A study ascertained the degree of relationships between scores on each of various reading subskills and overall reading success. Reading subskills were measured by locally developed reading skills tests. Overall reading success was measured by the reading subtest of the Iowa Tests of Basic Skills (ITBS). In each of three southern Indiana school districts, task forces of teachers had designed and constructed a series of reading skills for each of several grade levels. In school 1, 501 students were tested in grades 1-6; 189 students were tested in grades 1-6, 8, and 10 in school 2; and in the third school, 89 students were tested in grades 3, 5, and 8. The tests had been field tested and revised. All tests had reliabilities above 0.91. Tests averaged 20 skills per grade level. There were 6 test items per skill for the first group tested and 10 items per skill for the second and third groups tested. Tests were administered to a total of 758 students at the three sites. Results of the subskills tests were compared to the scores of the ITBS. Multiple regression analysis was performed to determine the amount of relationship between scores on local skills tests and overall reading effectiveness. Results indicated that: (1) phonics instruction in the primary grades did not correlate with reading comprehension; and (2) the use of context clues to determine word meaning was highly related to overall reading effectiveness. (RS)
CONTEXT CLUES:
The Most Important Factor
in Improving Reading Test Scores

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Abstract

The purpose of this study was to ascertain the degree of relationships between scores on each of various reading subskills and overall reading success. Reading subskills were measured by locally developed reading skills tests. Overall reading success was measured by the reading subtest of the Iowa Test of Basic Skills (ITBS).

This study necessitated finding three school districts with unique reading testing programs. In each of the three school districts, task forces of teachers had designed and constructed a series of reading skills tests for each of several grade levels. The tests had been field tested and revised prior to the studies. All tests had reliabilities above .91.

Tests averaged twenty skills per grade level. There were six test items per skill for the first group tested and ten items per skill for the second and third groups tested.

Tests were administered to a total of 758 students at the three skills. Results of the subskills tests were compared to the scores of the ITBS.

Multiple regression analysis was performed to determine the amount of relationship between scores on local skills tests and overall reading effectiveness. Significant relationships were determined and noted.

Results indicate:

1. Phonics instruction in the primary grades did not correlate with reading comprehension.

2. The use of context clues to determine word meaning was highly related to overall reading effectiveness.
Public concern regarding the quality of education has focused on the need for proficiency in the basic skills. This concern has been manifested in the back to the basics movement, declining SAT scores, the competency testing movement and the call for accountability in education.

Instruction in reading has focused around mastery of subskills such as recognition of vowel sounds and syllabification. Mastery of subskills purports to lead to the acquisition of more global skills such as word analysis and comprehension.

In recent years, much debate in the educational community has centered upon the relative merits and effectiveness of "holistic" versus "subskill" approaches to reading instruction (Vacca, 1980; Smith, Otto, & Hansen, 1978). Goodman (1967) suggests that reading is a psycholinguistic guessing game in which the reader makes partial use of available language cues to make tentative decisions. He feels that reading is not merely the sum of various decoding and comprehension skills, but rather is holistic in nature.

In an opposing view, Otto (1976) states that efficient reading instruction is focused through the use of objectives related to reading skills. He believes that "the successful acquisition of reading ability is heavily dependent on the acquisition of specific reading skills." Perhaps this issue is now best understood in the light of our nation's changing educational climate. How have the goals of reading instruction changed?

The subskills approach can be a beneficial approach for reading students because it organizes what is taught and facilitates the measurement of learner progress.
Teaching reading by the subskills approach has been criticized because it is said to restrict learning to trivial outcomes; foster rigidity; and ignore higher order goals. Some researchers (Vacca, 1980) cite evidence to show that reading cannot be broken down into subskills and therefore a holistic approach is advocated.

The rationale for this study is that if basic reading subskills are identified as having a strong relationship with overall reading ability, it may be advantageous to emphasize those components in reading instruction.

Correlational studies do not imply causation. Any of these explanations could explain a high degree of relationship between a specific subskill and reading ability.

1. The subskill is an integral and critical component of reading ability.
2. The test of the subskill measures the same factor as the test of overall reading ability. The factor may be reading comprehension.
3. The two measures may reflect the same abilities or experiences, including IQ, vocabulary or reading the child does at home.
4. The sharing of common factor variance may be accidental or due to chance.
METHOD

Subjects. The subjects for this study were 758 students in grades one through six, grade eight, and grade ten of three school districts in Southern Indiana. The school districts each had developed local reading skills testing programs and also administered the Iowa Test of Basic Skills (ITBS) to all students.

Materials. The materials used included 17 reading subtests. One subtest had been developed for each grade level tested. In school 1, 501 students were tested in grades 1 - 6. In school 2, 189 students were tested in grades 1 - 6, 8, and 10. In school 3, 89 students were tested in grades 3, 5, and 8.

The subskills test in Study 1 had six items for each skill assessed. In Studies 2 and 3, there were ten items for each skill. By example, a first grade test which measured 19 subskills contained 190 items. A total of 132 subskill tests were presented in the 17 subskill test instruments.

Procedure. For each grade level, subjects were administered the appropriate subskills test and the ITBS. Less than one month intervened between the administration of the two tests. The tests were scored and statistically analyzed for correlational significance between the ITBS and each of the individual subskills.

For each grade level at each school, a multiple regression analysis was performed to determine the degree of relationship between each of the subskill test scores and scores on the ITBS. Significant relationships were noted at the .05 and .01 levels.
RESULTS

Results of the correlational analysis are presented in the following tables. Only the subskills that were significantly related are reported.

