972 by Laidlaw Brothers and designed specially for Puerto Rico and other Latin

SUBJECTS CHARACTERISTICS

| SUBJECT | PROFICIENT/NON-PROFICIENT   |                 | SPANISH SPEAKING   |  |   | PUERTO RICAN  |   |   | THIRD GRADE |
|---------|---|-----------------|--|--|---|---|---|---|-------------|
|         | Comprehension score on pre-screening story: El Zapatero y los duendes | Teacher ranking | Parents or guardians answer "no" when asked if subject has resided outside Puerto Rico | Could not answer any of the following questions in English:<br>1) Where do you live?<br>2) What color are your eyes? | Could answer both of the following questions in Spanish:<br>1) ¿Dónde vives?<br>2) ¿De qué color tienes los ojos? | School records indicate subject was born in Puerto Rico | School records indicate all previous academic experience was in Puerto Rico | Parents answer "yes" when asked if they were born and raised in Puerto Rico |             |
| 1       | 65.48   | Proficient      | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 2       | 59.98   | Proficient      | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 3       | 20.14   | Non-Proficient  | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 4       | 15.72   | Non-Proficient  | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 5       | 22.40   | Non-Proficient  | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 6       | 58.96   | Proficient      | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 7       | 8.00  | Non-Proficient  | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 8       | 17.52   | Non-Proficient  | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 9       | 72.78   | Proficient      | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |
| 10      | 64.50   | Proficient      | X  | Couldn't   | Could   | Yes   | Yes   | X   | X           |

Table II  
Check List for Validation of Subjects Selections

American countries. The series is sponsored by the Department of Education of Puerto Rico and is currently used in all public schools on the island.

After checking the last reading book used by the subjects, nine stories were selected for the study. Although the experimental design proposed the use of seven stories, two additional stories were selected because the RMI questions the use of the instrument when the number of miscues per story is less than 25. In the event that any one subject made less than 25 miscues on any given story, the story would have to be eliminated for that subject as well as all other subjects. By having two additional stories ready for use no time would be wasted in the preparation of other story material.

Given that seven different levels of reading difficulty spaced over whole levels of reading ability could prove too frustrating for the non-proficient subjects it was thought best to secure stories which were at half levels of variation. In some instances stories from the beginning of a reader would be used and a story from the end of the book was also chosen. Since the series provides increased difficulty of vocabulary as the reading book progresses there were in fact seven different levels of reading difficulty.

The last reading book completed by both non-proficient and proficient readers was the book two, level one reader. The first story used was a book two, level two selection.

The stories selected for the study were:

- story 1: El Pescador y su Mujer - Book 2, level 2 from the book Aventuras Maravillosas.
- story 2: Martín Pescador - Book 3, level 1 from the book Conozcamos a Puerto Rico.
- story 3: El Plumaje del Múcaro - Book 3, level 2 from the book Conozcamos a Puerto Rico.
- story 4: El Ciego de Olancho - Book 3, level 2 from the book Por Tierras Vecinas.
- story 5: Baolín, El Duendecito del Bosque - Book 3, level 2 from the book Por Tierras Vecinas.
- story 6: Simón, El Herrero del Mar - Book 4, level 1 from the book Por los Caminos del Mundo.
- story 7: El Pastor y la Princesa - Book 4, level 1 from the book Por los Caminos del Mundo.

additional stories:

Los Tres Siervos and La Mano de Dios from the book Por los Caminos del Mundo.

Typescripts for each of the stories were prepared following the procedures outlined in the RMI for typescript preparation. These were used by the researcher to follow the oral reading of the subjects and record the miscues made during the oral reading of the story.

b. Story typescripts.



Story #1  
Book 2  
Level 2

0101 EL PESCADOR Y SU MUJER

0102 Hace muchos años un pescador vivía  
0103 con su mujer en una cabaña en la esquina  
0104 de un lodazal. Tenía dos hijos y eran  
0105 muy felices. El nombre de este pescador  
0106 era Pedro.

0107 Una mañana Pedro tuvo que salir a  
0108 trabajar temprano y por el camino se dijo:  
0109 Hoy tendré buena pesca, y si Dios quiere,  
0110 mañana también la habrá. Compraré  
0111 algunos alimentos para mi mujer y mis  
0112 hijos.

---

0201 Pedro llegó a la playa. Se  
0202 puso a pescar, y un pez nacarado  
0203 picó el anzuelo. Entonces  
0204 Pedro se preguntó: - ¿Qué  
0205 nombre tendrá ese pez?

0206 Buen pescador, quítame el anzuelo y  
0207 déjame ir al fondo del mar. Si lo haces,  
0208 haré un milagro. Saldrás de la esquina  
0209 del fangal en que vives, y te daré miles  
0210 de cosas bellas.

0301           Muy ligero Pedro quitó el anzuelo al pez  
0302           y lo echó al fondo del mar. Después  
0303           corrió a contar esta aventura a su mujer.  
0304           - Si ese pez te dijo que haría el milagro  
0305           de darte miles de cosas, ve y dile que  
0306           quiero una casita en el campo. Y que no  
0307           sea en la esquina de un lugar enfangado.

---

0401           El pescador fue a llamar al pez  
0402           nacarado y le dijo: - Necesito el milagro  
0403           de una linda casita donde no falte nada.

0404           - Así será. Tu mujer tendrá miles de  
0405           cosas. Nada le faltará. No vivirá en el  
0406           fango.

0407           Cuando Pedro llegó a su casa, encontró  
0408           a su mujer en una casita muy linda.  
0409           Con su mujer estaban sus hijos.

0410           Al otro día la mujer de Pedro le dijo:  
0411           - No quiero esta casa. Necesito un castillo.

0412           El pescador tuvo que ir donde el pez  
0413           nacarado. Este salió del fondo del mar  
0414           y le dijo: - Tu mujer tendrá el castillo.  
0415           Cuando Pedro llegó, encontró que su  
0416           mujer lloraba a la entrada del castillo.

0501 - Nada te falta. ¿Qué necesitas ahora?  
0502 - Quiero ser reina y tener un palacio  
0503 con soldados. También quiero una corona  
0504 de nácar y miles de piedras preciosas.

---

0601 - No tengo valor para volver donde el  
0602 pez que está en el fondo del mar.  
0603 - Pues tendrás valor para hacerlo.  
0604 Pedro tuvo que volver donde el pez.  
0605 Este salió del fondo del mar y le dijo:  
0606 - Nada le faltará a tu mujer. Tendrá el  
0607 palacio, los soldados, la corona de nácar  
0608 y miles de piedras preciosas.  
0609 Muy contento Pedro volvió a su casa.  
0610 Al otro día la mujer dijo al pescador:  
0611 - El día está nublado y va a llover. No  
0612 me gustan los días nublados. Quiero ser  
0613 la dueña del sol. Ve a decírselo al pez.  
0614 - Iré, pero vas a perderlo todo.  
0615 Cuando el pescador llegó al mar, las  
0616 olas se elevaban como montañas.  
0617 - Amigo pez,--exclamó Pedro--me faltá  
0618 valor para hablar en nombre de mi mujer.  
0619 Mi señora quiere ser la dueña del sol.

0701                   - No está en mis manos hacer ese  
0702 milagro. Dile que aprenda a ser humilde.  
0703 La humildad nos hace felices.

0704                   El pescador fue donde su mujer y  
0705 habló con ella: - Tenemos que volver  
0706 a nuestra humilde cabaña y aprender a ser  
0707 humildes.

0708                   Y los dos fueron muy felices con los  
0709 hijos que Dios les dio.



Story #2  
Book 3  
Level 1

0101 MARTIN PESCADOR

0102 En una cueva de un río vivía un  
0103 hombre pequeño llamado Martín. Tenía las  
0104 uñas de las manos muy largas. Tan largas  
0105 eran sus uñas, que podía coger con facilidad  
0106 los pececitos del río sin doblarse.

0107 Así se pasaba Martín voluntariamente  
0108 todo el día parado en las piedras del río  
0109 en busca de algún pececito que comer. Por  
0110 eso se le secaron las piernas como palitos  
0111 de escoba. Y estaba tan flaquito que su peso  
0112 era como el de un saquito de plumas. Así  
0113 que, cuando brincaba de una piedra a otra  
0114 del río, su cuerpo parecía que flotaba como  
0115 una guajana del cañaveral.

---

0201 Martín miraba de un lado a otro del agua,  
0202 por si asomaba un pececito que coger. Tanto  
0203 miraba de un lado a otro, que el cuello se  
0204 le alargó como una varita de pescar.

0205 Como ya todo el mundo conocía la vida  
0206 de Martín, mucha gente venía a verlo desde  
0207 lo alto de un cerro. Se divertían al ver que

0208 alargaba el cuello, desde una piedra en busca  
de pececitos.

0209 Pero vino un día en que Martín, de tanto  
0210 alargar el cuello perdió sus fuerzas. Cayó  
0211 al agua y desapareció. Como nadie sabía  
0212 qué había sido de Martín, la gente bajó una  
0213 mañana al río para ver lo que había pasado.  
0214 Y llena de tristeza, empezó a llamarlo a lo  
0215 largo de la corriente del agua:

0216 - ¡Martín, Martín!

0217 No había pasado mucho tiempo cuando  
0218 los hombres que lo buscaban vieron sobre  
0219 una piedra unas patitas muy largas y amari-  
0220 llas. Sobre ellas se alargaba el cuerpo de un  
0221 pájaro gris y flaco.

---

0301 - ¡Así era Martín!--exclamó uno de los  
0302 hombres del grupo que había salido a bus-  
0303 car el ave.

0304 - ¡Mira, ahora se tragó un pececito que  
0305 sacó del agua!--exclamó otro de los hom-  
0306 bres que buscaban a Martín.

0307 - ¡Es verdad!--respondió un tercero.

0308 - ¡Ese tiene que ser Martín! Ahora en-  
0309 tiendo.

0310           Alegres por creer que lo habían encon-  
0311           trado, los hombres corrieron por la orilla  
0312           del río en su afán de acercarse a Martín.

---

0401           El pájaro se asustó, y lanzó un triste sonido.  
0402           Y alzando vuelo, pasó sobre las cabezas de  
0403           los hombres que le gritaban con dulzura:  
0404           - ¡Adiós, Martín, Martín, Pescador!  
0405           Pero el pájaro gris alzó vuelo a lo largo  
0406           del río, alejándose más y más.  
0407           Desde entonces, de la mañana a la tarde,  
0408           Martín Pescador, o martinete, viene a pa-  
0409           rarse en las piedras del río. Y allí pasa el  
0410           día tragándose los pececitos que puede  
0411           alcanzar con su largo cuello gris.

Story #3  
Book 3  
Level 1

0101 EL PLUJMAJE DEL MUCARO

0102 Hace tiempo, los animales celebraban  
0103 bailes y fiestas en las cuales se divertían  
0104 mucho. Siempre se anunciaban estas fiestas  
0105 para que viniesen todos los animales del  
0106 bosque.

0107 Un día, los pájaros decidieron hacer un  
0108 gran baile para ellos solos. Llamaron al  
0109 guaraguao y le pidieron que fuera casa por  
0110 casa a invitar a todos los pájaros.

---

0201 Cuando el guaraguao llegó a la casa del  
0202 múcaro, éste estaba desnudo. Entonces el  
0203 guaraguao le dice al múcaro:

0204 - Vengo a invitarte al baile de todos los  
0205 pájaros.

0206 - Guaraguao, no tengo traje que po-  
0207 nerme. No puedo ir desnudo al baile.

0208 Entonces el guaraguao le contó a los  
0209 demás pájaros lo que había dicho el múcaro.

0210 Los pájaros decidieron prestar una de sus  
0211 plumas al múcaro, para que pudiera hacerse  
0212 un traje e ir al baile sin demora.



0213                   El guaraguao recogió las plumas. Cada  
0214 una de ellas era de distinto color. Entonces  
0215 se las llevó al múcaro para que se hiciese  
0216 el traje, y le dijo:

---

0301                   - Múcaro, te doy las plumas, con una  
0302 condición.

0303                   - ¿Cuál es esa condición, guaraguao?

0304                   - Después que salgas del baile, devol-  
0305 verás las plumas a todos los pájaros, sin  
0306 demora.

0307                   Pero el múcaro era muy vanidoso y se  
0308 sintió muy elegante con su traje de plumas  
0309 de distintos colores. Casi no gozó del baile.  
0310 Pensaba en la condición que habían deci-  
0311 dido los pájaros, con la cual él había estado  
0312 de acuerdo.

0313                   - ¡Tener que devolver las plumas! Y  
0314 luego, ¡quedarme desnudo otra vez!--pen-  
0315 saba el múcaro.

---

0401                   Decidido a no perder su traje, el vani-  
0402 doso múcaro se fue del baile cuando nadie  
0403 lo estaba observando. Entonces alzó el vuelo  
0404 y se escondió en el bosque. Y todavía todos

0405           los pájaros lo andan buscando para que  
0406           les devuelva las plumas que con tanto gusto  
0407           le prestaron.

0408           Es por eso que el múcaro no sale de día,  
0409           sino de noche, cuando los demás pájaros  
0410           están durmiendo.

Story #4  
Book 3  
Level 2

0101 EL CIEGO DE OLANCHO

0102 Hace muchos años, muchos años vivía en el  
0103 pueblo de Olancho, en Honduras, un ciego  
0104 muy avaro llamado Juan. Sólo pensaba  
0105 en atesorar dinero y más dinero. Su único  
0106 amigo era un campesino muy pobre y reli-  
0107 gioso, quien vivía muy feliz a pesar de su  
0108 gran pobreza.

0109 Mas un día enfermó la esposa del cam-  
0110 pesino. Muy preocupado por la enferme-  
0111 dad de su mujer, cobró valor y se  
0112 encaminó a casa de su amigo, el ciego. En-  
0113 tonces le dijo con desesperado acento:

---

0201 - Juan, tengo que pedirte un favor.  
0202 Sabes que soy muy feliz en mi pobreza;  
0203 pero ahora estoy desesperado--dijo el  
0204 campesino con acento cada vez más triste.

0205 - ¿No será plata lo que necesitas, verdad?  
0206 Yo sí que estoy desesperado con esta  
0207 ceguera que no tiene cura.

0208 - Eres mi amigo y sé que tienes una  
0209 gran provisión de riqueza. Necesito que

0210 me ayudes. Se muere mi esposa, Juan -  
0211 decía con acento cada vez más apenado.  
0212 - Quien necesita ayuda soy yo, a pesar  
0213 de mi gran provisión de dinero. La ce-  
0214 guera es la peor de las desgracias. ¡No  
0215 tengo a nadie que gane dinero y pueda  
0216 ayudarme. ¿Cómo voy a darte lo que tanto  
0217 necesito?

0218 Al oír esta respuesta, el campesino se  
0219 fue desesperado. Y casi cojeando de debi-  
0220 lidad llegó cerca de su casa. Se sentó sobre  
0221 una gran piedra, y empezó a rogar a Dios  
0222 con gran fe.

---

0301 - ¡Señor!--dijo. - Sólo me quedas tú,  
0302 Tú tienes provisión para todos tus hijos.  
0303 Después de rogar a Dios se levantó muy  
0304 débil, y casi cojeando porque le faltaban  
0305 las fuerzas, llegó a su casa. Pero, ¡cuál no  
0306 sería su sorpresa al encontrar a su esposa  
0307 completamente curada!

0308 Emocionada por la alegría de sentirse  
0309 bien, su esposa le dijo con gozoso acento:

0310 - Hace unos momentos me encontraba  
0311 muy mal; pero de repente me sentí mejor.  
0312 Recobré la memoria, y aunque al prin-

0313 cipio cojeaba de debilidad, me levanté. No  
0314 es capricho. Estoy curada, gracias a Dios.  
0315 Los dos entraron a su casa y pusieron  
0316 flores a una imagen del Señor!

---

0401 Al día siguiente, el campesino, con la  
0402 fe en Dios vibrando en su corazón, llegó  
0403 a casa de Juan, el ciego. Y satisfecho por la  
0404 curación de su esposa, le dijo:

0405 - La encontré a la puerta de mi casa. Mi  
0406 esposa había recobrado la memoria y  
0407 estaba curada. No estaba enferma por ca-  
0408 pricho. ¡Ha sido un milagro de Dios!

0409 - Verdaderamente es un milagro--con-  
0410 testó Juan--y no estoy ensalzándote.

0411 - Juan, ruega a Dios con fe y pídele  
0412 que te devuelva la vista. El te escuchará--  
0413 dijo el campesino vibrante de fe.

0414 - Tengo buena memoria. Ahora mismo  
0415 me pondré en camino. Me desprenderé de  
0416 una cadena de oro maciso que tengo, y se  
0417 la ofreceré al Señor.

0418 Varios días después, la gente de Olan-  
0419 cho no hablaba de otra cosa.

0420 - ¿Y cómo fue?--le preguntaban.

0421 - Me puse a rogar a los pies del Señor,



0422 le pedí con toda mi alma que devol-

---

0501 viera la vista y le entregué mi cadena de  
0502 oro macizo. Enseguida recibí una claridad  
0503 y empecé a ver al Señor. ¡Se hizo el mila-  
0504 gro! Pero no crean que ha sido por mis  
0505 ruegos solamente, no. El milagro me ha  
0506 costado una cadena de oro macizo.

0507 Y apenas terminó de decir estas pala-  
0508 bras, Juan se llevó las manos a los ojos y  
0509 lanzó un grito de dolor:

0510 - ¡No veo! ¡No veo! ¡Estoy ciego!  
0511 Y, una cadena de oro macizo, sin saber-  
0512 se cómo, cayó a los pies de Juan, el ciego.

Story #5  
Book 3  
Level 2

0101 BAOLIN, EL DUENDECITO DEL BOSQUE  
0102 Nació del lirio y la rosa en una mañana  
0103 de abril. Era tan pequeñito y gracioso  
0104 que le dieron el nombre de Baolín.  
0105 Creció en el bosque entre flores y ani-  
0106 males y todos lo querían mucho. Tan fa-  
0107 moso se hizo el duendecito, que las sutiles  
0108 hadas de la Montaña Blanca le dijeron:  
0109 - Ven con nosotras, Baolín. Serás feliz  
0110 en la Montaña Blanca.  
0111 - No puedo dejar el bosque, ni a mis

---

0201 amigos. Me encanta estar con ellos, y soy  
0202 feliz en una colina donde hay árboles, flo-  
0203 res y muchos nidos.  
0204 - También en la Montaña Blanca hay  
0205 pájaros y frutas a montones. Ve con noso-  
0206 tras. Pide lo que desees y lo tendrás.  
0207 - Lo pensaré--dijo Baolín. - Daré unas  
0208 vueltas por el bosque. Escucharé cómo ta-  
0209 ñen las campanitas del viento y veré los  
0210 pinos de la selva y a mis padres, el lirio y  
0211 la rosa.

0212 Baolín regresó al bosque, y su amigo, el  
0213 sapo le preguntó:

0214 - ¿Dónde estabas que ayer no te ví?

0215 - Estaba con las hadas que habitan en la  
0216 Montaña Blanca.

0217 - Y ..., ¿no te acordabas de mí?

0218 - Sí, amigo sapo. Regresé a tu ribera  
0219 para verte. Dime, ¿qué es lo que más  
0220 desearías tener en la vida?

0221 - Desearía tener una capa marrón con  
0222 muchos lunares negros engarzados en ella.

---

0301 - Pues nosotras--croaron unas ranitas  
0302 --deseamos un traje verde de pulido color.

0303 - Conejito, y tú, ¿qué quieres?

0304 - Ser del color de las hojas secas.

0305 - Y yo, dijo el pino blanco--quisiera  
0306 ser siempre verde y alto para poder ad-  
0307 mirar el crepúsculo.

0308 - Pronto tendrán lo que desean.

0309 Y Baolín, con mejillas sonrientes, llegó  
0310 donde las hadas y les dijo:

0311 - He decidido vivir con ustedes. Nece-  
0312 sito todos los colores del iris, una paleta  
0313 de pintor y un montón de pinceles.

0401 Las hadas desaparecieron y regresaron  
0402 con una linda paleta de pintor, montones  
0403 de pinceles y pinturas de muchos colores.  
0404 Entonces Baolín se fue con las hadas.

0405 En la Montaña Blanca el duende em-  
0406 pezó a pintar. Cada hora del día usaba un  
0407 nuevo color. Pintó al sapo de marrón, con  
0408 lunares negros engarzados en su lomo. Dio  
0409 a las ranitas un color verde pulito. Pin-  
0410 tó al conejo del color de las hojas secas;  
0411 finalmente pintó al pino de verde. Era tan  
0412 feliz que sus mejillas estaban risueñas.

0413 Baolín pintaba cuanto veía. El bosque  
0414 parecía un altar de luces. Tañían los árbo-  
0415 les sus campanillas, y los mirlos parecían  
0416 monaguillos entonando sus cantos.

