

**HISTORY READING COMPREHENSION IN BLACK
SECONDARY SCHOOLS : A CISKEI STUDY**

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CONTENTS

	Page
LIST OF FIGURES AND TABLES	(i)
ACKNOWLEDGEMENTS	(iii)
ABSTRACT	(iv)
CHAPTER ONE: INTRODUCTION	1
Statement of the problem	1
Scope of the study	3
CHAPTER TWO: BACKGROUND LITERATURE	5
Reading	6
Literal comprehension	12
Interpretation	12
Critical reading	12
Creative reading	13
Categorising	14
Completing analogies	14
Textbook analysis	16
Geography	16
History	16
Readability	18
The Smog grading	20
Gunning's Fox Index	21
The Flesch Formula	21
English as medium of instruction	25
CHAPTER THREE: METHODOLOGY	29
CHAPTER FOUR: QUANTITATIVE RESULTS	37
CHAPTER FIVE: QUALITATIVE RESULTS	54
CHAPTER SIX: CONCLUSION	68
Recommendations	71
APPENDIX I: Textbooks	75
II: Comprehension passage on slaves	85
III: Comprehension test on slaves	90
IV: Model answers to comprehension questions	93
V: Pilot study raw score results	95
BIBLIOGRAPHY	96

LIST OF FIGURES

			Page
Figure	2.1	The Grammar of a language	9
	2.2	Flesch's pattern of reading ease scores	23

LIST OF TABLES

Table	1.1	Reading difficulty index	22
	3.1	Summary table: difficulty level of the books	30
	3.2	Pupil distribution in the experiment	33
	4.1	Topics for analysis from the textbooks	38
	4.2	Difficulty levels of Std 8 textbooks	39
	4.3	Difficulty levels of Std 10 textbooks	39
	4.4	Difficulty level of the comprehension passage	40
	4.5	Variety of sentence types in the text passage	41
	4.6	Frequency table - raw score results - Std 8	42
	4.7	Frequency table - raw score results - Std 10	43
	4.8	'T' Test results - raw scores - all pupils	44
	4.9	'T' Test results - raw scores - differences between schools	45
	4.10	'T' Test results - Std 10	46
	4.11	'T' Test results - raw scores	47
	4.12	Mean percentage scores for literal and interpretative questions	49
	4.13	'T' Test results - percentage scores - all pupils - literal and interpretative scores	50

		Page
4.14	'T' Test results - percentage scores - literal and interpretative scores - difference between schools	51
5.1	Approximate frequency of errors in English scripts	57
5.2	Errors and comprehensibility - all pupils	59
5.3	Comprehension errors in interpretative questions in English - all pupils	60
5.4	Comprehension errors in question I3 - English pupils	61
5.5	Comprehension errors in interpretative questions in Xhosa - all pupils	65
5.6	Comprehension errors in question I3 - Xhosa pupils	66
5.7	Comprehension errors in interpretative questions in English and Xhosa - all pupils	67

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ABSTRACT

This thesis examines briefly the problems of learning and understanding history when the subject is taught through the medium of a second language. It assesses the difficulty levels (for first language speakers) of the history textbooks commonly used in Ciskei secondary schools and considers the implications of these levels for second language speakers. It assesses the ability of 400 pupils in standard 8 and standard 10 to comprehend an English text which is deliberately written at a lower level of difficulty than that of the current secondary school texts.

Comparisons are made of the comprehension scores of those pupils whose answers are written in English with those who are allowed to answer in Xhosa on questions based on the simple text. Finally, it compares the quality of the pupils' answers in Xhosa and English. Tentative recommendations are made about the language implications of history teaching which emerge from the results of the research.

CHAPTER ONE

INTRODUCTION

1.1 STATEMENT OF THE PROBLEM

In her experience as a history teacher the researcher has realised that there is a crisis in the teaching of history in Ciskeian secondary schools. Teachers are frustrated because their efforts towards effective teaching of the subject do not seem to bear fruit. Pupils seem to have a problem with the concepts and terminology used in the history textbooks. This results in a lack of insight into the subject matter. They fail to interpret the questions or to understand what is really expected of them in the examinations. They also fail to express their ideas in English, which is a second language to them. This has resulted in the pupils' reluctance to participate in the history class and often in a negative and indifferent attitude towards the subject.

In standards 9 and 10 some differentiation is introduced in the form of higher and standard grades. This arrangement takes into consideration the pupils' ability and performance in the previous classes. In the higher grade, pupils are expected to show higher intellectual skills and understanding of the topics they discuss. To achieve this the pupils must also have a good command of the language in which the subject matter is presented. This means that many pupils choose to write the subject in the standard grade where they are expected to function at a lower level of knowledge and where no detailed or deep insight and interpretation is expected. But even at this level, the pupils' abilities to read and comprehend a text result in a poor level of performance.