From the results, it can be noted that the subskill "uses context clues" or "uses meanings and context clues" was highly related on eight of ten measures in which it was measured. Furthermore, this subskill ranked first on five of the comparisons.

It is also noteworthy that the subskills which measured students' ability to master phonics were not related to overall reading ability after grade one.
Grade 1

Study 1

[Uses context clues in word attack]
Rank #14 of 22
  Writes word for one syllable word
  Correctly uses capitals, periods and spacing when writing sentences
  Identifies three sounds of Y
  Identifies long and short vowels
  Understands and creates rhyming words
  Selects appropriate title for a story
  Associates diagraphs and blends with sounds

Study II

[Uses context clues in word attack]
Rank #1 of 19
  Draws conclusions from given facts
  Writes word for one syllable word
  Identifies short and long vowel sounds
  Selects an appropriate title for a story

Study III

No study
Grade 2

Study I

[Chooses from multiple meanings]
Rank # 1 of 24

Uses diphthongs in decoding

Study II

[Uses multiple meanings and context clues to decode]
Rank # 1 of 16

Uses phonograms in decoding
Identifies silent letter combinations and uses them in decoding
Identifies long and short vowels and vowel variants
Able to find main idea in a paragraph
Uses singular, plural, and possessive forms
Identifies word pairs with opposite, same or different meanings
Recognizes compound words
Uses blends, diagraphs, and diphthongs to decode
Able to sequence vowels
Recognized root word

Study III

No study
Grade 3

Study I
[Uses context clues for meaning of unknown words]
Rank # 3 of 18

Recalls main idea
Reads to obtain facts
Uses pronunciation key
Uses possessives

Study II

[Matches multiple meanings is in the list]
Rank # 16 of 19

Knows vowel diagraphs and irregular vowel patterns
Knows words for reading level

Study III
[Matches multiple meanings .05]
Rank #8 of 19

Alphabetizes to 3rd letter
Uses dictionary guide words
Comprehends material read aloud
Knows contractions
Predicts outcome
Identifies who/where/when
Recognizes/matches compounds
Follows written directions
Recalls main idea
States sequencing of events
Grade 4

Study I

[Meanings of unknown words (context clues)]
Rank # 6 of 18

- Meanings of unfamiliar words
- Deficits
- Fact and opinion
- Predict outcomes
- Vowel diagraphs
- Main ideas
- Multiple meaning of words

Study II

[Distinguishes between multiple meanings of words ]
Rank # 14 of 18

- Alphabetizes to the fourth letter
- Forms plurals
- Forms and devises compound words

Study III

No study
Grade 5

Study I

[Context clues not listed]

- Compares and contrasts
- Distinguishes between fact, fantasy, or opinion
- Recognizes an atlas, almanac, thesaurus, unabridged dictionary, and gazetteer as reference books
- Identifies cause and effect

Study II

[Context clues - multiple meanings not listed]

- Distinguishes between fact, fantasy, or opinion
- Identifies answers to question which coincide with assigned reading
- Identifies cause and effect
- Predicts outcome

Study III

[Context clues - multiple meanings not listed]

- Identifies main idea
- Short term recall
- Answers questions from reading
Grade 6

Study I

[Uses context clues to ascertain meaning]
Rank # 1 of 10

Recognizes fact from opinion

Study II

[Uses context clues to ascertain meaning]
Rank # 1 of 10

Study III

No study
Grade 8

Study I

No study

Study II

[Uses context clues to determine meaning]
Rank # 6 of 13
Names synonyms and antonyms for given words
Finds answers to specific questions in assigned readings
Recognizes misspelled words
Sequences events to five and identifies main idea
Uses dictionary guide to locate words

Study III

No study
Grade 10

Study I

No Study

Study II

[Context clues were not on list]

Outlines
Knows meaning of vocabulary words
Recognizes correct grammar usage
Recognizes complete sentences
Understands parts of sentences
Understands functions and identifies parts of speech

Study III

[Context clues were not on list]

Outlines
Knows meaning of words
Knows type of literature
Punctuates sentences
Uses card catalog
Uses footnotes
Uses reference materials
Knows literary terms
Knows parts of speech
Knows correct grammar usage
Knows type of literature
Capitalizes words
DISCUSSION

This study was designed to investigate subskills at each grade level and their relationship to overall reading success. Certain patterns are evident when the data is reviewed as a whole. "Context clues" were tested at grades 1, 2, 3, 4, 6, and 8. Each of these grade levels showed a significant positive correlation of greater than .481 between the context clues subskill test and the ITBS. The use of context clues subskills is positively correlated with success in reading.

As has been explained in this report, the reason for this relationship is, at present, unclear. Can reading ability be raised by concentrated instruction of context clues? There may be reasons to assume that this is true on the basis of what is known about context clues in reading.

1. In order to use context clues, the reader has to think about what is being read.
2. Some context clues are simple. The more sophisticated the clue, the better the reader has to be.
3. The use of context clues is dependent on the reader's background and experience.
4. Often writers assume that readers have backgrounds that they may not have.
5. Many people think that if you can identify a word you can read. To use context clues, you must comprehend.
6. You need not identify or even read every word to comprehend.
7. If reading is word identification, context clues may be unimportant.
8. The student is achieving the ultimate goal of reading when they are comprehending.
9. The use of context clues is not easily trainable.

The high degree of relationship between context clue mastery and reading ability is dramatic and unpredictable. Hopefully, evidence from some later investigation will show the nature of this relationship.
REFERENCES*


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