0417 Esa tarde una nube cargó con Baolín,  
0418 con todo y pinturas. Por una rendija en la  
0419 nube, Baolín miraba la superficie de la  
0420 Tierra. Veía el altar con sus monaguillos  
0421 cantando himnos nupciales, pues un clavel

---

0501 y una rosa celebraban nupcias. Hasta las  
0502 víboras estaban de fiesta y cantaban:

0503 -¡A la víbora de la mar!...

0504 De pronto la nube bajó, y todos los co-

0505           lores preciosos del crepúsculo descendie-  
0506           ron a la Tierra.

0507           El sapito llevaba su capa marrón con lu-  
0508           nares negros, las ranitas su pulido traje  
0509           verde, y el conejo su traje color de hoja  
0510           seca. El pino verde, que admiraba el  
0511           crepúsculo de la tarde, veía bailar a una  
0512           ostra y a siete ostritas que jugaban en la  
0513           playa.

0514           Desde entonces, el atardecer corona la  
0515           Tierra con sus brillantes colores.



Story #6  
Book 4  
Level 1

0101 SIMON, EL HERRERO DEL MAR

0102 En una isla lejana vivía un jorobadito. Sólo se  
0103 alimentaba de los peces que cogía en el mar y de  
0104 las frutas y miel silvestre que había en su país.  
0105 Nadie sabía cómo había llegado el jorobadito a  
0106 aquella tierra rodeada por el mar. Su nombre  
0107 era Simón.

0108 Desde bien temprano por la mañana, Simón  
0109 salía en su bote por el mar. Iba en busca de  
0110 blancas esponjas y de pedacitos de coral para hacer  
0111 herraduras, no se sabe para qué caballos de su  
0112 lindo país. Sobre una roca dura que le servía de  
0113 yunque, el martillito de Simón se oía sonar y  
0114 sonar, como si fuera una música en la tarde.

0115 Nadie parecía ser más feliz que Simón. Se le  
0116 veía cruzar en la noche con su verde farol, o  
0117 prender montoncitos de leña en lo alto de las  
0118 rocas para distraerse.

0119 Simón llamaba con largos silbidos al viento,  
0120 para que empujara la vela blanca de su barca por  
0121 las aguas del mar. Y el viento no se hacía esperar  
0122 para ayudar a Simón. Por eso, muchos le creían  
0123 hijo del viento o de la tempestad.

0124           Un día el jorobadito se hallaba contemplando  
0125 el paso de las olas y vio venir hacia él el carro del  
0126 dios del mar. Tiraban del carro cuatro caballos.

---

0201 de preciosa piel. Simón se asustó mucho. Antes  
0202 de que tuviera tiempo de correr, ya el dios marino  
0203 se hallaba frente a él.

0204           No bien había salido el jorobadito del asombro  
0205 que le produjo la belleza de los caballos, cuando  
0206 el dios de las aguas, desmontándose de su carro,  
0207 se le acercó y le dijo:

0208           - Vengo de muy lejos y necesito embellecer la  
0209 piel de mis caballos y herrarles también. ¿Sabes  
0210 acaso de alguna persona que pueda hacerlo por  
0211 aquí?

0212           - Yo soy la única persona que vive en esta isla,  
0213 ¡oh, gran señor del mar!--dijo el jorobadito,  
0214 lleno de felicidad.

0215           - Entonces, ¿podrás poner herraduras a mis  
0216 caballos?

0217           - Herrero soy, y el único de esta pequeña tierra  
0218 rodeada por el mar.

0219           - Pues me llenan de dicha tus palabras. Por el  
0220 bien que hagas a mis caballos, te llevaré a pasear  
0221 conmigo por el reino de mis aguas--dijo el dios  
0222 del mar.

0223           Loco de alegría, el jorobadito corrió a su casita  
0224 de la isla. Pronto regresó con su pequeña carga  
0225 de blancas esponjas y lindas herraduras de coral.  
0226 Y se puso rápidamente a echarles agua y a limpiar  
0227 con las esponjas la piel brillante de los hermosos

---

0301 animales. Después, durante largo tiempo, se oía  
0302 sonar el martillo de oro con que el jorobadito  
0303 clavaba las rojas herraduras en los cascos de los  
0304 caballos del dios del mar.

0305           - Eres inteligente y bueno. Desde hoy viajarás  
0306 en mi carro por todos los caminos de los mares.  
0307 Gozarás al ver cómo saltan mis caballos sobre la  
0308 cumbre de las blancas y gigantes olas--dijo el  
0309 dios del mar.

0310           Muy pronto el viento hizo elevar las crines de  
0311 los hermosos animales. Estos tiraron del carro en  
0312 que se alejaron el jorobadito y el gran señor  
0313 del mar.

0314           Desde entonces, dice la gente que cuando se  
0315 oyen sonar las olas, es que Simón está clavándoles  
0316 herraduras a los caballos del carro del dios del  
0317 mar.

Story #7  
Book 4  
Level 2

0101 EL PASTOR Y LA PRINCESA

0102 Esta era una vez y dos son tres que había un  
0103 Rey bastante testarudo que sólo quería que se  
0104 hiciera todo a su gusto. Este Rey tenía una hija  
0105 muy hermosa, y eran muchos los príncipes que  
0106 andaban enamorados de ella. Pero como el Rey  
0107 era tan testarudo, los príncipes tenían miedo de  
0108 ir a pedirle la mano de la princesa.

0109 Sucedió que por los alrededores del palacio,  
0110 andaba un pastor joven que era un chico muy  
0111 bueno y muy querido por todos los campesinos  
0112 por las muchas obras de caridad que hacía. Este

---

0201 pastor estaba también enamorado de la princesa,  
0202 pero se atrevía aún menos que los príncipes a ir  
0203 a pedirla, sabiendo que no era más que un simple  
0204 pastor. El cantaba muy bien y a la princesa le  
0205 gustaba mucho su voz y también el mozo, pues el  
0206 pastor era de muy buena figura.

0207 Pasó algún tiempo, y el Rey se decidió a bus-  
0208 carle un marido a su hija, pero como era tan raro,  
0209 dijo que el hombre que quisiera casarse con ella  
0210 tendría que traerle tres cosas que él pediría. Pen-



0211 só y pensó en lo que iba a pedir. Un día mandó  
0212 a avisar a todo el mundo que dejaría casar a la  
0213 princesa con el hombre que le trajera un vaso con  
0214 todas las aguas, un ramo con todas las flores y un  
0215 puñado de avellanas de ¡ay ... ay ... ay!

0216 Y vinieron muchos príncipes del país y de otras  
0217 tierras, pero al enterarse del deseo del Rey, se  
0218 iban tristes porque sabían que no podían encon-  
0219 trar las tres cosas que el Rey pedía.

0220 Y sucedió que el pastor también se enteró del  
0221 deseo y de la promesa del Rey, y decidió irse en  
0222 busca de las tres cosas: el vaso con todas las aguas,  
0223 el ramo con todas las flores y el puñado de ave-  
0224 llanas de ¡ay ... ay ... ay!

0225 Y cantando se fue anda que te anda, anda que  
0226 te anda, anda que te anda, hasta que llegó a un

---

0301 campo donde había un bohío con luz en la sala.

0302 El pastor tocó la puerta para pedir permiso y  
0303 pasar allí la noche, pero como no salía nadie, se  
0304 metió dentro y echó a andar por todos los cuartos.  
0305 Y no vio a nadie, pero en eso llegó a la cocina, y  
0306 allí se encontró con un bobo que miraba una olla  
0307 que estaba en la candela, y se reía.

0308 - ¿Qué haces aquí?--le preguntó el pastor.



0309 - Sacando las que vienen y esperando las que  
0310 han de venir--dijo el bobo. Y era que estaba  
0311 sacando los frijoles que flotaban en el agua y  
0312 esperando los que tenían que subir del fondo de  
0313 la olla.

0314 - Y tú, ¿no tienes padres?

0315 - Sí--dijo el bobo--pero están buscando la  
0316 comida de ayer.

0317 Y era que sus padres recogían en los campos  
0318 los copos de lana que las ovejas dejaron entre las  
0319 zarzas. Después los vendían y pagaban con el di-  
0320 nero que sacaban la comida del día anterior.

0321 Y entonces pensó el pastor que este bobo le  
0322 podría decir algo sobre las tres cosas que él bus-  
0323 caba. Y se lo dijo, y el bobo le indicó cómo podía  
0324 conseguirlas.

0325 Fuese el pastor, y después de andar y andar,  
0326 llegó a la corte y mandó aviso al Rey de que él

---

0401 tenía las tres cosas que exigía por la mano de la  
0402 princesa.

0403 Cuando la princesita lo supo se alegró mucho;  
0404 pero seguido se puso muy triste, pues sabía que su  
0405 padre mataría al pastor si éste se había equivocado.

0406 Por fin llegó el pastor al palacio del Rey, y éste

0407 le preguntó:

0408 - ¿Es cierto que encontraste lo que pido?

0409 - Sí, señor; aquí las tengo conmigo.

0410 - Bueno; pues dame la primera.

0411 Y el pastor le presentó un vaso de agua.

0412 - Eso es el vaso que tiene todas las aguas, por-

0413 que es agua del mar donde van a parar todas las

---

0501 aguas de las lluvias, de los ríos, de los arroyos, de  
0502 las fuentes y de las quebradas.

0503 - Muy bien--dijo el Rey--has traído la pri-

0504 mera. Vamos a ver la segunda. ¿Dónde está?

0505 - Tómela, señor--y el pastor le entregó un pa-

0506 nal de miel diciéndole que ese era el ramo de

0507 todas las flores porque las abejas habían sacado

0508 la miel de todas las flores.

0509 - Muy bien, muy bien--dijo el Rey. - Pero va-

0510 mos a la última.

0511 - La he traído en este cesto, señor; sáquelas

0512 usted.

0513 Y el Rey metió la mano en el cesto, pero tan

0514 pronto llegó al fondo, empezó a gritar:

0515 - ¡Ay ... ay ... ay!

0516 Y era que en el cesto, el pastor había puesto

0517 unos cuantos cangrejos que mordieron los dedos

0518 del Rey tan pronto metió allí la mano.

0519 Y la princesa se alegró de su triunfo y se puso

0520 muy contenta. Se preparó todo para la boda, y

0521 a los pocos días se casaron y vivieron muy felices.

c. Preparation of story outlines.

The RMI indicates general procedures to be followed in the preparation of story outlines. The outlines were used to obtain comprehension scores for subjects while doing the retelling of the story. The outline preparation involved the awarding of points for story information in four categories: characters (maximum points: 30); events (maximum points: 30); plot (maximum points: 20), and theme (maximum points: 20) for a total of 100 possible points on comprehension.

Two consultant graduate students majoring in Spanish literature were asked to prepare the outlines following procedures detailed in the RMI. Once the outlines had been prepared and a general concensus on each outline was obtained, specific points were awarded to each piece of information found in the four categories, according to the restraints in the number of points set by the RMI procedures.

d. Story outlines.

Sufficient copies of each outline were prepare before any actual work was done with the subjects.

The set of instructions for the computation of comprehension scores presented in the selection pertaining to subject selection was developed in order to facilitate the validation of the scores obtained.

STORY #1:

El Pescador y su Mujer

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (3.75 c/u)  
 15 points \_\_\_\_\_ (Development) (2.14 c/u)

Pedro, el pescador

responsable  
 trabajador  
 débil ante la esposa

La esposa

ambiciosa  
 caprichosa

El pez

nacarado  
 hacedor de milagros o mágico

Los hijos

EVENTS: 30 points \_\_\_\_\_ (4.28 c/u)

1. El pescador pesca al pez.
2. Pez dice ser hacedor de milagros y pide su libertad.
3. Solicitud de milagros por la esposa de Pedro a través de éste y la concesión de éstos:
  1. una casa en el campo
  2. un castillo
  3. ser reina con palacio, soldados, corona de nácar y piedras preciosas.
4. Solicitud de milagro que no se concede: ser dueña del sol.
5. Pez aconseja a Pedro y Pedro y su mujer siguen el consejo, vuelven a su casita y obtienen la felicidad.

PLOT: 20 points \_\_\_\_\_

Se cuenta cómo un pescador al conocer a un pez mágico puede darle a su esposa todas las cosas que ella desea, pero que sólo logran la felicidad cuando ambos aceptan vivir y ser humildes.



THEME: 20 points \_\_\_\_\_

La felicidad no se alcanza a través de los bienes materiales, sino a través de la humildad.

STORY #2:

Martín Pescador

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (3 c/u)  
 15 points \_\_\_\_\_ (Development) (2.5 c/u)

Martín

de uñas largas  
 las piernas secas  
 flaquito como un saquito de plumas

Vecinos

amigos de Martín (se identifican y se preocupan por  
 Martín)

Pájaro

de patitas amarillas  
 gris y flaco

EVENTS: 30 points \_\_\_\_\_ (5 c/u)

1. Martín pierde sus fuerzas, cae al agua y desaparece.
2. La gente va a averiguar lo que le pasó a Martín.
3. Aparece pájaro gris y flaco donde había desaparecido.
4. Identifican a Martín con el pájaro porque comen lo mismo y se parecen.
5. El pájaro huye de ellos.
6. El pájaro regresa todos los días al mismo lugar a comer peces.

PLOT: 20 points \_\_\_\_\_

Cuenta cómo desaparece Martín y en su lugar aparece un pájaro que se llama igual por su parecido.

THEME: 20 points \_\_\_\_\_

El origen del martinete.

## STORY #3:

EL Plumaje del Múcaro

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (5 c/u)  
 15 points \_\_\_\_\_ (Development) (3 c/u)

## Múcaro

vanidoso  
 deshonesto

## Guaraguao

mensajero  
 bueno

## Pájaros

amigos del múcaro (solidarios)

EVENTS: 30 points \_\_\_\_\_ (3.75 c/u)

1. Se organiza el baile.
2. El guaraguao invita al múcaro.
3. El múcaro no puede ir al baile porque está desnudo.
4. El guaraguao plantea el problema a los otros pájaros.
5. Estos deciden prestarle una pluma al múcaro con la condición de que la devuelva al terminar el baile.
6. El múcaro abandona temprano el baile para no tener que cumplir con su palabra.
7. Los pájaros lo buscan para que cumpla con su palabra.
8. El múcaro sale de noche para evitar el encuentro con los pájaros.

PLOT: 20 points \_\_\_\_\_

Se cuenta cómo el múcaro obtuvo el plumaje.

THEME: 20 points \_\_\_\_\_

Explicación de los hábitos del búho o múcaro y por qué sale de noche. El múcaro sale de noche porque tiene miedo de encontrarse con los otros pájaros, ya que fue deshonesto con ellos y les robó las plumas.

## STORY #4:

El Ciego de Olancho

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (5 c/u)  
 15 points \_\_\_\_\_ (Development) (1.5 c/u)

## Juan

el ciego  
 avaro  
 mal amigo  
 no tiene fe (incrédulo)

## Campesino

pobre  
 religioso (fervoroso)  
 buen amigo y esposo  
 humilde

## Esposa del campesino

enferma  
 religiosa

EVENTS: 30 points \_\_\_\_\_ (2.73 c/u)

1. Juan pide ayuda a su amigo, el ciego avaro.
2. El ciego se la niega.
3. Juan recurre a Dios para que cure a su esposa.
4. Al llegar a su casa encuentra que su ruego fue escuchado y su esposa está recuperada.
5. Va y le cuenta al ciego lo ocurrido. Lo exhorta a que le pida a Dios con fe para que lo cure de su ceguera.
6. El ciego le ofrece a Dios en su ruego una cadena de oro macizo.
7. Se da la cura.
8. La gente le pregunta a Juan cómo fue el milagro.
9. Este da su explicación señalando que él pagó por el milagro.
10. En ese momento vuelve a quedarse ciego.
11. Cae la cadena de oro a sus pies.

PLOT: 20 points \_\_\_\_\_

Cómo un hombre ciego por ser avaro perdió la oportunidad de recuperar la vista.

THEME: 20 points \_\_\_\_\_

La gracia de Dios no se puede comprar.



## STORY #5:

Baolín, el Duendecito del Bosque

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (2.5 c/u)  
 15 points \_\_\_\_\_ (Development) (2.14 c/u)

## Baolín

nació de flores (del lirio y la rosa)  
 nació en el bosque  
 pequeñito y gracioso

## Hadas

son de la Montaña Blanca  
 conceden deseos

sapo

ranitas

conejito

pino blanco

EVENTS: 30 points \_\_\_\_\_ (3 c/u)

1. Las hadas invitan a Baolín a vivir con ellas.
2. Pide tiempo para decidirse.
3. Va a pasear por el bosque y se encuentra con sus amigos. Les pregunta qué es lo que más desearían en la vida y ellos le van diciendo lo que quieren.
  1. sapo: lunares
  2. ranitas: traje verde
  3. conejito: ser del color de las hojas secas
  4. pino: ser verde
4. Baolín le pide a las hadas pinturas, pinceles y una paleta para pintar a sus amigos.
5. Se fue a vivir con las hadas en la Montaña Blanca y desde allí pintaba todo lo que veía (la naturaleza).
6. Una nube se llevó a Baolín y desde la nube él vio una boda.
7. Al bajar la nube, se fijaron todos los colores en la tierra.

PLOT: 20 points \_\_\_\_\_

Se nos cuenta cómo Baolín para complacer a sus amigos obtuvo de las hadas todos los colores y los pintó tal y como ellos querían; dándole color a toda la naturaleza.

THEME: 20 points \_\_\_\_\_

Cómo la naturaleza ha obtenido sus colores.

STORY #6:

Simón, El Herrero del Mar

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (7.5 c/u)  
 15 points \_\_\_\_\_ (Development) (5 c/u)

Simón

el herrero del mar  
 jorobadito  
 vivía solo

Dios del mar

EVENTS: 30 points \_\_\_\_\_ (5 c/u)

1. Simón, el jorobadito vio llegar el carro del dios del mar.
2. Este se asustó.
3. El dios del mar solicitó una persona que le embelleciera la piel a sus caballos y los herrara.
4. Al Simón decirle que él podía hacerle el trabajo, el rey del mar le ofreció pasearlo por su reino.
5. Simón hizo su trabajo muy bien.
6. El rey del mar quedó muy impresionado con el trabajo y la persona; ofreció llevarlo consigo para siempre.

PLOT: 20 points \_\_\_\_\_

Se cuenta cómo un jorobadito, Simón, logró ganarse la admiración y el afecto del rey del mar al desempeñarse bien en su trabajo.

THEME: 20 points \_\_\_\_\_

La explicación de por qué suenan las olas.

## STORY #7:

El Pastor y la Princesa

CHARACTERS: 15 points \_\_\_\_\_ (Recall) (3 c/u)  
 15 points \_\_\_\_\_ (Development) (1.66 c/u)

Rey

testarudo

Princesa

hermosa  
 enamorada del pastor

Príncipes

tenían miedo de pedir la mano de la princesa

Pastor

bueno  
 enamorado de la princesa  
 miedo de pedir la mano de la princesa  
 cantaba bien  
 tenía buena figura

Bobo

EVENTS: 30 points \_\_\_\_\_ (4.28 c/u)

1. El Rey anuncia que casará a su hija con aquél que le traiga las tres cosas que él pide:
  - un vaso con todas las aguas
  - un ramo con todas las flores
  - un puñado de avellanas de ay, ay, ay
2. El pastor decidió ir en busca de las tres cosas.
3. El llegó a un bohío donde un bobo le indicó cómo podía encontrar esas cosas.
4. El pastor regresó a presentarle las cosas al rey.
5. El pastor acertó en todo:
  - el vaso con todas las aguas: agua de mar donde van a parar todas las aguas

el ramo de todas las flores: un panal de miel porque las abejas recogen la miel de todas las flores.

un puñado de avellanas de ay, ay, ay: cesta llena de avellanas y cangrejos en el fondo.

6. Los cangrejos mordieron al rey.
7. Se organizó la boda del pastor y la princesa.

PLOT: 20 points \_\_\_\_\_

Se cuenta lo que hizo un pastor para conseguir la mano de la princesa.

THEME: 20 points \_\_\_\_\_

Cómo el pastor, a pesar de ser pobre, se valió de su astucia para alcanzar la mano de la princesa.



e. Taping and retelling procedures

The most quiet and comfortable place in the school was secured for taping sessions with each subject. A work schedule was developed so that each subject read and re-told one story per day. Arrangements were made so that a subject taped in the morning would be taped in the afternoon on the following day to reduce the effects of tiredness on any one subject.

A day was spent interacting with subjects in the classrooms so that they would be familiarized with the researcher before participating in the experiment. Establishment of rapport with each child was accomplished prior to each of the taping sessions to secure as much cooperation from the subjects and reduce their anxiety during the oral reading of the stories and the retelling. Before each session the researcher read the following instructions to the subject:

1. Instructions in spanish:

"Hoy vas a leer un cuento completo en voz alta. Yo voy a grabar tu voz mientras lees para poder escuchar la grabación más tarde. No te puedo dar ninguna ayuda mientras lees. Trata de leer todo lo más que puedas. Puedes tratar de adivinar aquellas palabras que no sepas y si aún así no la puedes sacar, brinca esa palabra y sigue con la próxima. Cuando termines de leer te pediré que me digas todo lo que recuerdas del cuento. Mientras tú lees yo voy a ir escribiendo algunas cosas en este papel. Esto no es un examen. Me estás

ayudando en un trabajo que tengo que hacer y te agradezco tu ayuda. Déjame saber cuándo estás listo(a) para empezar, para poner la grabadora".