At the junior secondary school level pupils have difficulty in writing a single paragraph without the assistance of the teacher. The situation is worse at the standard 8 level, where they are expected to express their facts in three or more paragraphs. Burston et al. (1972, p. 43) state that history is not the sort of subject that can be demonstrated readily in the classroom. Essentially, it involves an imaginative reconstruction of the past, employing abstractions and universal classifications. Linguistically, therefore, it is likely to be particularly

problematic for school pupils. The evidence suggests that all young pupils are likely to face difficulties in attaching the current referents to words. Inevitably, such problems are more acute in the case of pupils who learn history through the medium of a second language.

It is a fact that many black parents believe that English rather than a mother tongue is a better medium of instruction for their children. All the black national states' governments have opted for English as a medium of instruction from standard 3 up to senior certificate. The use of English is justified on the grounds of its international status and that it is also the lingua franca of all the people in Southern Africa. Even ATASA, a black teachers organisation in the Republic of South Africa, in their memorandum quoted in Mawasha (1976, p. 73) recommended the use of English as a medium of instruction in black schools.

While these recommendations may be reasonably justified, it has to be borne in mind that they could place a heavy burden on a second language learner. The black child does not enjoy the same opportunities of early contact with the language and literature of English. He also does not have recourse to widely different material written in English. This limits the pupils' chances of high quality work. For pupils with limited contact with English, the teacher must do much of the interpretation. If this is done through duplicated notes, these are often the only regularly used sources in the classroom. Duminy (1967, p. 142) asserts that when a black child is confronted with strange facts in a strange language it is hardly surprising that downright memorization, very often without insight, remains the only way out.

There is also the problem of the textbooks. History textbooks used in black schools are not written with second language pupils in view. Their phrasing and terminology sometimes becomes very technical. The presentation of facts is sometimes too dense. Paragraphs are too long, as are many of the compound and complex sentences. The texts have to be read again and again before the pupils can extract the gist of the meaning. Commenting on the textbooks, the Commission of Inquiry into education in the Republic of Transkei (1979) stated that there is very little attempt to control the language used in the textbooks, or to relate the vocabulary and sentence structure to the levels of the pupils for whom the books are intended. This seems to be the case even now.

There is also the problem of the teachers who are themselves often limited in their use of the language. In the process they enforce, or reinforce, non-standard forms of English and, possibly, erroneous interpretations of the subject matter.. The policy of apartheid meant that white teachers could find it impossible to teach in black schools. So the teaching of English is left in the hands of black teachers. The type of teacher training the black teachers receive does not equip them with the skills for the difficult task of teaching through a second language medium. In the classroom situation they often use methods which do not encourage the pupils to learn the language.

In the secondary school, examinations and tests are written in the medium of instruction, which is English. The difficulty of generating material in the second language is likely to be greater than that of comprehending it. This can lead to poor examination results in papers where a large proportion of marks come from essay questions. The Ciskeian schools lack supplementary resources and reading materials and this could also contribute to limited comprehension of a single resource, normally the textbook.

1.2 SCOPE OF THE STUDY

This research was undertaken to examine the problems of learning and reflecting understanding of history when it is taught through the medium of a second language. Although there are numerous reasons for the poor performance of pupils in history examinations, the researcher felt that the use of a second language as a medium of instruction could be the main problem for a pupil who is already burdened with a history content which is foreign and irrelevant to him.

This study assesses the difficulty levels (for first language speakers) of the history textbooks commonly used in the Ciskei secondary schools. The implications of these levels for second language speakers will be considered. Four textbooks in standard 10 and two in standard 8 are assessed.

There are various angles from which an analysis of the textbooks can be made. For instance, they could be analysed for bias and prejudice, or in respect of their methods and styles of concept presentation and language

complexity. For the purpose of this study, textbooks are analysed from the point of view of their readability for second language learners. Although there could be numerous reasons for the pupils' poor performance in history, like lack of motivation, incorrect methods of teaching and lack of teaching aids, the researcher felt that the difficulty level of the textbooks for second language learners could also be a major contributory factor.

The research also assessed the pupils' ability to comprehend an English text which is deliberately written at a lower level of difficulty than that of the current secondary school texts. The comprehension scores of those pupils whose answers are written in English and those who answered in Xhosa are compared, as well as the quality of these answers. The quantitative analysis of the results are largely based on the 't' tests. The qualitative analysis of the pupils' responses will look at the complexity or sophistication of the ideas expressed by the pupils.