2. English translation of instructions:

"Today you will be reading an entire story aloud. I will be taping your oral reading in this tape recorder so that I can listen to it later on. I will not be giving you any help in your reading. Try as hard as you can to read everything in the story. You can guess a word if you cannot make out what it is, and if everything else fails, you may skip it and go on to the next word. At the end of the story I will ask you to retell as much as you can from the story. As you read, I will be following your reading and making some notes on this paper where I have written the story. This is not a test. You are helping me with some work that I must do by reading this story and I am grateful for your help. Let me know when you are ready so that I can turn on the tape recorder".

While the subject read the story assigned in the reading book, the researcher followed the subject's oral reading in her typescript, marking the miscues made. After the subject completed the reading the researcher counted the number of miscues to check that a minimum of 25 miscues had been made to determine whether or not the story had to be eliminated.

The book was then collected from the subject prior to the retelling of the story. The major objective of the

retelling was to get as much information as possible from the subject (using the story outline as a guide) by asking questions based on the information elicited by the subject without giving information which the subject had not provided.

The retelling procedures were operationalized by the researcher to insure that the procedure had been followed in it's validation.

Operationalization of the retelling procedure: involved a listing of conditions under which the retelling can be said to have occurred and a set of conditions which indicated that if any of these were present, the retelling procedure was not followed.

What is acceptable within the retelling:

1. After the subject (S) read the story, he/she closes the book and the book remains closed throughout the retelling session.
2. The researcher (R) asks the S "Tell me everything you remember about the story". ("Dime todo lo que recuerdas del cuento".)
3. The R does not interrupt or interject any questions until the S has completed his/her initial retelling,
4. During the retelling the R takes notes or checks off items the reader is relating on the story outline,
5. After the S does the initial retelling the R asks additional open ended questions to stimulate the S to think some more and get more information. These

- open ended questions use only information that the S has given in the initial retelling.
6. S's statements are often followed up by "why do you think so?" ("¿Por qué tú crees?") questions for questions which have been answered correctly as well as incorrectly.
  7. The R always uses the S's pronunciation of names or non-words when asking questions about those items.
  8. When all the S's information has been used to further the retelling, open ended questions are used to obtain additional retelling information.
  9. The R provides time for a response.
  10. When the S uses a non-word the R tries to place the non-word in a sentence context or summarizes the situation in which the S used the non-word and tries to get the meaning for it.
  11. If the S provides a response which is incorrect, the R asks another question in relation to that particular item at a later time during the retelling to see whether the S misunderstood something in the story or if he/she merely confused her/his oral production.
  12. The R asks questions on the theme and plot of the story.
  13. The R asks questions on the moral of the story or intent of the author in writing the story.



14. The R tries to rephrase questions to which the S answers "I don't know." ("Yo no sé.")
15. The R stops asking questions in any one area of the story after various attempts to which the S answers "I don't know." ("Yo no sé.") or does not provide a satisfactory answer.
16. The R gives the S one question at a time and gives some time for the S to think about the question and give an answer.
17. The R allows the S to completely develop an area (theme, characters, plot, etc.) before switching to another.
18. The R checks out that the S knows what "author" and "moral" mean if she uses these terms in questions.

What is unacceptable within the class:

1. Statements by the S are followed by questions like "Are you sure?" ("¿Estás seguro(a)?") or questions which would make the S hesitate or change an answer.
2. The R asks direct questions giving the S information which the S hadn't provided.
3. The R tells the S the theme or plot or any information and asks the S to say if that is correct or incorrect.
4. The R makes closed questions which lead the S down the path the R wants him/her to take.



5. The R does not speak clearly, goes too slowly or too fast in the questioning.
6. The R is clearly peculiar in his/her behavior, physical appearance or tone of voice.
7. The R acts in a threatening way thus making the S nervous.
8. The setting for taping is noisy, there are interruptions to the taping session and little light so that reading is difficult.

f. Validation of retelling procedures.

A group of ten bilingual undergraduates enrolled in the Bilingual Bicultural Program at the School of Education, University of Massachusetts, validated the retelling procedures. A random selection of 5 taping sessions were played and when given the operationalization of the retelling procedures, the ten students indicated on a sheet if the retelling had been followed. There was 100% agreement that the retelling procedures had been followed.

2. Measurements:

Two kinds of measurements were obtained as a result of the study. The first was comprehension scores; the second, number of miscues in nine categories.

a. Obtaining and validating comprehension scores.

After each subject completed the retelling, the tape of the retelling was used to obtain comprehension scores.

The distribution of points in each of the categories of story information were used to determine the comprehension scores.

Three bilingual students enrolled in the Bilingual Bicultural Program at the School of Education of the University of Massachusetts were selected to validate a random selection of comprehension scores by computing these scores again. The scores computed by these students had a 0-3.5 variation from the original computation done by the researcher.

TABLE III

Validation of Comprehension Scores by Independent Readers

|            | Story Number |       |       |       |
|------------|--------------|-------|-------|-------|
| Raters     | 2            | 3     | 5     | 6     |
| 1 (author) | 42.50        | 48.75 | 29.03 | 39.57 |
| 2          | 40.00        | 45.25 | 31.11 | 41.63 |
| 3          | 39.50        | 48.00 | 28.63 | 37.00 |
| 4          | 44.50        | 47.25 | 30.66 | 40.10 |

b. Obtaining the miscues in each of nine categories.

After all taping sessions had been completed, the researcher transcribed each of the miscues made by the subjects per story to the RMI coding sheet for the analysis of each miscue. Following the guidelines presented in the RMI, each miscue was analyzed in each of the nine categories to obtain a total number and percentage of miscues per child per story as well as total number of miscues per child per story.

RMI Coding Sheet:

|         |       |           |
|---------|-------|-----------|
| Reader  | Date  | Selection |
| Teacher | Class | School    |

| QUESTION TOTAL | COLUMN TOTAL PERCENTAGE | Miscue Number  |  | Text                        |
|----------------|-------------------------|--|--|-----------------------------|
|                |                         | Reader   |  |                             |
|                |                         |  |  | DIALECT 1                   |
|                |                         |  |  | INTONATION 2                |
|                |                         | Y<br>P<br>N  |  | GRAPHIC SIMILARITY 3        |
|                |                         | Y<br>P<br>N  |  | SOUND SIMILARITY 4          |
|                |                         | Y<br>P<br>N  |  | GRAMMATICAL FUNCTION 5      |
| PATTERN TOTAL  | COLUMN TOTAL PERCENTAGE |  |  | CORRECTION 6                |
|                |                         |  |  | GRAMMATICAL ACCEPTABILITY 7 |
|                |                         |  |  | SEMANTIC ACCEPTABILITY 8    |
|                |                         |  |  | MEANING CHANGE 9            |
|                |                         | No Loss<br>Partial Loss<br>Loss                            |  | COMPREHENSION               |
|                |                         | Strength<br>Partial Strength<br>Weakness<br>Overcorrection |  | GRAMMATICAL RELATIONSHIPS   |

1. RMI Questions: description and coding procedures:

"The heart of the RMI procedures comprises nine questions which are asked about each miscue...the RMI questions are asked about each miscue so that the effect of all the language cueing systems operating within the reading process can be measured." (Y. Goodman and C.L. Burke, 1972, p. 49).

The following descriptions and coding procedures for miscue analysis have been taken from Chapter 7 of the RMI manual regarding reading miscue inventory questions.\*

a. Dialect: Is a dialect variation involved in the miscue?

Dialect is generally marked when there is a difference between the dialect of what the author has used in the text and what the reader usually says. Dialect miscues can occur as variations among people with respect to the sounds of words, grammar, and vocabulary, as in the following examples:

|                               | <u>Reader</u>          | <u>Text</u>           |
|-------------------------------|------------------------|-----------------------|
| <u>sound variations</u>       | : pitchur              | - picture             |
| <u>vocabulary variations</u>  | : headlights           | - headlamps           |
| <u>grammatical variations</u> | : that ain't no<br>cup | - that isn't a<br>cup |

Some examples of these types of dialect miscues in Spanish are the following:



|                                 | <u>reader</u> | <u>text</u> |
|---------------------------------|---------------|-------------|
| <u>sound variations</u>         | : comel       | comer       |
| <u>vocabulary variations</u>    | : desapartado | separado    |
| <u>grammatical variations</u> : | levantenmen   | levantenme  |

### Coding of dialect miscues

If a variation is involved, the appropriate box is marked "Y" for yes. If no dialect variation is involved, the box is left blank.

- b. Intonation: Is a shift in intonation involved in the miscue?

Intonation miscues involve changes in pitch, stress, or pause from what is expected. An initial intonation miscue caused by confusion over grammatical structure will frequently cause surrounding text items to change their grammatical function. The only time that intonation should be coded as a miscue is when changes in the grammatical structure or the meaning of a passage occur.

The following are examples of miscues that involve intonation at the word, phrase, and sentence level:

|                     | <u>reader</u>       | <u>text</u>         |
|---------------------|---------------------|---------------------|
| <u>word level</u> : | an original proyéct | an original project |

The intonation change makes project a verb meaning "to protrude" in place of a noun meaning "a plan".

|                       | <u>reader</u>                      | <u>text</u>                       |
|-----------------------|------------------------------------|-----------------------------------|
| <u>phrase level</u> : | She came back to life.<br>At once. | She came back to life<br>at once. |



A period is inserted after life. An incomplete structure is left following it.

|                         | <u>reader</u>                                       | <u>text</u>  |
|-------------------------|---|--|
| <u>sentence level</u> : | Claribel got noisy<br>when we hid her<br>sometimes. | Claribel got noisy<br>when we hid her.<br>Sometimes... |

The intonation shift causes sometimes to be attached to the sentence preceding it.

### Coding of intonation miscues

If a shift in intonation is involved the appropriate box is marked "Y" for yes. If there is no variation involved, the box is left blank.

c. Graphic Similarity: How much does the miscue look like what was expected?

Graphic similarity is marked only when a single word or non-word is substituted for a single text item. The readers' response and the expected response are broken down into three parts--beginning, middle, end--and a judgement is made on the amount of similarity among each of them.

When judging graphic similarity, the sequence and shapes of the miscue and the text item must be examined with no concern for their pronunciations.

Some examples of ratings for miscues regarding graphic similarity are:

| <u>reader</u> | <u>text</u> | <u>graphic<br/>similarity</u> |
|---------------|-------------|-------------------------------|
| walk          | walked      | high                          |
| swamp         | camp        | high                          |
| the           | a           | none                          |
| one           | member      | none                          |
| try           | tried       | some                          |
| chopy         | carry       | some                          |

#### Coding of graphic similarity

If two of three parts of the miscue are similar to the text item a high degree of similarity is said to exist (mark "Y" box). If one of the three parts is similar, some degree of similarity exist (mark "P"). If no part is similar no degree of similarity exists (mark "N").

d. Sound similarity: How much does the miscue sound like what was expected?

When judging for sound similarity, the coder must pronounce the miscue and the text item and listen to the sounds with no concern for their spelling.

As in the graphic similarity category, the miscue is divided into three parts and a judgement is made on how many parts are similar. The same coding system is used. "Y" is marked for a high degree of similarity, "P" for some degree of similarity, and "N" if there is no similarity.

Some examples of ratings of sound similarity are:

| <u>reader</u> | <u>text</u> | <u>sound<br/>rating</u> |
|---------------|-------------|-------------------------|
| walk          | walked      | high                    |
| chop          | carry       | none                    |
| odor          | adore       | some                    |

- e. Grammatical functions: Is the grammatical function of the miscue the same as the grammatical function of the word in the text?

This category is marked only when the miscue involves the substitution of a single word or non-word. The reader's intonation and the use of inflectional endings usually make it possible to assign a grammatical function to non-words. The reader's response and the expected response are compared to determine whether the grammatical function of the two are the same.

Examples:

| <u>reader</u>                             | <u>text</u>                                | <u>grammatical<br/>function</u> |
|---|--|---------------------------------|
| She brushed her <u>head</u> ...           | She brushed her <u>hand</u> .              | identical                       |
| <u>Were</u> waited in silence...          | <u>We</u> waited in silence.               | different                       |
| That...(the reader<br>stops and corrects) | What queer experiment<br>was it this time. | cannot be<br>determined         |

The reader has produced an incomplete structure in which it is not possible to determine if that is a determiner, a pronoun, or a clause marker. It is, therefore, indeterminate.

Coding of grammatical function

If the grammatical functions of the two are identical mark "Y". If it is not possible to determine the grammatical function mark "P", and mark "N" if they differ.

f. Correction: Is the miscue corrected?

When a reader becomes aware that he has made a miscue, he/she may attempt to correct or choose to continue reading without correcting?

Coding of correction

A "Y" is marked if a miscue is corrected. If there is no attempt at correction a "N" should be coded. If a correct response is abandoned or there is an unsuccessful attempt at correction then a "P" should be recorded.

g. Grammatical acceptability: Does the miscue occur in a structure which is grammatically acceptable?

The grammatical acceptability question focuses on the success with which the reader is coping with the structure of the text sentences. Miscues can occur in grammatically acceptable sentences which are structurally different from the text sentence.

In determining the coding of this category as well as the semantic acceptability category, the whole sentence must be read with all uncorrected miscues included. Corrected miscues other than the one being coded are to be read in the corrected form.



### Coding of grammatical acceptability

If the miscue occurs in a sentence which is grammatically acceptable and is acceptable in relation to prior and subsequent sentences in the text the miscue is coded with a "Y". Only miscues marked "Y" (totally acceptable miscues) were the concern of this study. A "P" is marked if the miscue occurs in a sentence which is grammatically acceptable, but is not acceptable in relation to prior and subsequent sentences in the text. Or the miscue is grammatically acceptable only with the sentence portion that comes before or after it. When the miscue occurs in a sentence that is not grammatically acceptable it is marked "N".

- h. Semantic acceptability: Does the miscue occur in a structure which is semantically acceptable?

The semantic acceptability question focuses on the success with which the reader is producing understandable structures. Grammatical structures create a pattern within which the very organization of words conveys meaning. Semantic acceptability, therefore, is dependent on and limited by grammatical acceptability. Because of this relationship semantic acceptability should never be marked higher than grammatical acceptability.

### Coding of semantic acceptability

The same coding used for determining partial, full or no grammatic acceptability are used in coding semantic acceptability.



Only miscues which are completely acceptable semantically were the concern of the study.

- i. Meaning change: Does the miscue result in a change of meaning?

This question deals with how much the message of the text is altered by the reader's miscues. It is considered the single most important question of the inventory because it centers upon the purpose of reading - gaining the author's intended meaning.

In judging the degree of meaning change, the sentence should be read including only the miscue being coded; i.e., no other miscues in the sentence are read.

#### Coding meaning change

When the change in meaning is extensive the miscue is marked "Y". If a minimal change in meaning is involved when the miscue is marked "P". An "N" is coded when there is no change in meaning involved.

The following are examples of ratings of miscues in relation to meaning change:

The text read:

Andrew<sup>1</sup>

Andre didn't say a word, but it seemed that everyone else was talking.

hoping<sup>2</sup>called<sup>3</sup>

His sister, Suzzane, was hopping around and calling to him.

| <u>reader</u> | <u>text</u> | <u>meaning change</u>                |
|---------------|-------------|--------------------------------------|
| 1. Andrew     | Andre       | N - There is no meaning change.      |
| 2. hoping     | hopping     | Y - There is extensive change.       |
| 3. called     | calling     | P - There is minimal meaning change. |

After each miscue was analyzed using the nine questions, percentages of miscues in each were determined.

c. Validation of miscues obtained in each of nine categories.

Two selected bilingual students with prior training in the use of the RMI were used to validate a random selection of miscue analysis sheets. Agreement was found to be between 80 - 93% for categories one through six. The meaning change category, the syntactic, and semantic acceptability produced agreements ranging for 70 to 82 percent.

E. Analysis of Data

The analysis of data involved the correlation of each of the miscue categories with reading comprehension, within subjects, across subjects and between non-proficient and proficient subjects.

Means and standard deviations were obtained for each subject's miscues in each category as well as for proficient and non-proficient groups.

#### F. Limitations of the study

The study examined the oral behavior of a limited number of subjects. It is not possible to make generalizations regarding a general population based on the findings of this study.

C H A P T E R   I V  
F I N D I N G S   &   D I S C U S S I O N

The study attempted to explore the reading behavior of a small number of proficient and non-proficient Spanish-speaking third grade students when reading seven stories in Spanish which were said to be at different levels of reading difficulty.

The purpose of the study was to answer the following questions for this specific population:

- (1) Is there a significant relationship between syntactically and/or semantically acceptable miscues and reading comprehension? In order to answer this question the percentage of syntactically and/or semantically acceptable miscues and retelling scores (which are the measure of reading comprehension) were correlated. A significant positive correlation was obtained.
- (2) Is there a significant relationship between comprehension and other categories of miscues obtained in the RMI such as: dialect, intonation, graphic similarity, sound similarity, self-correction, grammatical function and meaning change? After correlating the percentages of miscues which involved each of the forementioned variables we found that there was a significant positive correlation between the

percentage of miscues which were grammatically acceptable and the readers comprehension. We found the same results for the relationship between the percentage of miscues which are semantically acceptable and reading comprehension. A significant positive correlation was also obtained when comparing the reader's comprehension and the percentage of miscues which resulted in no loss or minimal change of the meaning of the text.

The only other significant variable seemed to be the total number of miscues produced and comprehension. When comparing the retelling scores and the total number of miscues produced we found a negative correlation such that, as the number of miscues increased, comprehension as indicated by the retelling score decreased.

- (3) Do findings in this study with regard to the analysis of children's reading behavior provide support or refutation of findings in prior miscue studies, conducted with subjects reading in English?
- (4) How do the findings in this study regarding use of reading strategies of proficient and non-proficient readers compare to conclusions of other miscue research conducted with English speakers?

Questions three and four were answered by comparing the conclusions of other studies with the present one. Findings will be discussed later in this chapter.



- (5) Are there any important differences observed in the use of reading strategies seen in English speakers reading in English in comparison with this Spanish-speaking population?

Our comparison looked at the findings of previous miscue studies as we pointed out in questions three and four. We found that the reading behavior observed was very similar to the one found in previous studies. In fact our findings sustained previous research data. Although there are obvious differences in the languages involved in past studies and the present one, these differences do not translate into different reading behaviors. This supports Goodman's notion that there are psycholinguistic universals in reading behavior.

For the purpose of clarity, the discussion of results will attempt to answer these questions by addressing the relationship of each RMI variable to comprehension across all subjects. This will be followed by the statement and discussion of findings comparing the proficient and non-proficient groups as well as within each child.

A total number of 3091 miscues were produced and analyzed using the nine variables of the RMI. Each miscue was analyzed to determine:

- (1) if the miscue involved variations in dialect
- (2) if the miscue involved variations in intonation

- (3) what the degree of graphic similarity of the miscue (OR) to the word in the text (ER) was
- (4) what the degree of sound similarity of the OR to the ER was
- (5) if the miscue had the same grammatical function as the ER
- (6) if the miscue was grammatically acceptable
- (7) if the miscue was semantically acceptable
- (8) the degree of meaning change of the OR involved in relation to the ER and
- (9) if there was an attempt to correct the miscue

An analysis of variance was performed and Pearson correlation coefficients were obtained to determine:

- (1) The relation of each RMI variable to reading comprehension across subjects.
- (2) The differences between proficient and non-proficient readers with regard to use of reading strategies as seen in the production of miscues.
- (3) The relation within each child between miscues with syntactic acceptability, miscues with semantic acceptability and reading comprehension scores.

These correlations indicate the strengths or weakness of the relation between the miscue variables and reading comprehension. In addition to this, scattergrams were prepared to observe the relation of miscues which were syntactically and

semantically acceptable and comprehension for each child across the seven stories.

### Relationship Among Miscues and Comprehension

Across subjects:

- (1) Grammatically acceptable miscues and reading comprehension

Findings: A Pearson correlation was done for each of the nine variables for miscue analysis provided in the RMI and comprehension scores. Comprehension scores were the scores obtained in the retelling procedure which was operationalized by the researcher to guarantee its reliability. After completing the Pearson correlation a significant positive correlation was obtained ( $r = .3747$ ) at the .05 level between the readers comprehension scores and the grammatical acceptability of their miscues, so that, as the percentage of grammatically acceptable miscues increased so did comprehension scores. The correlation was also significant at the .01 level.

Across all subjects, these results indicate the existence of a relationship between the grammatically acceptable miscues produced and reading comprehension as measured by comprehension scores.

- (2) Semantically acceptable miscues and reading comprehension

Findings: A significant positive correlation was obtained ( $r = .4724$ ) at the .05 level between the percentage of

semantically acceptable miscues and comprehension scores. The correlation was also significant at the .01 level.

In other words, as the percentage of semantically acceptable miscues increased so did comprehension scores, thus indicating a clear relationship between these two variables across subjects.

### (3) Meaning change and reading comprehension

Findings: A significant positive correlation was obtained ( $r = .3568$ ) at the .05 level between reading comprehension and meaning change. This correlation was also significant at the .01 level. This means that there was a clear relationship between the percentage of miscues which retained the meaning of the sentence, phrase or word and the readers comprehension of the material.

### Discussion:

The results obtained regarding syntactically acceptable miscues, semantically acceptable miscues and miscues which involved no loss of meaning should be discussed as a group given the close relationship of these three variables.

Each of these variables showed a clear relation to reading comprehension across all subjects such that as the percentage of miscues in the category increased, so did comprehension scores.

Goodman (1965) has suggested that reader's use of syntax and meaning, as seen through the production of syntactically



and semantically acceptable miscues in the RMI are the best indications of a readers' proficiency. Proficiency, as we have discussed in previous chapters, is defined as the readers ability to comprehend or grasp the meaning of the material being read.

The results of this study clearly indicate a strong relationship between syntactically and semantically acceptable miscues and reading comprehension which supports Goodman's statement on this relationship as well as other studies by Yetta Goodman (1967) and Watson (1973). As the percentage of syntactically and/or semantically acceptable miscues increases, so do comprehension scores.

According to Goodman's psycholinguistic theory of the nature of the reading process, the reader, a language user, utilizes his/her knowledge of the rules that govern language to determine if what is being read sounds like language and if it made sense. These two concerns are a direct indication of the readers emphasis on syntax and meaning.

The subject, in this case a child, has a sense for the correctness of the grammatical structure of language so that although the rules may not have been formally taught he/she can determine if the OR is logical in terms of language. The reader also determines if his/her production, in addition to sounding like language, makes sense. The concern is for the meaning of what is being read.





In the discussion of findings regarding differences between proficient and non-proficient readers we will take a closer look at the effective use of omission of redundant cues in language which still produce acceptable syntax and meaning.

We also observed that in the production of syntactically and semantically acceptable miscues, it was quite common for children to use an acceptable substitution for a word, in most cases one more familiar to them such as the following:

Text: Mas un día enfermó la esposa del campesino

Reader: Mas un día enfermó la mujer del campesino

Text: Compraré algunos alimentos para mi mujer y mis hijos

Reader: Compraré algunos alimentos para mi mujer y mis nenes

Text: ... el jorobadito ...

Reader: ... el jorobaño ...

Another quite common, yet curious miscue was the substitution of a word which was infrequent in the subjects vocabulary, but obviously more in tone with author's writing style which the child was aware of. In other cases, specially among the proficient readers who were more aware of the fact that the stories read in school have, in many instances, a style different from that used by the children, there were substitutions which were syntactically and semantically

acceptable that represented less familiar vocabulary than the children's. It was as if they were aware that the author's style was "fancier" than their own. Some frequent miscues of this type were:

Text: ...cuando los demás pájaros están durmiendo.

Reader: ...cuando los demás pajarillos están durmiendo.

Text: Baolín, el duendecito del Bosque.

Reader: Baolín, el duendecillo del Bosque.

Other examples of miscues which were syntactically and semantically acceptable and produced no loss or change in the meaning were those where intonation, regarding the use of pauses, was changed:

Some examples are:

Text: Una mañana Pedro tuvo que salir a trabajar temprano y por el camino se dijo:

Reader:<sup>1</sup> Una mañana, Pedro tuvo que salir a trabajar temprano y por el camino se dijo:

Reader:<sup>2</sup> Una mañana Pedro tuvo que salir a trabajar temprano. Por el camino se dijo...

Text: Se puso a pescar, y un pez nacarado picó el anzuelo. Entonces Pedro se preguntó:

Reader: Se puso a pescar, un pez nacarado picó el anzuelo y entonces Pedro se preguntó:

These miscues indicate great control over syntax and the appropriate use of variations in pauses. These readers

are aware that the reading must make sense and sound like language.

Another quite common miscue was the substitution of words making use of diminutives. This was quite common among children.

The study found that all subjects made more syntactically acceptable miscues than semantically acceptable miscues. In two separate studies in 1971, Menosky and Yetta Goodman arrived at the same conclusion. P. D. Allen (1969) also found data to support this statement:

The relation between syntax and semantics must be kept in mind when discussing this result.

As Allen (1969) pointed out, miscues with no syntactic acceptability will rarely have full semantic acceptability so that, syntax precedes meaning.

Most readers, as is evident in the results of this study, will produce an equal or greater percentage of syntactically acceptable miscues than semantically acceptable ones. In other words, it is quite possible to produce sentences which are grammatically correct, but will make no sense or are unacceptable semantically. On the other hand, it isn't possible to produce a sentence which is semantically correct and is unacceptable in relation to its syntax. Language is dependent on its rules and structure in order to produce acceptable meaning.



The relationship of the meaning change variable to comprehension scores requires little discussion. The percentage of miscues in meaning change represent those miscues which have no or minimal effect in the meaning of the material being read, so that if the reader produced a miscue which was both syntactically and semantically acceptable, as well as significant in terms of changing the meaning of the passage it would be expected that these conditions would result in a high comprehension score. In other words, the quality of the miscue in these three categories indicates that the meaning has been retained. It usually indicates that the reader has grasped the meaning of the sentence or phrase and made changes or produced a miscue which is consistent with that meaning; indicating in the miscue itself that he/she has comprehended the passage, thus producing a miscue which retained the meaning with no loss or minimal loss of comprehension.

(4) Total number of miscues and reading comprehension

Findings: A significant negative correlation was obtained ( $r = .3967$ ) at the .05 level between the total number of miscues and reading comprehension so that, as the total number of miscues increased, comprehension scores decreased. This correlation was also significant at the .01 level.

Discussion:

Previous studies in miscue research have found that there is no significant relationship between the number of miscues made during oral reading and reading comprehension



(Goodman and Burke, 1970; Yetta Goodman, 1971). In the present study we found a significant inverse relationship between these two variables such that, as the total number of miscues increased, comprehension scores decreased.

Yetta Goodman (1972) discussed the diagnosis of reading in terms of the quantity and quality of miscues and stated that "the number of miscues a reader makes is much less significant than the meaning of the language which results when a miscue has occurred".

Although we are in complete agreement with this statement as can be seen from our previous discussion of the quality of miscues such as those in the syntactic and semantic acceptability categories and reading comprehension, one must not disregard the difference between something being "less significant than" and "being insignificant". This is to say, that although the quality of miscues is related to a reader's ability to comprehend, one cannot disregard the disruptive effect of a large number of miscues on comprehension. Findings of this study indicate that as the total number of miscues increased, comprehension scores decreased.

This findings which was sustained across all subjects did not turn out to be a significant variable when comparing non-proficient and proficient readers. In other words, when comparing across all subjects there was an inverse relationship between the total number of miscues produced and reading

comprehension while then comparing the relationship of these two variables for proficient versus non-proficient readers we found that there wasn't a significant relationship between the total number of miscues produced and reading comprehension. This may have occurred because of sample size.

Concerning the remaining RMI questions, the correlations obtained across all subjects support the following statements:

- (1) There was no significant relation between dialect and comprehension (Y. Goodman, 1960; Allen, 1969; Burke, 1969; Burke & Goodman, 1969; Jensen, 1972; Sims, 1972).
- (2) There was no significant relation between intonation and comprehension scores (Y. Goodman, 1967; Y. Goodman, 1971).
- (3) There is not a significant relationship between the degree of graphic similarity of the miscue to the expected response and comprehension scores.
- (4) There is no significant relationship between the sound similarity of the miscue and comprehension scores.
- (5) The grammatical function of a miscue has no relation to comprehension scores.

- (6) The percentage of corrections of miscues has no significant relation to comprehension scores.

Regarding the graphic and sound similarity of miscues we found that all readers made miscues with strong grapho/ phonic similarity. Other researchers have indicated similar findings (Clay, 1968; Y. Goodman, 1971; Rousch, 1972).

Given the quite regular grapheme-phoneme correspondences in Spanish it seems quite evident that miscues would hold strong similarity to the ER, perhaps stronger than the one seen in the English language.

#### Summary:

In relation to the variables which showed a clear relationship with reading comprehension across all subjects, results indicate that:

There is a significant positive correlation between:

- (1) Miscues which are syntactically acceptable and reading comprehension.
- (2) Miscues which are semantically acceptable and reading comprehension.
- (3) Miscues which involve no or minimal change in meaning and reading comprehension.

In addition to this a significant inverse relationship was found between the total number of miscues produced and reading comprehension.

It was also observed that:

- (1) Subjects produced more syntactically acceptable miscues than semantically acceptable miscues.
- (2) All subjects produced miscues (OR) with strong grapho/phonic similarity to the ER.

#### Relationship Among RMI Questions and Comprehension for Proficient and Non-Proficient Group

When comparing the reading behavior of the proficient groups significant differences were found which indicate differences in the use or effective use of reading strategies. The categories in which there were significant differences between these two groups were: graphic similarity, grammatical acceptability, semantic acceptability, meaning change and comprehension.

##### (1) Graphic similarity

Findings: An analysis of variance was performed ( $F = 5.9412$ ) and a significant relationship was obtained at the .05 level between the percentage of miscues with high graphic similarity to the word being read for proficient and non-proficient readers. The non-proficient readers produced a greater percentage of miscues with high graphic similarity than did the proficient readers.



Table 1  
 Percentage Miscues With High Graphic Similarity

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 82                |
| proficient     | 73                |

Discussion:

The finding that non-proficient readers produce more miscues with high-graphic similarity is consistent with Goodman's hypothesis of how subjects process reading. The beginning or non-proficient reader has not yet developed his/her reading strategies to a degree in which he/she can decode the meaning from the text directly.

There are various levels of reading proficiency. The most proficient readers use the minimal amount of the information available in the printed page so that he/she decodes directly.

Language is redundant. When a subject is reading he/she samples and selects from the cues provided by the written material and his/her knowledge of language to predict what is being read. The three cues systems from which the reader samples are the grapho/phonic, the syntactic and the semantic.

Sampling is necessary because the human brain has a limited capacity for storing visual information. That is why it has been stated that "Reading is only incidentally visual." (Kolers, 1973). Thus, the reader must select bits and pieces



of information from these three systems to predict what follows in the text. For this purpose he/she selects parts of the graphic/phonic information available and in addition questions his/her production of the material being read by the determining if his/her production "sounds like language" (syntax) and "make sense" (semantics).

The proficient reader is the one which uses the least amount of cues to arrive at the meaning.

When the material we read is very difficult we tend to slow down and give more attention to the visual information provided. This same process occurs in the non-proficient reader; he/she looks more closely to the visual information because the reader is still non-proficient in sampling from the syntactic and semantic cues systems thus the non-proficient reader tends to produce a greater percentage of miscues with high graphic and sound similarity to the text because he's relying more on this cue systems and is paying more attention to the visual information than the proficient reader, who as a proficient scanner and predictor of the syntactic and semantic cues, will scan more rapidly over the visual cues than the non-proficient reader.

(2) Grammatically acceptable miscues

Findings: A significant statistical difference was obtained ( $F = 14.7229$ ) at the .05 level between the percentage of grammatically acceptable miscues and reader proficiency. It was also significant at .01 level. Proficient readers produced

a significantly higher percentage of syntactically acceptable miscues than did the non-proficient readers.

Table 2

Percentage of Miscues With Full Grammatical Acceptability

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 22                |
| proficient     | 38                |

Discussion:

The present data support those found in Yetta Goodman's (1971) study which concluded that average readers make more syntactically acceptable miscues than poor readers.

This finding also supports Kenneth Goodman's contention that the best indicator of a reader's proficiency is the percentage of syntactically and semantically acceptable miscues a reader makes for these variables are an indication that the reader is sampling from the redundant cues provided in the text and is relying less and less on visual information to get to the meaning. The quality of miscues is regarded as more important than the quantity of miscues a reader makes.

Miscues which retain acceptable syntax are indicators that a reader is reading for meaning and that his/her attempts in the reading process show a concern for using the rules that govern a given language. It demonstrates that the reader has sufficient control over language and knows that "reading is

supposed to sound like language." He/she then produces miscues which are syntactically acceptable because he/she is sampling from the cues provided and making miscues which retains the syntax of the language. This in itself will not necessarily translate into greater comprehension but is a higher quality miscue than miscues which are merely graphically or phonetically similar to the expected response.

As Goodman has stated a reader can be a very proficient "word-caller" and this fact has no bearing on his/her proficiency as a reader: the ability to comprehend what is being read. Miscues which retain syntactic acceptability are indicators that the reader is making substitution, omissions, etc., to give syntactical or grammatical sense to the reading.

The proficient reader relies more on the syntactic and semantic information which uses his/her knowledge of language in trying to produce reading which makes sense while the non-proficient is still more dependent on the visual information provided by the printed page.

### (3) Miscues with full semantic acceptability

Findings: An analysis of variance was performed ( $F = 24.3010$ ) and a significant relationship was obtained at the .05 level between the percentage of semantically acceptable miscues produced and reading proficiency. Proficiency readers produced a significantly higher percentage of miscues which were semantically acceptable than did the non-proficient readers. The proficient readers produced more than twice as many semantically acceptable miscues than the other group.

Table 3  
Semantic Acceptability Miscues

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 7                 |
| proficient     | 28                |

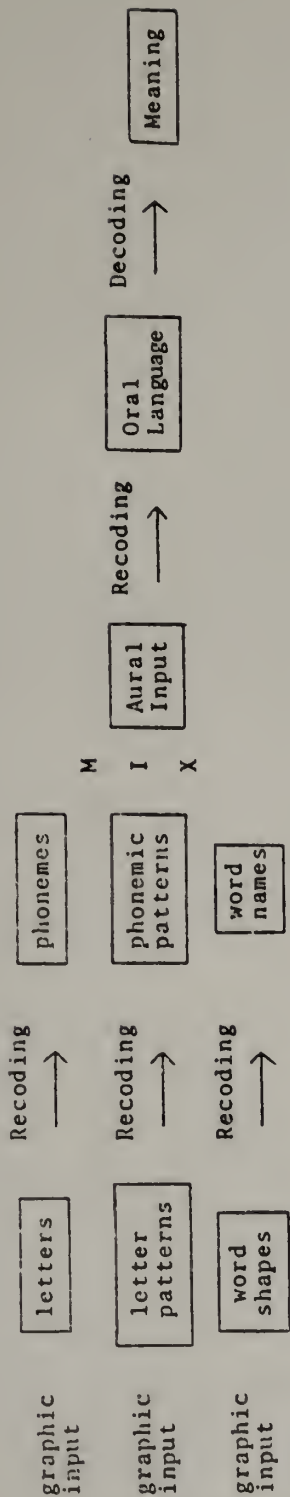
Discussion:

As we pointed out in the previous sections concerning semantically acceptable miscues, this type of miscue is the best indicator of a reader's proficiency. The reader who produces a high percentage of semantically acceptable miscues is decoding a message directly from the printed page without recoding, as is observed in the non-proficient reader.

This subject is at the highest level of reading proficiency.



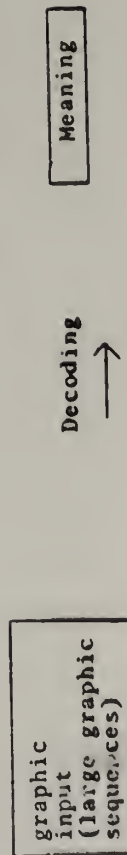
PROFICIENCY LEVEL 1:



PROFICIENCY LEVEL 2:



PROFICIENCY LEVEL 3:





The proficient reader is scanning and sampling the minimal information from the cues systems available in order to make predictions regarding the material. The semantic acceptability of the miscues indicate that the reader has "digested" the deep structure of the written symbols and has made miscues which retain this deep structure.

The significance of this type of miscue has already been established through the strong relationship between semantically acceptable miscues and reading comprehension which we have discussed.

The reader by producing a large percentage of semantically acceptable miscues is indicating his/her adequate comprehension of the material.

This finding supports Goodman's hypothesis on the use of reading strategies by proficient and non-proficient readers.

The more skilled readers use syntax and semantics more to gain meaning from the material. Their control of the rules of language shows control over the deep structure as well as the surface structure.

The less proficient readers will rely more on the graphic symbols. This can best be seen by observing the differences in the quality of the miscues that proficient and non-proficient readers make. Proficient readers tend to produce miscues which retain or attempt to retain the meaning and appropriate syntax while the non-proficient readers produce miscues which are closely similar in terms of the sound or

graphic display but are farther from appropriate syntax and meaning.

Lets see some examples:

Text: Compraré algunos alimentos para mi mujer y mis hijos.

Non-proficient reader: Compraré algunos almentos para mi  
para mi mujer y mis ejis.

Proficient reader: Compraré algunos alimentos para mi mujer  
y mi hijo.

In this study we also observed that non-proficient readers were less concerned with producing language that made sense. This was seen in the placement of stress in words where they became nonsense words. This seems important given that the use of accents in Spanish, as we have discussed previously, makes the appropriate use of stress a significant variable in gaining meaning.

Some examples observed were:

Text: Pedro llegó a la playa.

Reader (non-proficient): Pedro llego a la playa.

Reader (proficient): Pedro llegó de la playa.

Text: Guaraguao, no tengo traje que ponerme.

Non-proficient reader: Guaraguao, no tengo traje que ponerme.

Proficient reader: Guaraguao, no tengo traje. ¿Qué ponerme?

As beginning or less proficient reader's improve, a tendency is observed in the use of different reading strategies. However, this does not mean that readers depend solely

on one of the cue systems, rather than the weight of the use is dependent on the reader's ability, growth and the type or difficulty of the material which is being read.

These findings are supported by studies conducted by Yetta Goodman (1971) which concluded that average readers make more semantically acceptable miscues than poor readers.

Regarding the strong relationship between semantically acceptable miscues and reading comprehension, Yetta Goodman (1967) and Watson (1973) also found that comprehension increased as the percentage of semantically and syntactically acceptable miscues increased.

#### (4) Meaning change

Findings: There was a significant statistical difference between the percentage of miscues produced by the proficient and non-proficient groups which did not alter the meaning of the sentence being read ( $F = 9.6564$ ) at the .05 level. It was also significant at the .01 level.

The proficient readers produced a higher percentage of miscues which did not alter the meaning than did the non-proficient readers.

Table 4

Miscues Which Involved No Loss  
Or Minimal Change in Meaning

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 21                |
| proficient     | 33                |

Discussion:

As we have argued in our past discussion concerning the analysis of meaning change, it can be expected that a strong relationship will exist between this variable and semantically acceptable miscues. Although it will not necessarily hold in all cases, one would expect that if a reader produces a miscue which retains the meaning of the expected response, then, the effect in terms of change would be minimal. Since the proficient reader produces a miscue which makes sense semantically he/she is indicating that he/she has looked at the deep structure (meaning) of the sentence, phrase or word being read and is making miscues which are in accord with that deep structure. This would produce in most instances, a miscue with no or minimal effect in terms of changing the meaning of the original text.

Since proficient readers produced a higher percentage of miscues which are semantically acceptable one would expect that the same situation would hold regarding how the miscue has retained the original meaning of the text. Of the four miscue categories presented above we can observe that the last three categories had been previously stressed in other miscue studies as the best indicators of a reader's proficiency in reading. They represent qualitatively significant miscues which indicate a greater control over language. Goodman has repeatedly pointed out the importance of these variables.



(5) Comprehension

A significant statistical correlation was obtained ( $F = 25.7955$ ) at the .05 level, for the comprehension scores of non-proficient and proficient readers. Proficient readers obtained more than twice as many points on comprehension scores than the non-proficient readers.

Table 5

Average Comprehension Score  
(Retelling Score)

| <u>Groups</u>  | <u>Average per story</u> |
|----------------|--------------------------|
| non-proficient | 21.83                    |
| proficient     | 67.98                    |

It has been stated that the purpose of reading is to comprehend so that a reader's proficiency is determined by his/her ability to arrive at meaning.

The data provided here is significant in terms of added support to Goodman's definition of reading proficiency and its ultimate goal: comprehension.

In the past we have been faced with readers who make minimal numbers of miscues and yet fail to comprehend large parts of the written material. The importance assigned to comprehension as the measure of a reader's ability cannot be over emphasized. For decades our concern as educators has been to develop skills in reading instruction based on the



readers' ability to produce correct oral reading behavior. The findings in this study, as well as others, reemphasize the importance of determining a reader's proficiency by his/her comprehension.

The relationship that the study has established between syntactically acceptable miscues and reading comprehension reinforces our hunch that the high quality of the reader's miscues will be a better source of information regarding his/her reading competencies than the number of miscues he/she produces.

There seems to be a clear and significant relationship between quality of miscues, comprehension and proficiency.

In this particular study we observed that among the non-proficient readers there was serious concern for producing or reproducing the exact reading with as few miscues as possible. A few of these subjects made numerous attempts at self-correction but got lost in the persistent process of correcting every miscue. These subjects showed greater concern with pronouncing words correctly and seemed to see little need to have an overall view of the message presented.

The proficient readers on the other hand, were more selective in choosing which miscues to correct. They seemed more concerned with the meaning of sentences or paragraphs as a whole, rather than trying to read and correct word by word.

(6) Total number of miscues

The quantity of miscues a reader produces has been questioned as an indicator of reading proficiency and comprehension by other miscue studies (Goodman & Burke, 1970; Y. Goodman, 1971; Goodman & Burke, 1968; Goodman & Burke, 1969; Gutknecht, 1971; Y. Goodman, 1972; Rousch, 1972).

In the present study we found that there wasn't a significant difference ( $F = 3.3847$ ) between the number of miscues made by non-proficient and proficient readers although the non-proficient readers did produce a greater number of miscues than the proficient.

Table 6  
Total Miscues

| <u>Groups</u>  | <u>Sum</u> |
|----------------|------------|
| non-proficient | 1669       |
| proficient     | 1422       |

(7) RMI Variables for which there was not a significant difference between proficient and non-proficient readers:

In relation to dialect ( $F = .0311$ ), grammatical function ( $F = .1039$ ), intonation ( $F = .6068$ ), sound similarity ( $F = 3.3112$ ) and self-correction behavior ( $F = .5696$ ), there was no significant difference between the proficient and non-proficient readers.

In three variables the non-proficient readers produced more miscues than the proficient readers, but these differences were not significant in statistical terms.

Table 7

## Percentage of Miscues Involving Dialect

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 4                 |
| proficient     | 5                 |

Table 8

## Percentage of Miscues Involving Intonation

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 18                |
| proficient     | 23                |

Table 9

## Percentage of Miscues With High Phonic Similarity

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 77                |
| proficient     | 71                |

Table 10

Percentage of Miscues With the Same Grammatical  
Function Than the Word in the Text

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 82                |
| proficient     | 71                |

Table 11

Percentage of Miscues Which Were Corrected

| <u>Groups</u>  | <u>Percentage</u> |
|----------------|-------------------|
| non-proficient | 17                |
| proficient     | 14                |

Summary:

In summary when comparing the oral reading behavior of proficient and non-proficient readers we found that:

- (1) Non-proficient readers produced more miscues with high graphic similarity to the expected response than proficient readers.
- (2) Proficient readers produced a higher percentage of miscues which were syntactically acceptable.
- (3) Proficient readers produced a higher percentage of miscues which were semantically acceptable.
- (4) Proficient readers produced more miscues which retained or made minimal change to the meaning of the material.
- (5) Although non-proficient readers made more attempts at correction, this difference was not significant.
- (6) Proficient readers obtained significantly higher scores on comprehension than the non-proficient readers.
- (7) The differences in the production of miscues involving dialect, intonation, phonic similarity and grammatical function behavior were not significant for the proficient and non-proficient readers.

In other words, the variables which differentiated significantly between the non-proficient readers were: graphic similarity, syntactically and semantically acceptable miscues, meaning change, and comprehension scores.



The forementioned categories have previously been indicators of differences in the use of reading strategies among proficient and non-proficient readers in other studies, thus supporting K. Goodman's exposition of how reading is processed in terms of proficiency.

Relationship Among Syntactically and Semantically  
Acceptable Miscue and Reading Comprehension  
Within Child Across Stories of Increasing Difficulty

The study was unable to establish any strong relationship between these two variables and reading comprehension within child.

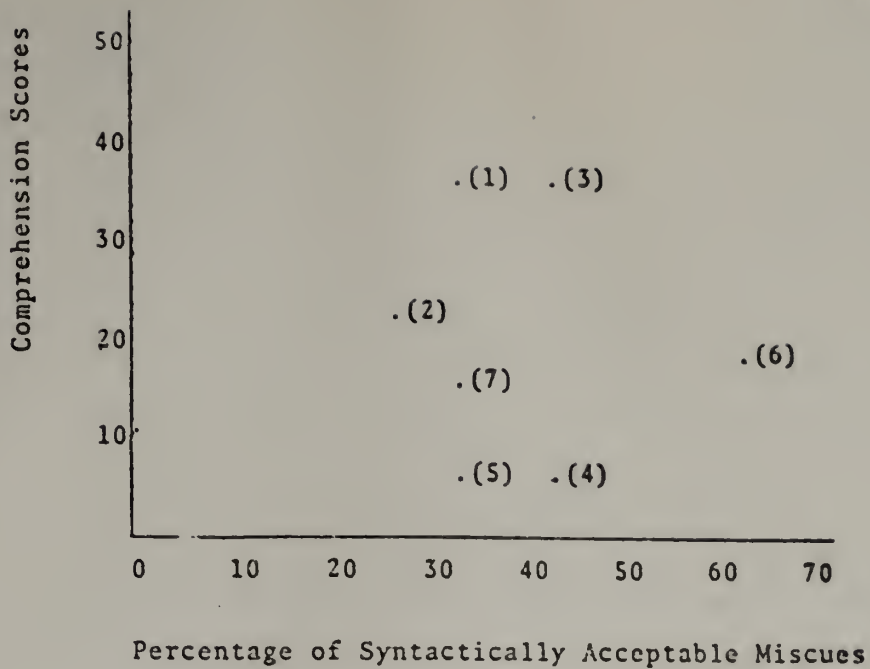
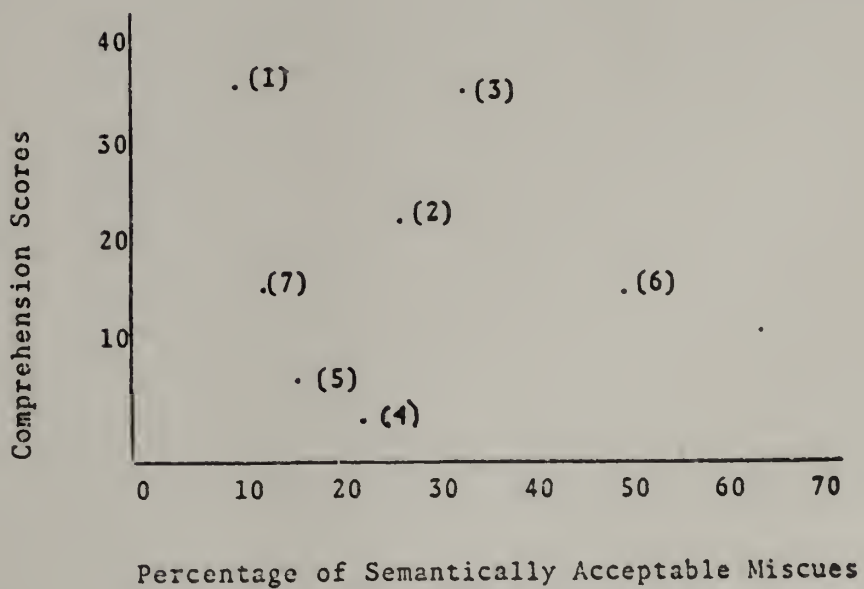
The scattergrams which follow represent the relationship of these variables to reading comprehension.

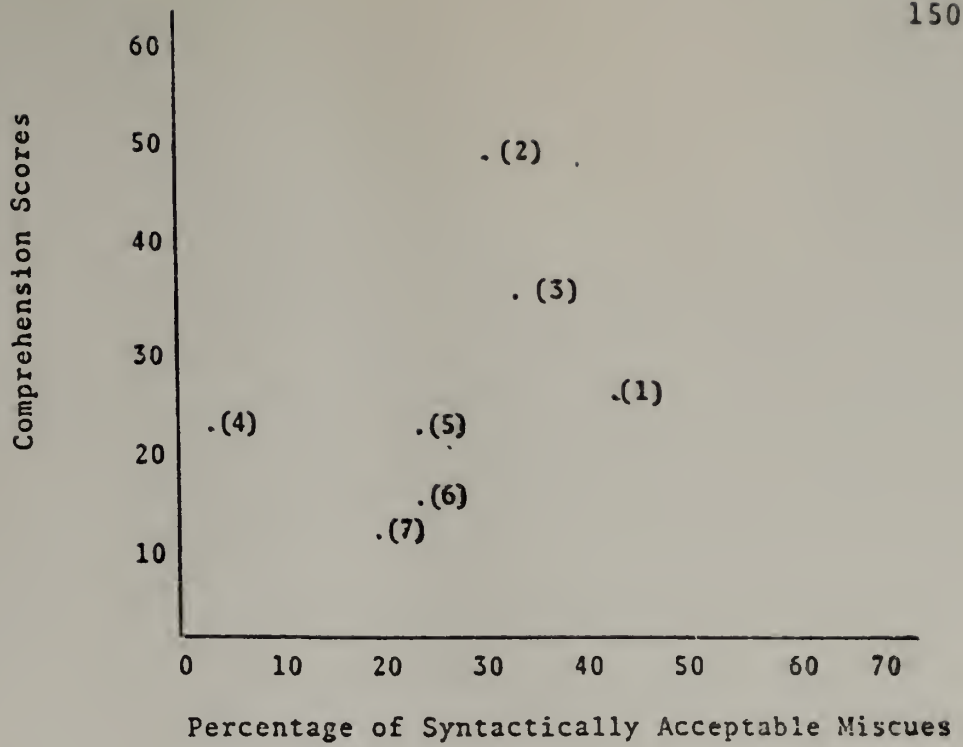
There is no pattern to indicate that this relationship exists when we record the data by child. It may be necessary to reexamine the criteria for determining increased difficulty in story material in a future study and to utilize larger groups of children instead of looking at individual subjects.

### Scattergrams

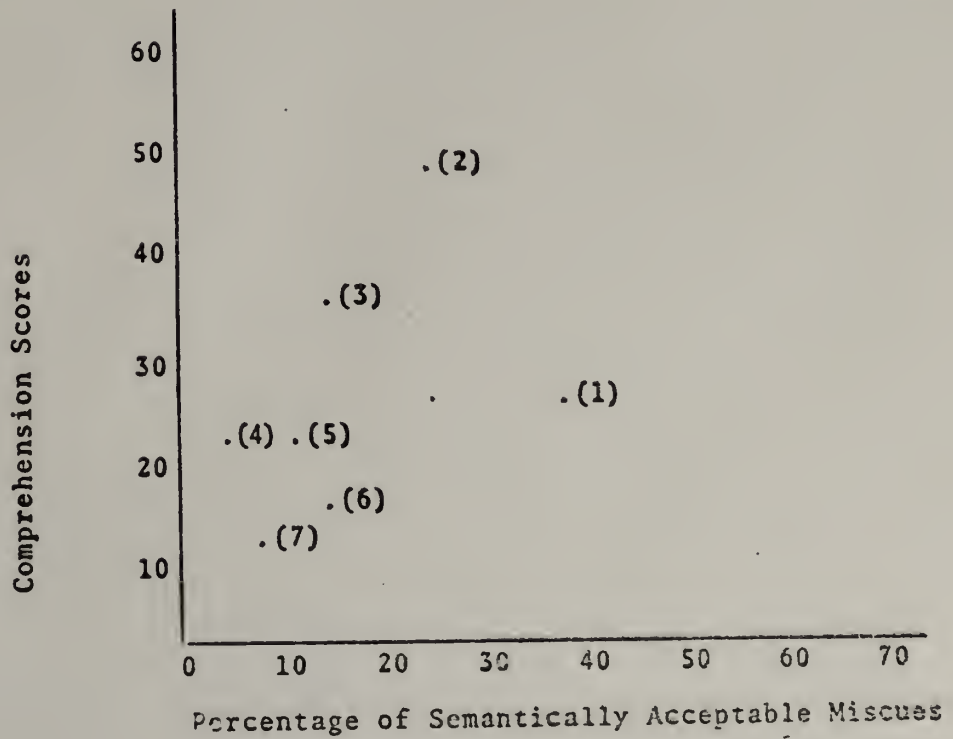
Representation of the relationship of syntactic and semantically acceptable miscues and comprehension for each child across seven stories of increased difficulty.

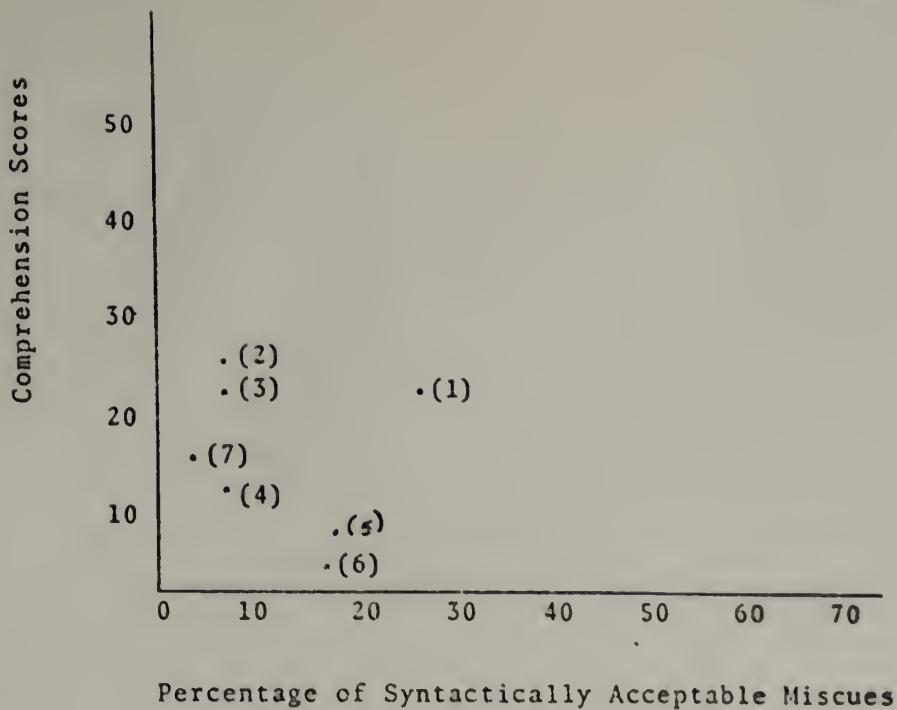
Subjects one through four represent the non-proficient readers and subjects five through eight represent the proficient readers.

CHILD 1

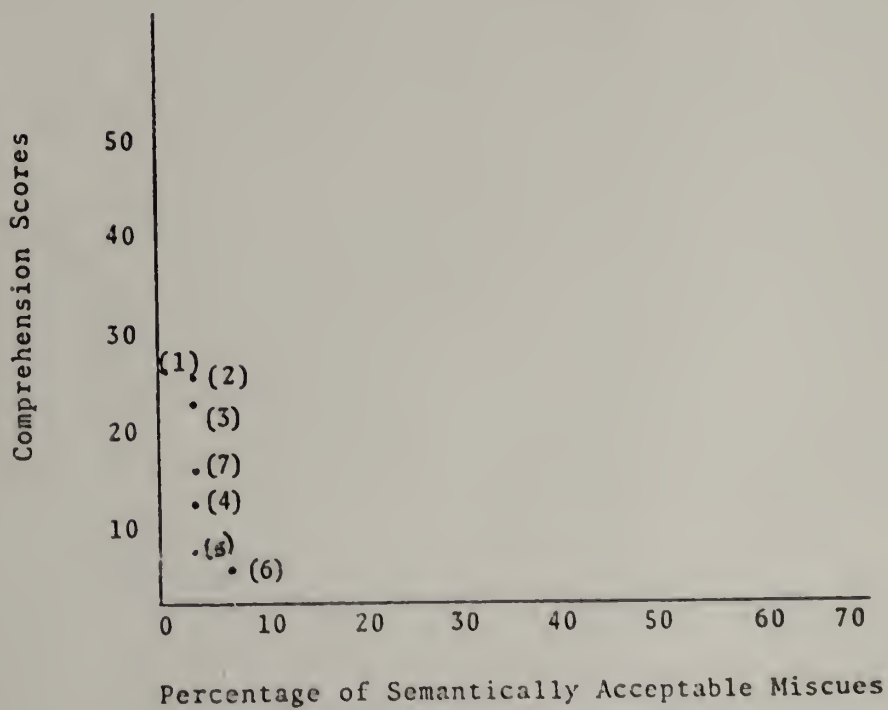


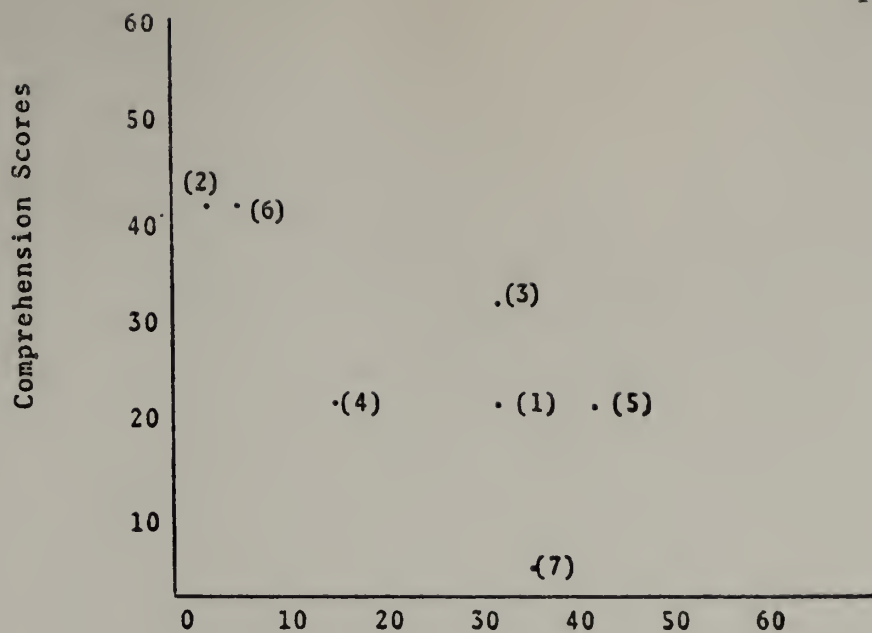
CHILD 2





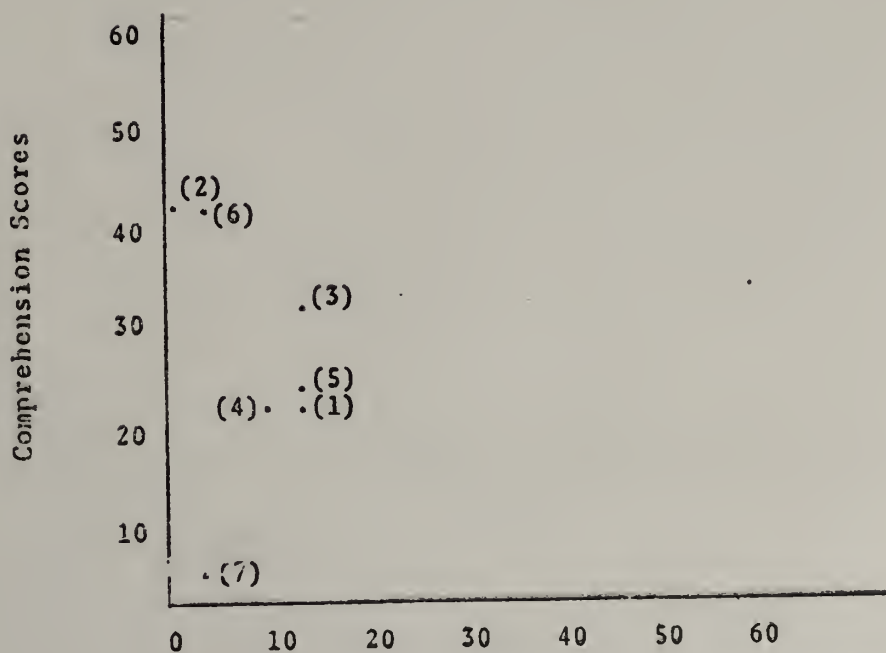
CHILD 3





CHILD 4

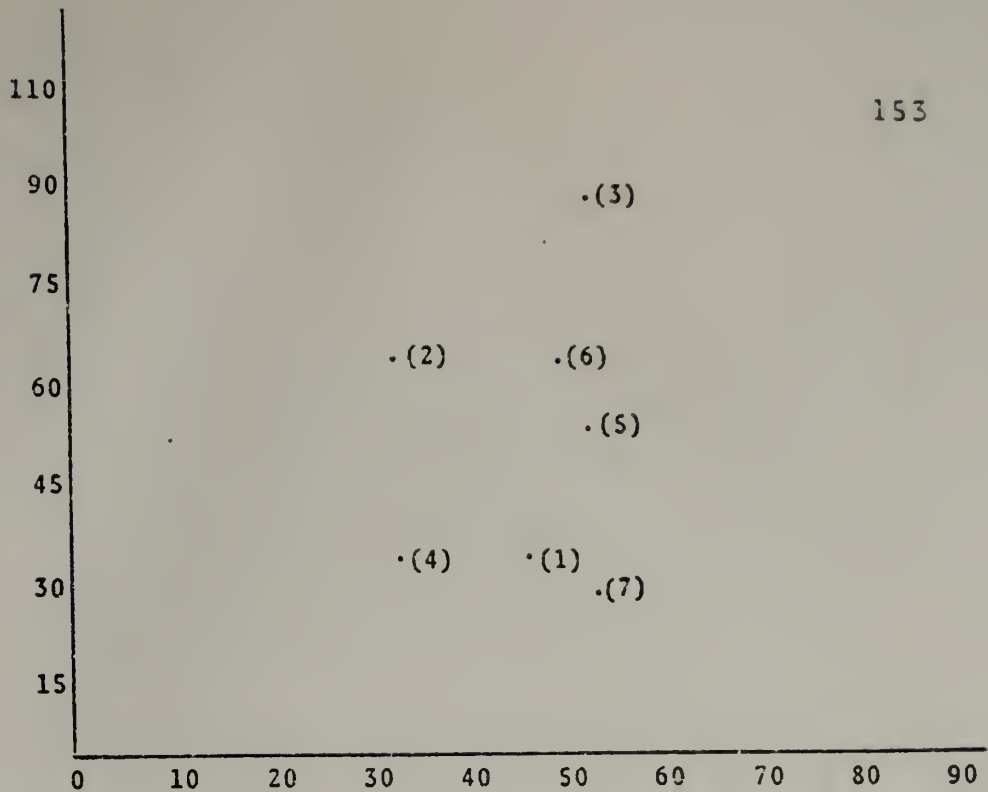
Percentage of Syntactically Acceptable Miscues



Percentage of Semantically Acceptable Miscues

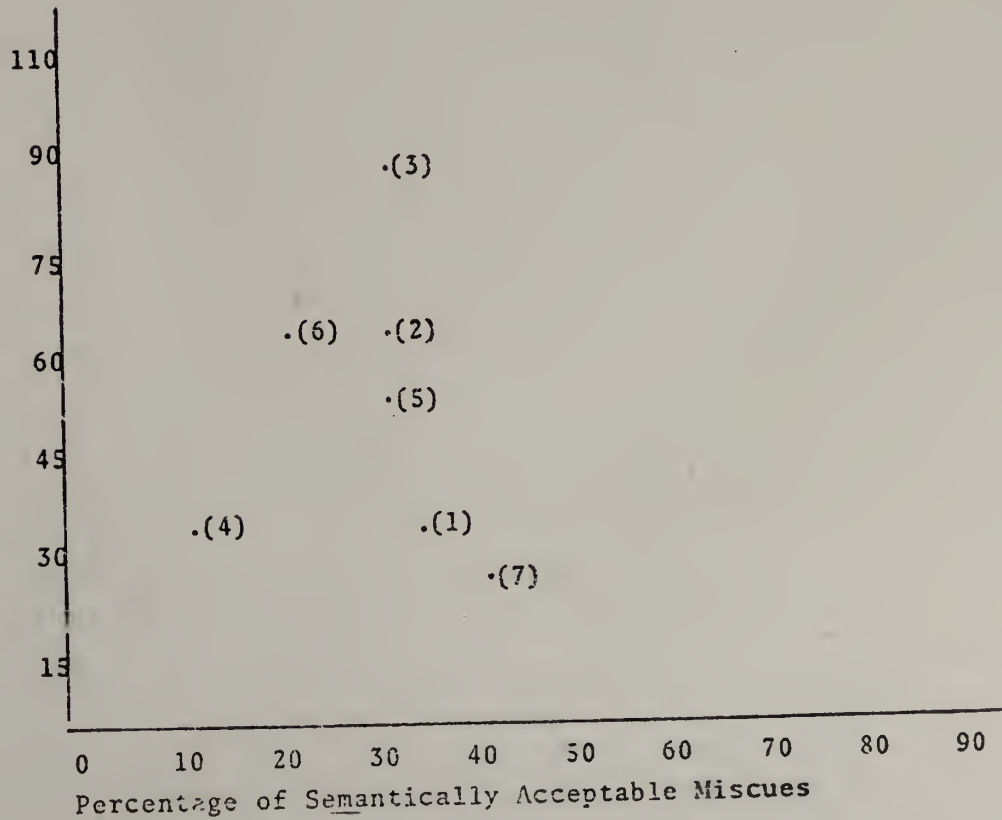


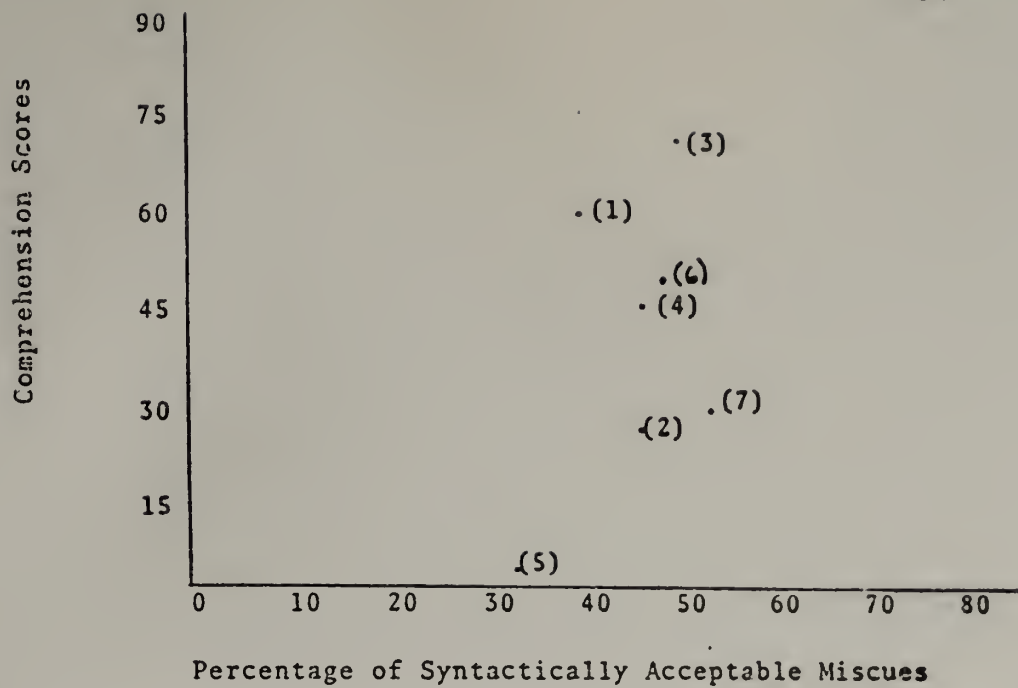
Comprehension Scores



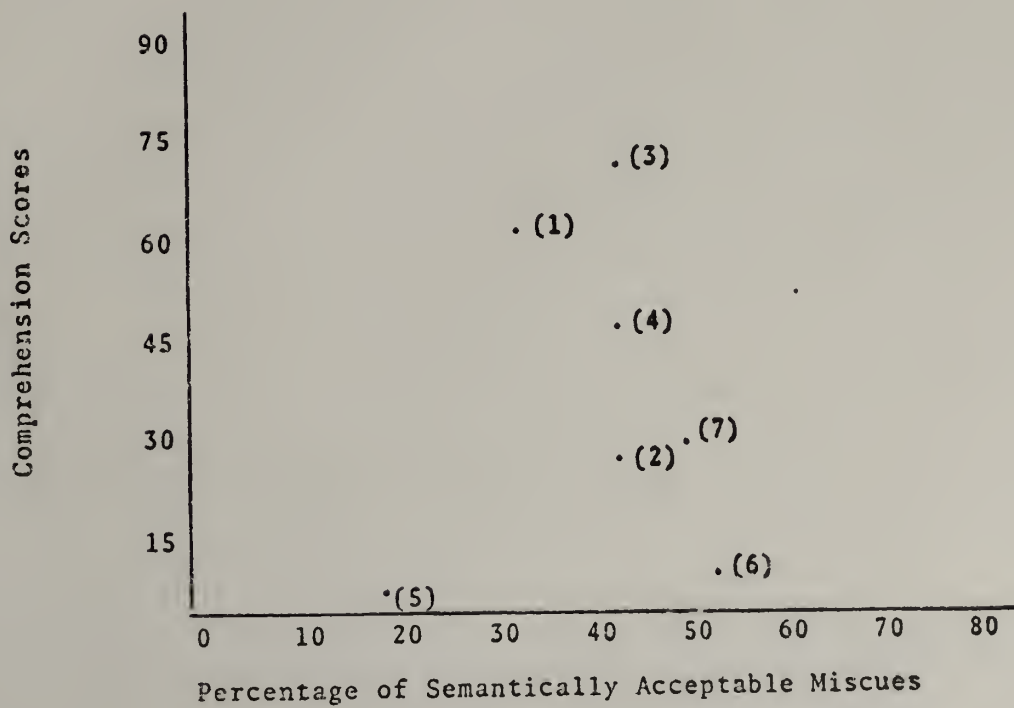
CHILD 5

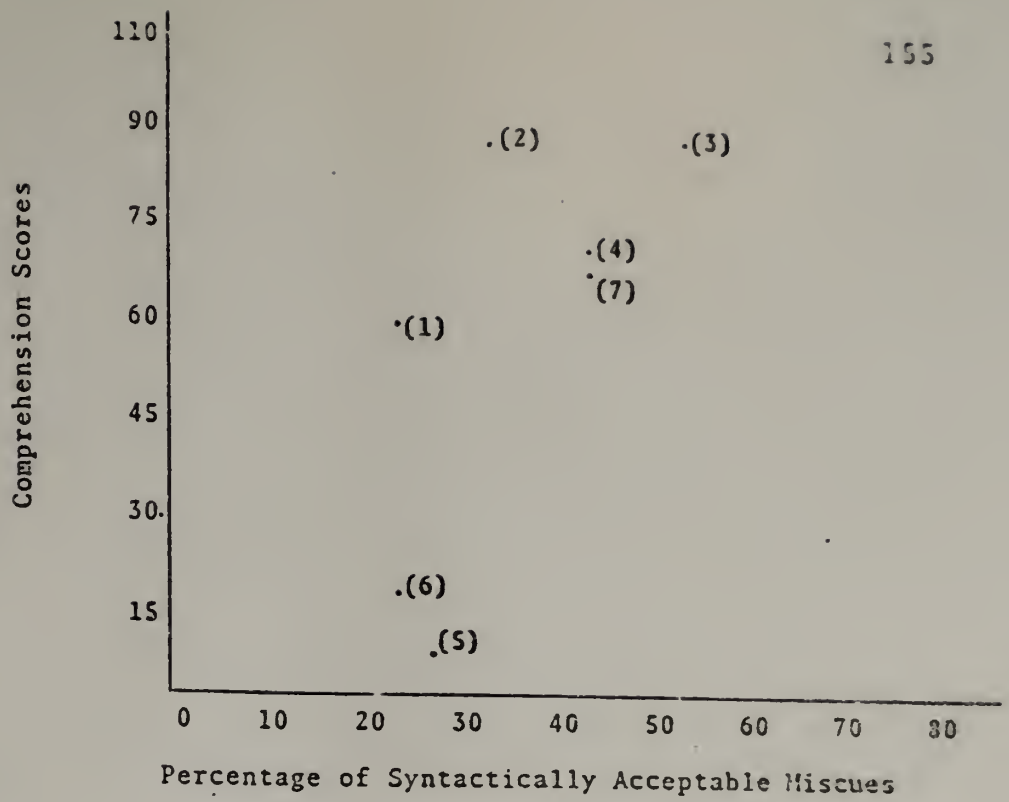
Comprehension Scores



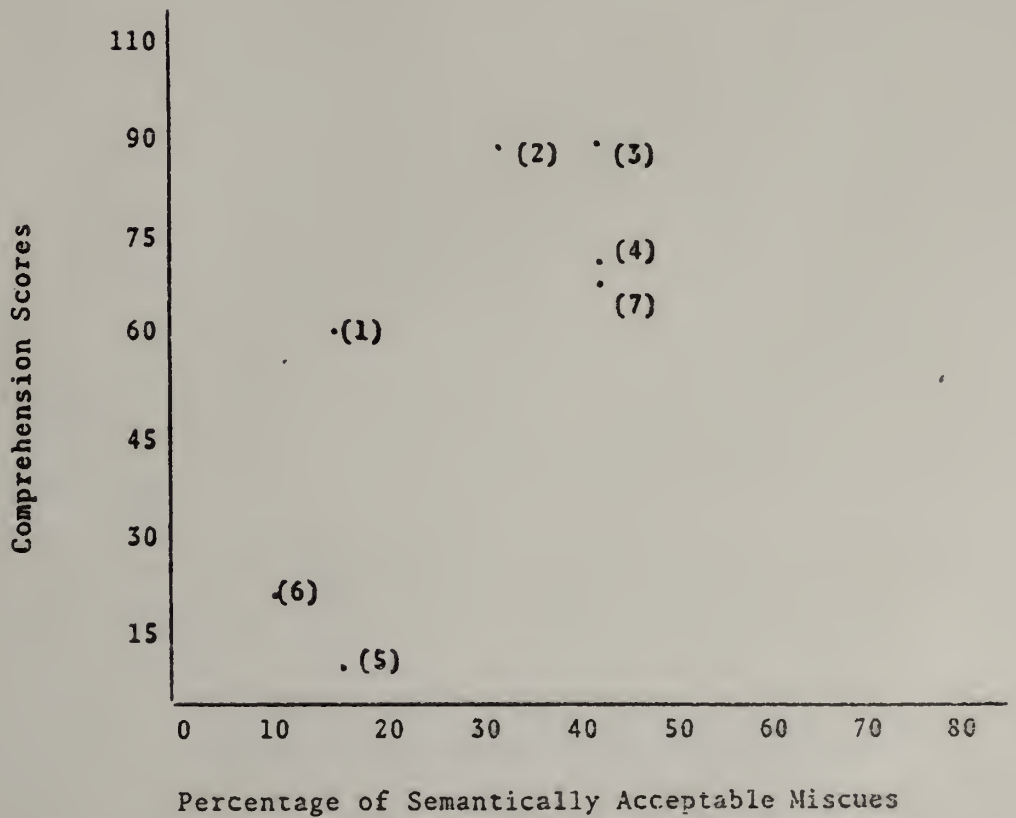


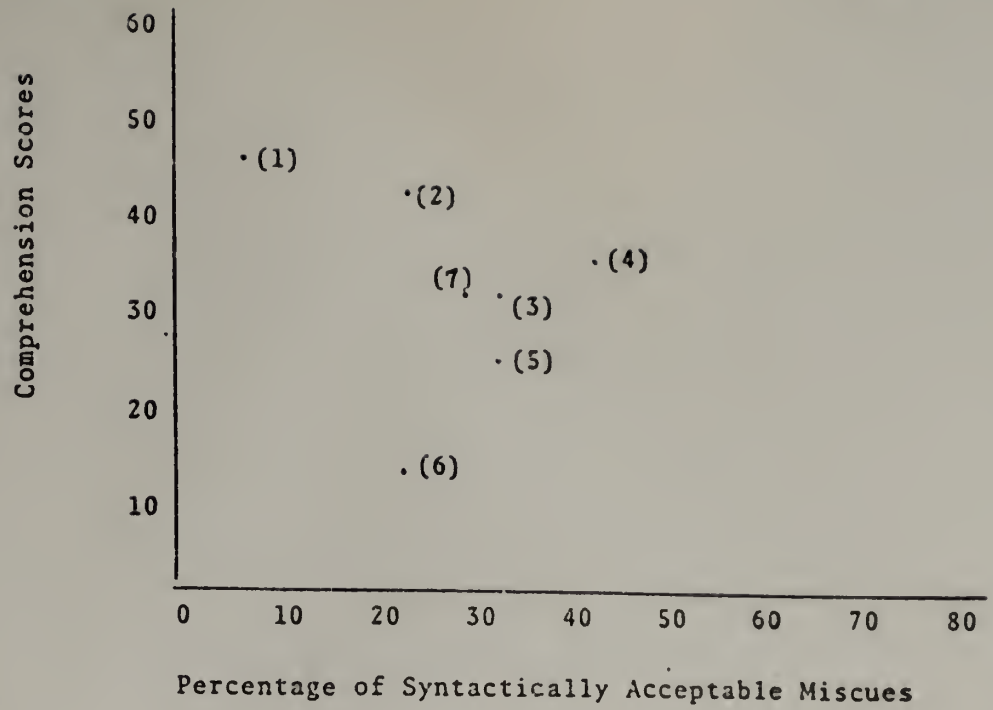
CHILD 6



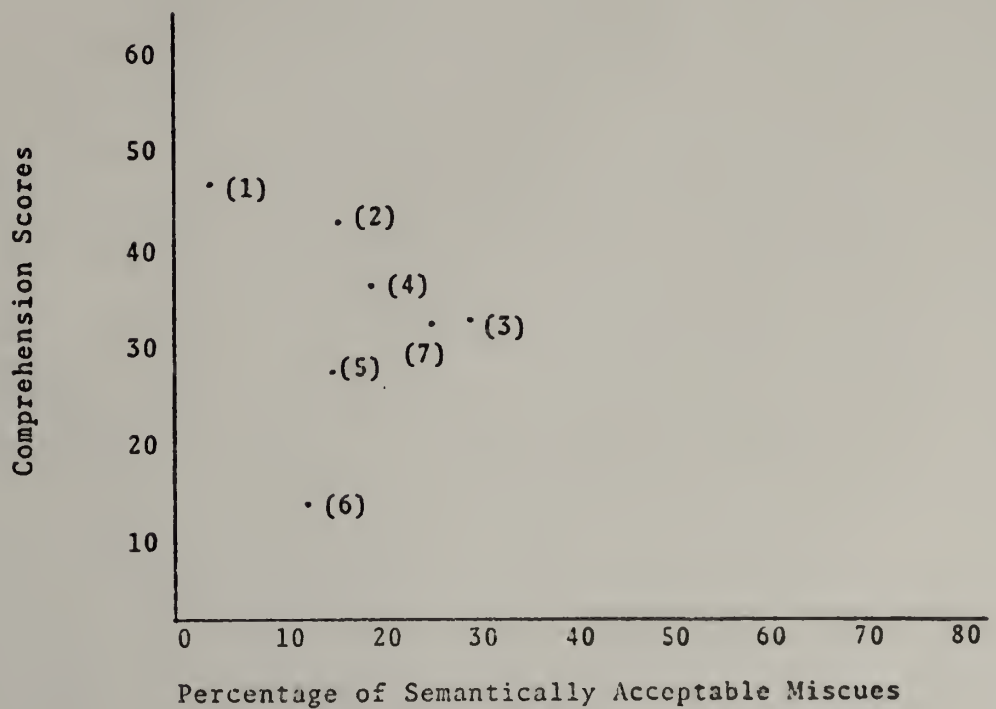


CHILD 7





CHILD 8



Point representation are presented so that story number one is the least difficult and story number seven is the most difficult.

Table 13  
Order of Story Difficulty After  
Averaging Comprehension Scores

| <u>Original Story Order</u> | <u>Story Order<br/>After Computing<br/>Comprehension Scores</u> | <u>Final<br/>Story Order</u> |
|-----------------------------|---|------------------------------|
| 1                           | 52.22   | 1                            |
| 2                           | 46.35   | 2                            |
| 3                           | 40.34   | 3                            |
| 4                           | 32.96   | 6                            |
| 5                           | 28.06   | 7                            |
| 6                           | 23.44   | 5                            |
| 7                           | 19.18   | 4                            |

#### Self-correction Behavior

An examination of the self-correction behavior of proficient and non-proficient readers indicates that self-correction was linked more directly to the syntactic and semantic acceptability of the miscues than any other variable.

Proficient readers showed a tendency to correct miscues which were completely or partially unacceptable syntactically and/or semantically, but it would be presumptuous to state that this was a consistent pattern. It would be appropriate to indicate that this pattern seemed to be more relevant to the proficient readers.



The validity of this statement could be sustained more precisely for individual subjects than the group as a whole.

The self-correction behavior of non-proficient readers did not suggest any clear pattern.

It was noted though that the proficient readers were more successful at self-correction than the non-proficient one.

Based on the examination of self-correction behavior we cannot make any definite conclusions of the rationale behind this behavior in relation to the other miscue categories except what we've stated previously.

It was also noticed that the non-proficient readers made a few more attempts at self-correction, but these attempts were less successful in producing acceptable miscues than ones produced by proficient readers.

#### Summary of Findings:

As we have discussed in prior sections of this chapter the significant differences between the non-proficient and proficient readers were in the percentage of miscues which were fully acceptable in terms of syntax and meaning as well as in those that changed the meaning of the text and on comprehension scores. These differences indicate that although the difference in the total number of miscues was not significant, the quality of the miscues made the difference in terms of the ultimate goal in reading which is comprehension.

Table 12  
Summary of Results in Percentages

| Group          | Miscues which involved dialectical variations | Miscues which involved variations in intonation | Miscues with high graphic similarity | Miscues with high sound similarity | Miscues which retained the same grammatical function | Miscues in which there were attempts at correction | Miscues with full syntactic acceptability | Miscues with full semantic acceptability | Miscues which produced minimal loss of meaning | Total number of miscues produced | Average comprehension score (Retelling score) |
|----------------|---|---|--------------------------------------|------------------------------------|--|--|---|--|--|----------------------------------|---|
| Non-Proficient | 4   | 18  | 82                                   | 77                                 | 82   | 17   | 22  | 7  | 21   | 1669                             | 21.83   |
| Proficient     | 5   | 23  | 73                                   | 71                                 | 71   | 14   | 38  | 28                                       | 33   | 1422                             | 67.98   |

The non-proficient readers produced a higher percentage of miscues with high grapho/phonic similarity and in miscues which had the same grammatical function as those in the text. However these miscues had no significant effect on comprehension.

Goodman's hypothesis that the quality of the miscues is a better indicator of a reader's proficiency has been sustained for Spanish-speaking readers reading in their native language.

The use of reading strategies in which non-proficient readers rely most on the surface structure of language (grapho/phonic display) has been sustained in this study. We can also observe that the proficient readers are more proficient in their use of language and try to read with a greater sense of how language sounds and makes sense.

The fact that the language used in the study was Spanish did not discover any important differences in the use of reading strategies for non-proficient and proficient readers.

This supports the contention that the psycholinguistic nature of reading is one, no matter what language is involved. At least, in terms of the use of Spanish as well as in English. It seems to hold then, that as far as these two languages are concerned, the psycholinguistic universals indicated by Goodman are sustained.

The study provides support for all previous research conclusions based on miscue analysis which we have detailed in our discussion.

Thus, we can assert that Goodman's recommendations on the implications of the psycholinguistic nature of the reading process probably will hold true for Spanish-speakers reading in their native language. On the basis of our conclusions we can make specific recommendations on reading instruction which will be presented in our final chapter.

## C H A P T E R V

## CONCLUSION IMPLICATION &amp; RECOMENDATIONS

## Conclusions

In the psycholinguistic model of the reading process which has been developed by Kenneth Goodman and others, reading has been understood as an active process in which readers bring their knowledge of language and how it functions to the written material (K. Goodman, 1973).

Summarizing this active process it has been postulated that:

Readers select from the visual cues that are available to them and use their knowledge of what is phonologically, syntactically, and semantically possible in their language to predict and anticipate meaning. They then use their next visual focusing to confirm or deny the predictions (Hudelson López, 1977).

Studies conducted prior to this study and Sarah Hudelson López have strictly utilized native or bilingual English speakers reading in English. Goodman has contended that this theoretical framework is an extension of and projection of a theoretical view in dimensions that go beyond the research on which it is based and has invited others to test and challenge the hypothesis in terms of languages other than English (Frank Smith, 1973).

On the other hand, he has suggested, as Hudelson states without substantiation, that this process is essentially the same across languages (K. Goodman, 1973).



However, others have stated that the nature of Spanish reading is essentially different, from the nature of English reading (Curriculum Division, Region One Education Service Center, 1972) and "that given the regular grapheme-phoneme correspondences in Spanish, skill in Spanish reading is attained almost exclusively by learning the sounds that are associated with this graphemes and by the subsequent pronouncing of words from their component sounds" (Hudelson López, 1977).

In Hudelson's study (1977) it was confirmed that young native speakers reading in Spanish use context clues, thus supporting one of Goodman's hypothesis for Spanish as well as English.

The present study, accepted Goodman's challenge and proposed to examine some of the other hypotheses stated in this psycholinguistic model of reading so that, if found to be consistent in Spanish, we could begin to consider the implications of these findings and Goodman's model to reading instruction in Spanish.

It seems to us that this model of reading has a great deal to offer in terms of reading instruction and could provide a starting point for more meaningful training of reading teachers' use of methods and materials in the classroom and evaluation of our competencies in reading instruction.

As we pointed out in the first Chapters of this research paper, reading instruction in Puerto Rico has unfortunately

been modeled following the trends established in the American system with little regard of research done to sustain or discard its applicability to our population.

Goodman's work seemed important and coherent enough to warrant an exploration of its applicability to a distinctly different linguistic population.

Given our interest in working within the framework of the Spanish speakers population we set out to explore the applicability of this theoretical model to native speakers reading in Spanish not only as a means to determine its validity but also to be able to develop, if we found it to be equally applicable, new approaches to reading instruction based on a sound and well thought out model of reading.

We felt, when undertaking this research project, that our findings could be important in a series of areas.

First, we wanted to question or give added support to Goodman's psycholinguistic model of the reading process to advance its refinement by testing, denying or confirming prior findings for Spanish reading.

Second, we wanted to explore the specific relationship between syntactically and/or semantically acceptable miscues and reading comprehension, which according to Goodman, is the most significant indication of reading proficiency.

Third, we wanted to test prior findings regarding the relationship of other variables such as dialect, intonation, etc. to comprehension since many previous findings had

sustained stated relationship but for English speakers only.

Fourth, we wanted to determine the possible pitfalls and validity of the use of the RMI for languages other than English as a viable research and diagnostic instrument.

We will now summarize our findings to discuss their implications in a series of areas.

- (1) A clear relationship exists between the percentage of syntactically acceptable miscues and comprehension scores across subjects (Yetta Goodman, 1967; Watson, 1973).
- (2) A clear relationship was found between the percentage of semantically acceptable miscues and comprehension scores across subjects (Yetta Goodman, 1967; Watson, 1973).
- (3) All subjects produced more syntactically than semantically acceptable ones (P.D. Allen, 1969; Menosky, 1971; Y. Goodman, 1971).
- (4) A clear relationship was found between the percentage of miscues which retain meaning and comprehension scores across subjects.
- (5) As the total number of miscues increased, comprehension scores decreased across subjects. This finding is not supported by previous research studies which found that there isn't a significant relationship between total number of miscues and

- reading comprehension (Goodman & Burke, 1969; Y. Goodman, 1971; Goodman & Burke, 1968; B. Gutknecht, 1971; Y. Goodman, 1972; Rousch, 1972).
- (6) There was no significant relationship between dialect miscues and reading comprehension (Y. Goodman, 1967; Allen, 1969; Burke, 1969; Burke & Goodman, 1970; Jensen, 1972; Sims, 1972).
  - (7) There was no significant relation between intonation and comprehension scores (Y. Goodman, 1967; Y. Goodman, 1971).
  - (8) There was no significant relation between the degree of graphic similarity of the miscue to the expected response and comprehension scores.
  - (9) There was no significant relationship between the degree of phonic similarity of the miscue to the expected response and comprehension scores.
  - (10) Most readers made miscues with strong grapho/phonic similarity (Clay, 1968; Y. Goodman, 1971; Rousch, 1972).
  - (11) The grammatical function of a miscue had no relation to comprehension scores.
  - (12) The percentage of correction of miscues had no significant relation on comprehension scores.

Summarizing the conclusions that can be drawn when comparing the use of reading strategies of proficient and non-proficient readers we found that:



- (1) Non-proficient readers produced significantly more miscues with high graphic similarity than the proficient readers.
- (2) The percentage of grammatically acceptable miscues produced by non-proficient readers was significantly lower than the percentage produced by proficient readers, thus, indicating that this may be a significant indicator of reading proficiency or variation in the use of this strategy among non-proficient and proficient readers (Y. Goodman, 1971).
- (3) The percentage of semantically acceptable miscues produced by non-proficient readers was significantly lower than the percentage produced by proficient readers, thus, indicating that this a significant indication of reading proficiency or variation in the use of this strategy among non-proficient and proficient readers (Y. Goodman, 1971).
- (4) The percentage of miscues which retained the meaning of the expected response was significantly higher for the proficient readers.
- (5) Proficient readers obtained significantly higher scores on comprehension than the non-proficient readers. This supports the contention that reading proficiency must be defined to gain meaning or readers ability to gain meaning or comprehend the material being read and not in terms of the quantity of miscues he/she produces.



- (6) Although the total number of miscues produced by proficient readers was less than the total produced by non-proficient readers the difference was not statistically significant. This re-emphasizes that the quantity of miscues a reader makes is not an indication of his/her ability to comprehend proficiency. Rather, the quality of the miscues is an important indicator.
- (7) There were no significant differences between proficient and non-proficient readers regarding the following RMI variables: dialect, intonation, grammatical function, sound similarity and self-correction. It was observed however that the non-proficient readers made more corrections, although this wasn't statistically significant, but that this behavior did not translate into higher comprehension scores.

In summarizing our findings we can conclude that the observed reading behavior of this specific group of native speakers reading in Spanish supports previous miscue research findings regarding English reading. We found no important differences in the oral reading behavior of subjects reading in Spanish, so that given this study we can state that it supports Goodman's hypothesis that "although grammatical patterns and rules operate differently in each language, readers will need to use their grammatical competence in

much the same way" (Frank Smith, 1973). He recognizes that some special reading strategies may result of the grammatical pattern but as Frank Smith states (1973).

"Listening and reading are processes in which the language user may sample, select and predict from the available signal. The essential characteristics of the reading process are universal".

In his article "Psycholinguistic Universals in the Reading Process", Kenneth Goodman discusses the receptive aspects of language and we consider this discussion important in order to understand what the reading process involves and the differences in use of reading strategies of non-proficient and proficient readers which was an additional concern in this study.

The receptive process does start with the phonological or graphic display as input, and it does end with meaning as output, but the efficient language user takes the most direct route and touches the fewest bases necessary to get to his goal. He accomplishes this by sampling, relying on the redundancy of language, and his knowledge of linguistic constraints. He predicts structures, tests them against the semantic context which he builds up from the situation and the on-going discourse and then confirms or disconfirms as he processes further language.

Receptive language processes are cycles of sampling, predicting, testing, and confirming. The language user relies on strategies which yield the most reliable prediction with minimum use of the information available.

Neither listening nor reading is a precise process and in fact, even what the language user perceives is only partly what he sees or

hears and partly what he expects to see or hear. This is necessarily so not only because of the prediction in which the language user engages but also because he has learned to organize his perceptions according to what is and is not significant in the language. The language user must not simply know what to pay attention to but what not to pay attention to.

This last statement indicates the major difference between the non-proficient and proficient reader. The proficient reader is more skilled in sampling from the material and relies more on the most significant cue systems. He/she uses more of his/her knowledge of language syntax (rules that govern it) and meaning and scans the graphic input selecting the minimal amount of visual cues necessary to predict and confirm what he/she expects to find. The proficient reader is more concerned with gaining meaning or comprehending than on being an efficient "word caller".

Given the confirmation of Goodman's hypothesis regarding the reading process and how it functions we find that these findings have implications in a series of areas concerning reading instruction.

Before we address these implications we would like to make some comments in relation to the use of RMI.

Given that the researcher is not specialized in the area of linguistics the use of the RMI was more appropriate than the Goodman Taxonomy as a research instrument although it was designed as a diagnostic tool for reading specialists. Even within the framework of its use by educators we found that the instrument was a valid alternative as a research

tool. We attempted to operationalize its use, specifically in two areas. One, we tried to develop some specific instructions to be used in the retelling format so that the retelling procedure could be replicated by other researchers who wish to replicate the results obtained. We also attempted to operationalize the procedures for obtaining comprehension scores, given that the major purpose of the study was to explore the relationship of this variable to the variables presented in the RMI. This procedure might be refined further to make the RMI a viable alternative in other studies.

We found that the procedures for determining the acceptability of syntactically and semantic miscues was acceptable. This was confirmed in the duplication of results in these categories by independent raters. However, this procedure might be developed further.

We expected to find some differences when analyzing miscues in some areas such as intonation. Although the results produced no significant differences which would relate this variable to comprehension we do find as observed throughout the analysis of the subjects' miscues that the intonation variable is more important for Spanish speakers reading in Spanish than English reading.

Regarding one of the three parts of intonation (stress, pitch and juncture) we found that the stress element within words plays an important part in Spanish, probably because of the use of accents in Spanish which affect the meaning of a



word. The grammatical-function of a word will tend to change more frequently in Spanish if the stress is changed.

Let's look at some examples:

Text: El progreso es bueno. (Progress is good).

If the reader says: "El progresó es bueno", the word progreso is changed from a noun to a verb (He progressed).

This example is quite common in Spanish were the placement of an accent or stress on a different syllable will change the meaning completely.

In other instances, even more common in Spanish, placing the stress on a different syllable will not change the grammatical function of the word but, as for example in the case of verbs, it will change the tense. Such as:

ando ----- andó  
(walk)            (walked)

busco ----- buscó

(search for or look)            (searched for or looked for)

Many frequent words in Spanish can produce changes if the reader is not proficient in the use of stress as for example:

Esta casa ----- está casá  
(this house)            (is married)

We observed that among the non-proficient readers the use of improper intonation, specifically stress, created difficulty in understanding the meaning of the material.



## Implications

Given that this study has found evidence to support previous studies in miscues research we see that the consideration of Goodman's psycholinguistic model of the reading process can be applied to reading instruction in Spanish.

As Hudelson López stated:

To maintain that Spanish speaking children use only their knowledge of letter sounds and syllable patterns when they read in Spanish oversimplifies the process.

We can state on the basis of our findings that Goodman's hypothesis in relation to how subjects process reading are applicable to reading in Spanish and although we will recommend further miscue research with Spanish readers we can see at this point some implications for reading instruction on the basis of this research attempt describing the oral reading behavior of Native speakers reading in Spanish.

### Implications for teacher training programs:

One of the most significant contributions made by Goodman and other researchers in miscue analysis has been the consideration of the readers as an important contributor to the reading process.

To view the beginning reader as a subject to be trained in the skills of reading without recognizing the wealth of knowledge that he or she brings to the process is to deny the most important element in reading instruction.

From our previous discussions regarding the active interplay of the reader and the printed material in previous chapters it must be understood that for reading to be considered as such there must be some degree of comprehension.

Those exposed at some point to a foreign language know that a person can be skilled in the production of the sounds of a language with no comprehension of what is being read. Even a proficient adult reader can be considered illiterate at some point for within the reading of our language we can recode the graphic symbols into phonic output with no comprehension of the material. So the first implication regarding reading instruction is that we cannot separate what the ultimate goal is in reading comprehension from the strategies we have planned in reading instruction.

Although this may seem quite obvious, many of us know that unfortunately we have viewed reading instruction as a series of skills which need be developed in the child so that he/she may produce or recode the graphic display into oral production. It is not surprising then that we find so many children who can call out words with perfect pronunciation and yet comprehend so little. As we discussed in the first chapter, the case is one of "blaming the victim".

Our own misunderstanding of what reading is has produced use of methods and materials in reading instruction which result in the low achievement of our learners. This too reflects on the type of training we as teachers have received

in our teacher training program. We must then reassess our competencies in terms of understanding reading as a process.

Of similar concern is the fact that teacher training programs have trained teachers in the use of materials and methods of reading instruction with little regard for the scientific evidence concerning their use. We have been mere implementators and have not been involved in the critical examination of methods construed by others. Have we questioned the rationale and data supporting the development of these methods and materials?

A significant contribution provided by this model is the critique of methods and materials on the basis of research findings. Teachers training programs cannot be disengaged from research in the field.

The use of methods and materials will be most effective when the teacher understands and has internalized their pros and cons in view of what reading is and is not. This critical view of our instructional methods, goals, objectives, and use of materials as well as our role as teachers cannot be accomplished if we as teachers of teacher trainers are incapable of the examination of all these elements in view of a clearly understood theoretical framework of the reading process. Any other alternative would be totally irrelevant. We've spent a great amount of time, effort and money trying to promote the superiority of one reading method over another.

It would be wiser to explore the principles which help us understand the reading process in order to train teachers who can then sample, predict, test, and confirm their knowledge of the reading process with his/her students and become active in the process as well.

We should in light of previous research findings continue to produce solid research which will challenge or support what has already been researched and develop new research directives in view of our findings.

Implication for reading teachers:

Many of the implications of Goodman's reading model will have to be analyzed and incorporated as topics to be re-examined in teacher training programs in the field of reading, but we would like to point out a series of implications for the classroom teacher in very precise terms, for the classroom teacher is the one in most direct contact with the child.

We have seen that there are children who will learn to read without regard for the method used in reading instruction, there are others who learn in spite of their teachers.

Goodman's reading model can help the classroom teacher in a number of valuable ways. Our first concern must be to recognize that in order to help the child in learning to read we must have an adequate understanding of what the goal of reading is and what factors come into play in this active process. By understanding how this process functions we will need to recognize that the child is an active participant in



the process and that by the time he/she enters school he/she brings with him the needed and necessary skills for learning to read. The reader is a language user who brings this knowledge to the reading situation.

In recognizing the strengths that the child brings we need to deal with the biases and prejudices that do exist when the teacher comes from a socio-economic (and thus educational) environment which is different from the child's. The child, a language user, brings to the reading situation all the necessary skills for successful learning. He/she has the control of the rules that govern language. Children can understand various dialects and speaking styles different from their own. What we do need to consider in reading instruction as well as in any other aspect of teaching is that the child is an individual with specific strengths and weaknesses. As teachers, our role is to diagnose these strengths and weaknesses in order to provide the specific needed strategies to enhance and develop the child's ability.

In reading instruction an important principle that needs to be transmitted to the learner is that reading is supposed to sound like language and that throughout the process our goal is to understand a message encoded in the graphic display. By understanding this the child will approach the reading task as one to be enjoyed and attempt to understand what the writer is trying to communicate. However, this cannot be accomplished if we do not use methods and materials which are



consistent with this principle. This doesn't mean that a psycholinguistic method of teaching reading exists, rather that the psycholinguistic principles involved in the reading process give us an indication of what strategies will facilitate the process and which ones will hinder it.

There are a series of classroom practices which are quite common, that given our knowledge of the reading process, must be questioned.

Many reading programs are based on phonics which teaches children to associate sounds with the letters. The use of phonics as a reading method is clearly inappropriate because reading is not merely the sounding out of sounds. There are many reasons for not regarding phonics as a viable teaching method but the most important one is the recognition that even if all children could sound out letters with perfection this alone would not constitute reading and it disregards the most important strategies involved in learning to read.

The word recognition approach based on the recognition of words by sight utilizes controlled vocabulary in basal readers which children are taught to recognize by sight. This method, as the phonics method, does not recognize that children have internalized responses to systems of language cues which are not being exploited in the reading instruction.

Sometimes children are taught new vocabulary by reading words from a list where context is non-existent. In this word recognition method words are presented out of context and the

child cannot use his/her knowledge of language to sample, predict, and confirm meaning. In the use of vocabulary lists the child can only use the cue systems within words to determine the word.

Every language is rule governed and has a limited number of common patterns by which the elements in an utterance may be arranged. There are cue systems in the flow of language such as intonation, juncture, etc. which help the reader determine the meaning of what is being read.

We have stated previously that language is redundant and that by sampling the least amount of cues available the reader makes choices and predicts in reading. He/she uses the redundant cues of language to confirm his/her predictions. All the cue systems in language are used in this process. However, if what we provide in reading instruction as reading material eliminates some of these cue systems we are making the task of reading very difficult. As we have seen in the use of word recognition methods the reader cannot use his/her knowledge of the flow of language, grammatical structure or contextual clues to sample, predict and confirm his/her responses. This is why an understanding of the elements which come into play in the reading process and how it functions must be considered before we make adequate selection of activities and materials to be used in reading instruction.

Reading can only be learned by reading.

There are cues within the reader which also play an important part in reading success. Goodman has indicated that "language carries the message from the writer, but it must be re-created by the reader out of raw materials within himself. Communication depends on a common language" (Goodman, 1973).

Of the cue system within the reader one must consider, among several others, the experiential background of the reader. Children have the capacity to understand in reading a variety of styles which are not necessarily the same as their own. Yet, reading instruction can be facilitated by providing materials which are relevant to the subjects experiential background so that context clues will be significant and in the beginning stages the teachers can provide materials which have the same style as that of the child's oral language. This can be achieved by the use of a language experience approach in the early stages of reading instruction in addition to the use of other methods to develop specific skills.

Another common practice in reading instruction is that we do not allow children to make mistakes when reading or we tend to prompt with the correct response. When we study how reading is processed we find that children will use their knowledge of the constraints of language, the redundant cues, the visual display and the contextual cues available to sample, predict and confirm. When the child produces a miscue which does not "sound right" or "makes sense" he/she will tend to

self-correct if he/she has not been trained not to. Self-correction behavior is necessary and it should not be hindered. Children must feel confident that they can predict to make use of what they already know. They must feel that making miscues is a natural and necessary part of the reading process. If not, they will not take risks for fear of re-praisal and will read word by word. Their concern will be on perfect oral production of the graphic display (recoding) instead of trying to decode or determine the meaning encoded in the graphic display.

We have seen that the proficient reader is more concerned with meaning than the non-proficient reader and that the former's use of reading strategies places more importance on the syntactic and semantic cues rather than the grapho/phonic ones.

Goodman's theoretical model has implication for the teachers' function in reading instruction.

When learning to speak a child develops his own set of rules of language. He/she tests out this set of rules with those of adults. Many people have mistakenly believed that the child learns through imitation. It has been established, however, that this is not the case. The child develops his/her own set of rules which he/she tests against those of the adult. The adult then, is used to check out the child's ability in producing the language structures that are observed in adult speech.



In this same manner the teacher provides an additional means for confirming the child's predictions in reading so that, the teacher becomes an aide in the acquisition of appropriate strategies for deriving meaning. The teacher is instrumental in reading instruction if he/she is knowledgeable in how the reading process functions and can give the learner the tools necessary at any given time to enhance his/her learning process. This is when the critical use of reading methods, strategies and materials is useful. But no method of reading instruction can be sound or fully successful if it is not based on an understanding of the psycholinguistic process of reading.

#### Implications for bilingual education:

If we agree that the learner brings to the reading situation all his/her knowledge as a language user then we must agree that learning to read in a second language can begin only when the learner has developed receptive oral proficiency in that second language.

To impose reading in a second language on a child before he/she has developed oral competencies in that language is to deny the psycholinguistic nature of the reading process.

Additional considerations must be taken into account, specifically in the selection of materials for we have previously stated that one of the cue systems used by the reader is his/her experiential background which will allow the successful use of contextual cues and produce greater proficiency in comprehension.



Recommendations for further research:

Based on the results of this study we would recommend that:

- (1) A study be conducted to analyze specifically the self-correction behavior of native speakers reading in Spanish since the data observed here did not warrant making conclusions. Other studies using miscue analysis have indicated trends and patterns which we were unable to find.
- (2) A study be designed to look at intonation miscues, specifically variations in stress to see the importance of this variable in the language patterns observed in Spanish. Findings in this area could have direct repercussions on specific reading strategies which could be developed for Spanish-readers.
- (3) A study be designed with a group of proficient readers using a limited number of stories where the level of difficulty could be established more clearly to see if the use of reading strategies, as for example, reliance on one cue system or another, varies as the difficulty of the story increases.

APPENDIX

## APPENDIX A

Selecting and Preparing Material for Taping.

The reading material to be used may be taken from either a trade book or textbook. If the selection is a story, there should be a discernible plot and theme. If an information-base selection is used, the concepts from the field of study involved (social studies, biology, mathematics, etc.) should be clearly stated and not overly complex.

The selection must be entirely new to the student—something which he has never seen before. All familiar tales which the child knows in some oral version or as a listener should be excluded from use.

While the selection itself must be new, it should incorporate concepts and situations which the reader can comprehend. He should have information available from his past experiences which will support his handling of the new information he will encounter in the reading material.

The length of the selections should be such that they may be read in their entirety within fifteen to twenty minutes. Primary school teachers might need to have the student read a series of two or three related stories so that the total reading will be of sufficient length. Upper grade teachers will need to search for selections four to eight pages in length. It is important that the student read an entire selection even if, later, only a portion of the miscues are coded and analyzed.

The selection must be difficult enough for the student so that reading miscues will be made, but not so difficult that he will be unable to continue independently. It is helpful to have two or three selections of different difficulty levels available for use. A good rule of thumb is to choose the initial selection from material one grade level above that which is usually assigned the student in class.

The teacher should be quick to change selections if too few miscues are being made. A selection must generate a minimum of twenty-five miscues in order to be used. Under no circumstances is the reading to be stopped only because the student makes a large number of miscues. If the reader becomes extremely agitated--squirms uncomfortably in his chair, breathes heavily while reading, repeatedly asks to stop, mumbles unintelligibly as he reads, fails to respond to assurances from the teacher--then the selection should be changed.

The student will read from the printed text during the session. The use of the original material ensures that no reading difficulty will be introduced into the session because of blurred or partially eradicated print. The teacher, however, will need a specially prepared copy of the selection. This "worksheet copy" serves several purposes. Like any other copy of the selection, it allows the teacher to read along with the student and be in control of the general progress of the session. In addition, it is used to record, on-the-spot,

the reader's miscues and any non-verbal behavior that will not be evident on the audio tape. At the same time it enables the teacher to review the selection in preparation for the student's retelling.

The speed of the reader and the multiplicity of the tasks the teacher is performing prevent the worksheet margins made during the reading session from being complete or totally accurate. Nonetheless, these first-hand impressions often aid in arriving at decisions on uncertain situations.

In addition to the uses to which it is put during the taping session, the worksheet copy becomes the permanent record of the student's reading miscues. It is this record which the teacher uses in answering the nine inventory questions. The worksheet must retain the physical characteristics of the book from which the student reads and, therefore, should be prepared in light of the following four restrictions. (1) The exact length of line of the original material must be retained. The worksheet is a line-for-line copy. (2) The worksheet copy uses a one-column format regardless of the format of the original selection. The last line of one page is separated from the first line of the subsequent page by a solid horizontal line on the worksheet copy. In the original selection was printed in two columns, a dotted horizontal line is used to separate the last line of one column from the first line of the subsequent column (of the same page) on the worksheet copy. (3) There must be sufficient space



between the lines of text so that all miscues can be clearly noted. (4) The worksheet must be entirely accurate. It must retain the spelling, punctuation, and capitalization of the original.

For extended use, it is best to begin to build a stock of readings that will be used only with the RMI, and to prepare duplicated worksheets to accompany them. If a selection is used repeatedly it makes two additional forms of evaluation readily available to the teacher. It becomes possible to compare the readings of the same child or of different children on the same material. And material can be analyzed in light of miscues of several readers.

For such repeatedly used materials, an optional system providing quick reference to specific lines and pages is available. A four-place number is used. The first two digits identify the page; the second two, the line of print. Note the following example:

| <u>Page</u> | <u>Line</u> |                                  |
|-------------|-------------|----------------------------------|
| 01          | 01          | As far as I know there has never |
| 01          | 01          | been a rule against pets in a    |
| 01          | 03          | space station We had just never  |
| 01          | 04          | had any pets until Sven.         |

## REFERENCES

## REFERENCES

- Allen, P.D. A psycholinguistic analysis of the substitution of miscues of selected oral readers in grades two, four and six and the relationships of these miscues to the reading process: A descriptive study. Unpublished doctoral dissertation, Wayne State University, 1969.
- Buck, C. Miscues of Non-Native Speakers of English in Miscues Analysis: Application to Reading Instruction (K. Goodman, ed.), ERIC, Illinois, 1973.
- Burke, C.L. A psycholinguistic description of grammatical restructurings in the oral reading of a selected group of middle school children. Unpublished doctoral dissertation, 1969.
- Carlson, K.L. A psycholinguistic description of selected fourth grade children reading a variety of contextual material. Unpublished doctoral dissertation, Wayne State University, 1970.
- Curriculum Division, Region One Education Service Center. In Hudelson López, S. "Children's use of contextual clues in reading Spanish". Reading Teacher, April, 1977, 735-739.
- Fairbanks (1937) in Weber, R. "The study of oral reading errors: A survey of the literature". Reading Research Quarterly, 1968, 9, 96-119.
- Goodman, K.S. "A linguistic study of cues and miscues in reading". Elementary English, 1965, 42, 639-643.
- Goodman, K.S. "Reading: A psycholinguistic guessing game". Journal of the Reading Specialist, 1967, 6, 126-135.
- Goodman, K.S. "Analysis of oral rading miscues: Applied psycholinguistics". Reading Research Quarterly, 1969, 5 (1), 9-30.
- Goodman, K.S. and Burke, C.L. Study of children's behavior while reading orally. (U.S.O.E. Final Report, Project No. S4250 Contract No. OE-6-10-136. Washington, D.C., U.S. Department of Health, Education and Welfare, March, 1968.

- Goodman, K.S. and Burke, C.L. A study of oral reading miscues that result in grammatical re-transformations. (U.S.O.E. Final Report, Project No. 7-E-219) Contract No. OEG-0-070219-2806(010). Washington, D. C., U. S. Department of Health, Education, and Welfare, June 1969.
- Goodman, K.S. and Burke, C.L. "When a child reads: A psycholinguistic analysis", Elementary English, 1970, 47 (1), 121-129.
- Goodman, K.S. and Burke, C.L. Theoretically based studies of patterns of miscues in oral reading performance. (U.S.O.E. Project No. 90375) Washington, D.C., U. S. Department of Health, Education, and Welfare, March, 1973.
- Goodman, Y.M. A psycholinguistic description of observed oral reading phenomena in selected young beginning readers. Unpublished doctoral dissertation, Wayne State University, 1967.
- Goodman, Y.M. Longitudinal, study of children's oral reading behavior. (U.S.O.E. Final Report, Project No. 9-E-062) Grant No. OEG-5-9-325062-0046. Washington, D.C., U.S. Department of Health, Education, and Welfare, September, 1971.
- Goodman, Y.M. Reading diagnosis: "Qualitative or quantitative". Reading Teacher, 1972, 26 (1), 32-37.
- Goodman, Y.M. and Burke, C.L. Reading Miscue Inventory: Procedure for Diagnosis and Evaluation. New York: Macmillan, 1972.
- Goodman, Y., Martelloch H., Burke, C.L. and Allen, P.D. Applications of Psycholinguistics to key problems in reading. Symposium held by the International Reading Association. Kansas, April, 1969.
- Gutknecht, B. A psycholinguistic analysis of the oral reading behavior of selected children identified as perceptually handicapped. Unpublished doctoral dissertation, Wayne State University, 1971.
- Hudelson López, S. "Children's use of contextual clues in reading Spanish", Reading Teacher, April 1977, 735-739.
- Hutchinson, T. "Methodology for the Generation of Knowledge", Unpublished paper, Amherst, Massachusetts, 1974.

- Jensen, L.J. A psycholinguistic analysis of the oral reading behavior of selected proficient, average and weak readers reading the same material. Unpublished doctoral dissertation, Michigan State University, 1972.
- Kolers, P.A. "Three stages of reading" in Smith F. Psycholinguistics and Reading. New York: Holt, Rinehart and Winston, 1973.
- Mackennon, A.R. How do Children Learn to Read? Vancouver: Copp. Clark, 1959.
- Menosky, D.M. A psycholinguistic description of oral reading miscues generated during the reading of varying portions of a text by selected readers from grades two, four, six and eight. Unpublished doctoral dissertation, Wayne State University, 1971.
- Miller, G.A. "Some preliminaries to psycholinguistics", American Psychologist, 1965 (20), 15-20.
- Nurss, J.R. "Oral reading errors and reading comprehension", Reading Teacher, 22, (March, 1969), 523-527.
- Payne, C.S. "The classification of errors in oral reading", Elementary School Teacher, 1930, 31, 142-146.
- Rousch, P.D. A psycholinguistic investigation into the relationship between prior conceptual knowledge, oral reading miscues, silent reading, and post-reading performance. Unpublished doctoral dissertation, Wayne State University, 1972.
- Ryan, W. Blaming the Victim, 2nd. ed. Vintage Bks., 1972.
- Sims, R. A psycholinguistic description of miscues generated by selected young readers during oral reading of text materials in black dialect and standard English. Unpublished doctoral dissertation, Wayne State University, 1972.
- Spache, G.D. Reading in the Elementary School. Boston, Allyn and Bacon, 1964.
- Swanson and Fairbanks In Weber, "The study of oral reading errors: A survey of the literature". Reading Research Quarterly, 1968, 9, 96-119.



Watson, D. A psycholinguistic description of the oral reading miscues generated by selected prior to and following exposure to a saturated book program. Unpublished doctoral dissertation, Wayne State University, 1973.

Weber, R. The study of oral reading errors: A survey of the literature. Reading Research Quarterly, 1968, 9, 96-119.

BIBLIOGRAPHY

## BIBLIOGRAPHY

- Allen, P.D. A psycholinguistic analysis of the substitution of miscues of selected oral readers in grades two, four and six and the relationships of the miscues to the reading process: A descriptive study. Unpublished doctoral dissertation, Wayne State University, 1969.
- Allen, P.D. "Cue systems available during the reading process". Elementary School Journal, 1972, 72 (5), 258-264.
- Allen, P.D., Burke, C.L., Goodman, Y.M. and Martellock, H. Applications of psycholinguistics to key problems in reading. Paper presented at Symposium II, International Reading Association, Kansas City, 1969.
- Brody, D.P. A psycholinguistic comparison of oral reading behavior of proficient & remedial readers. Master's Thesis, Rutgers University, N.G., 1973.
- Buck, C. "Miscues of non-native speakers of English". In K.S. Goodman (Ed.) Miscue Analysis: Applications to Reading Instruction: Urbana, Ill.: ERIC, 1973.
- Burke, C.L. A psycholinguistic description of grammatical restructurings in the oral reading of a selected group of middle school children. Unpublished doctoral dissertation, Wayne State University, 1969.
- Butler, L.G. A psycholinguistic analysis of the oral reading behavior of selected impulsive and reflective second grade boys. Paper presented Annual Meeting International Reading Association. New Orleans, Louisiana, 1974.
- Carlson, K.L. A psycholinguistic description of selected fourth grade children reading a variety of contextual materials. Unpublished doctoral dissertation, Wayne State University, 1970.
- Clay, M.M. "A syntactic analysis of reading errors", Journal of Verbal Learning and Verbal Behavior, 7 (1968): 434-438.
- Gibson, E.J. and Levin, H. The Psychology of Reading. Cambridge, Massachusetts: MIT Press, 1975.

- Goodman, K.S. "A linguistic study of cues and miscues in reading". Elementary English, 1965a, 42, 639-643.
- Goodman, K.S. "Dialect barriers to reading comprehension". Elementary English, 1965b, 42, 853-860.
- Goodman, K.S. "Reading: A psycholinguistic guessing game". Journal of the Reading Specialist, 1967, 6, 126-135.
- Goodman, K.S. "The psycholinguistic nature of the reading process", in K. Goodman (Ed.) The Psycholinguistic Nature of the Reading Process. Detroit: Wayne State Press, 1968.
- Goodman, K.S. "Analysis of oral reading miscues: Applied psycholinguistics". Reading Research Quarterly, 1969, 5 (1), 9-30.
- Goodman, K.S. "Behind the eye: What happens in reading". In K. Goodman and O. Niles (Eds.) Reading: Process and Programs. Urbana, Ill.: National Council of Teachers of English, 1970.
- Goodman, K.S. "Reading: The key is in children language". The Reading Teacher, 1972, 25, 505-508.
- Goodman, K.S. "Oral Language Miscues". Viewpoints, 1972, 48, 1, 13-28.
- Goodman, K.S. and Burke, C.L. Study of children's behavior while reading orally. (U.S.O.E. Final Report, Project No. S425) Contract No. OE-6-10-136. Washington, D.C., U.S. Department of Health Education and Welfare, March, 1968.
- Goodman, K.S. and Burke, C.L. A study of oral reading miscues that result in grammatical re-transformations. (U.S. O.E. Final Report, Project No. 7-E-219) Contract No. OEG-0-8-070219-2806 (010). Washington, D.C., U.S. Department of Health, Education and Welfare, June, 1969.
- Goodman, K.S. and Burke, C.L. "When a child reads: A psycholinguistic analysis". Elementary English, 1970, 47 (1), 121-129.
- Goodman, K.S. and Burke, C.L. Theoretically based studies of patterns of miscues in oral reading performance. (U.S.O.E. Project No. 90375) Grant No. OEG-0-9-320375-4269. Washington, D.C., U.S. Health, Education and Welfare, March, 1973.

- Goodman, Y.M. A psycholinguistic description of observed oral reading phenomena in selected young beginning readers. Unpublished doctoral dissertation, Wayne State University, 1967.
- Goodman, Y.M. "Using children's reading miscues for new teaching strategies". The Reading Teacher, 1970, 23, (5), 455-459.
- Goodman, Y.M. Longitudinal study of children's oral reading behavior. (U.S.O.E. Final Report Project No. 9-E-062). Grant No. OEG-5-9-325062-0046. Washington, D.C., U.S. Department of Health, Education and Welfare, September, 1971.
- Goodman, Y.M. "Reading diagnosis: Qualitative or quantitative", Reading Teacher, 1972, 26 (1), 32-37.
- Goodman, Y.M. and Burke, C.L. "Do they read what they speak?" Grade Teacher, 1969, 26 (7), 144-150.
- Goodman, Y.M. and Burke, C.L. Reading Miscue Inventory: Procedure for Diagnosis and Evaluation. New York: Macmillan, 1972.
- Goodman, Y.M. and Goodman, K.S. "Linguistics, psycholinguistics, and the teaching of reading". Newark, Del.: International Reading Association, 1971.
- Goodman, Y., Martellock, H., Burke, C.L. and Allen, P.D. Applications of psycholinguistics to key problems in reading. Symposium held by the International Reading Association. Kansas, April, 1969.
- Gutnecht, B. A psycholinguistic analysis of the oral reading behavior of selected children identified as perceptually handicapped. Unpublished dissertation, Wayne State University, 1971.
- Hood, J. and Kendall, J.R. "A qualitative analysis of oral reading miscues of reflective and impulsive second graders: A follow - up study". Paper presented at Annual Meeting American Education Research Association, 59<sup>th</sup>, Chicago, April, 1974.
- Hudelson López, S. "Children's use of contextual clues in reading Spanish", Reading Teacher, April, 1977, 735-739.
- Hutchinson, T. "Methodology for the Generation of Knowledge", Unpublished paper, Amherst, Massachusetts, 1974.



- Hutson, B.A. and Niles, J. "Parallel analysis of oral language and reading miscues". Paper presented at the National Reading Conference, Texas, 1973.
- Jensen, L.J. A psycholinguistic analysis of the oral reading behavior of selected proficient, average and weak readers reading the same material. Unpublished doctoral dissertation, Michigan State University, 1972.
- Mackinnon, A.R. How do Children Learn to Read? Vancouver Copp. Clark, 1959.
- Menosky, D.M. A psycholinguistic description of oral reading miscues generated during the reading of varying portions of a text by selected readers from grades two, four, six and eight. Unpublished doctoral dissertation, Wayne State University, 1971.
- Menosky, D. and Goodman, K.S. "Unlocking the Program", Instructor, Vol. 80, No. 7, March, 1971, 44-46.
- Miller, G.A. "Some Preliminaries to psycholinguistics", American Psychologist, 1965, (20), 15-20.
- Nurss, J. "Oral reading errors and comprehension", The Reading Teacher, 22, 1967.
- Page, W. A psycholinguistic description of patterns of miscues generated by a proficient reader in second grade, an average reader in fourth grade and an average reader in sixth grade encountering basal reader selections ranging from pre-primer to sixth grade. Unpublished doctoral dissertation, Wayne State University, 1970.
- Page, W. "A linguistic appraisal of isolated word recognition listing". The Michigan Reading Journal, 1971, 5 (2), 28-35.
- Payne, C.S. "The classification of errors in oral reading". Elementary School Teacher, 1930, 31, 142-146.
- Romatowski, J. A psycholinguistic description of miscues generated by selected bilingual subjects during the oral reading of instructional reading material presented in Polish readers and in English basal readers. Unpublished doctoral dissertation, Wayne State University, 1972.

- Rousch, P.D. A psycholinguistic investigation into the relationship between prior conceptual knowledge, oral reading miscues, silent reading, and post-reading performance. Unpublished doctoral dissertation, Wayne State University, 1972.
- Ryan, W. Blaming the Victim. 2nd ed., Vintage Bks., 1972.
- Sims, R. A psycholinguistic description of miscues generated by selected young readers during the oral reading of text materials in black dialect and standard English. Unpublished doctoral dissertation, Wayne State University, 1972.
- Smith, E.B., Goodman, K.S. and Meredith, R. Language and Thinking in the Elementary School: Curriculum and Teaching to Develop Childrens Symbolic Process. New Yerk: Holt, Rinehart and Winston, 1970.
- Smith, F. "Understanding Reading: A Psycholinguistic Analysis of Reading and Learning to Read". New York: Holt, Rinehart and Winston, 1971.
- Smith, F. Psycholinguistics and Reading. New York: Holt, Rinehart and Winston, 1973.
- Smith, F. "The role of prediction in reading" Elementary English, 1975, 52, (3), 305-311.
- Smith, F. and Goodman, K.S. "On the psycholinguistics of teaching reading". Elementary School Journal, 71, (4), 177-181, 1971.
- Spache, G.D. Reading in the Elementary School. Boston, Allyn and Bacon, 1964.
- Thorton, M. A psycholinguistic description of purposive oral reading and its effects on comprehension for subjects with different reading backgrounds. Unpublished doctoral dissertation, Wayne State University, 1973.
- Watson, D. A psycholinguistic description of the oral reading miscues generated by selected readers prior to and following exposure to a saturated book program. Unpublished doctoral dissertation, Wayne State University, 1973.
- Weber, R. "The study of oral reading errors: A survey of the literature". Reading Research Quarterly, 1968, 9, 96-119.