The second chapter is concerned with a brief survey of theories and research about reading and comprehension problems of second language readers. The third chapter describes the methodology used in the study. The fourth and fifth chapters present the results. The final chapter summarises the work and makes some recommendations.

CHAPTER TWO

BACKGROUND LITERATURE

When considering the purpose of this thesis, and the direction in which it develops, it is clear that a full survey and assessment of English second language and the more particular problems which arise when English is used as a second language medium of instruction, is not possible within the limits of a half-thesis at the Masters level. This thesis is concerned with the abilities of black senior secondary pupils in reading and comprehending a history text written in English. The comprehension passage was deliberately set at a lower level of difficulty than that used in the pupils' class textbooks. The thesis also asks the question - would the pupils perform better if they were allowed to answer the questions in their mother tongue (Xhosa) or if they continued to use the language in which the passage is written - English?

In this chapter, therefore, the assessment of other theories and research about English second language teaching and learning will concentrate upon reading in a second language and different levels of comprehension which the pupils must display. It will also look particularly at the strengths and weaknesses of measures of reading difficulty. Finally, it will present a brief account of the use of mother tongue and second language as mediums of instruction in South African black schools.

Various theories and approaches to second language reading and learning have been expounded. Allen (1965, p. 4) claims that when the phrase "English as a second language" is used, the reference is usually to situations where English becomes the language of instruction in the schools or a lingua franca between speakers of widely diverse languages. In that case it should not only be viewed as a common basis for communication, but as a window to the outside world as well.

Broughton et al. (1978, p. 6) state that in a second language situation, English is the language of the mass media: newspapers, radio, television, etc. It is the language of official instructions and of education. It is also the language of

commercial and industrial organisations. Clearly, therefore, a good command of English is the passport to social and economic advancement.

Arora and Duncan (1986, p. 101) assert that the teaching of English as a second language in schools has had a history of conflicting arguments and interesting innovations. Until quite recently approaches to English second language work have been influenced by methods to teach English as a foreign language to older learners. These methods placed much emphasis on drills, exercises and remedial programmes that focus on language in abstraction. The prescriptive nature of such methods and the demands they made on the teachers' time fostered the belief that English second language could be tackled only by the specialist teachers working through small groups of children.

However, this approach does not fit comfortably into the current notions of learning and teaching in the primary school, nor does it sufficiently equip English second language learners in the secondary school so as to allow them to benefit from normal schooling. Arora and Duncan claim that the success of the schemes depended very much on close and constant liaison of language teachers with the subject teachers and on the continuity of learning experiences provided by them.

It is therefore clear that English second language learners need linguistic help not only in an English lesson but right across the curriculum. The Bullock Report cited in Marland (1977, p. 7), although dealing with first language, states that unless the pupil can read, write and talk competently he can not benefit from the range of learning which secondary school provides. Language is vital to learning, providing access to the source materials and learning experiences. The ability to read depends on and grows out of language ability. Indeed, reading of a passage that is too far beyond the readers verbal experience is virtually impossible.

READING

It is perhaps appropriate at this stage to focus on the issue of reading in second language development in the classroom. Attention will be paid to the linguistic demands that are made upon second language learners from the textbooks which are not written with such pupils in view. Widdowson (1979 in

Alderson and Urquhart, 1984) define reading as the process of getting linguistic information via print. Fries (1972) in the same source, views learning to read as simply a transfer of linguistic knowledge from the aural medium in which it was acquired to the written medium. Rubin (1983, p. 24) states that good readers are good thinkers because reading is a thinking act. Chapman and Czerniewska (1978, in Carrell, et al. 1988) claim that the product of reading includes both word organisation and comprehension of the passage, and these will require the processes of sensory impression, perception, conceptualisation and interpretation. Goodman (1967) describes reading as a "psychological guessing game" in which the teacher reconstructs a message which has been encoded by a writer as a graphic display.

Other reading experts (Alderson, 1978; Cziko, 1978) have characterised it as basically a concept driven, top-down pattern in which higher-level processes interact with and direct the flow of information through lower-level processes. Carrell (1988, p. 4) explains that in the top-down view of second language reading, not only is the reader an active participant in the reading process, making predictions and processing information, but everything in the readers' prior experience or background knowledge plays a significant role in the process.

In 1979 Coady, (cited in Alderson (1984), elaborated on this basic psycho-linguistic model for English second language reading and suggested a model in which the second language readers' background knowledge interacts with conceptual abilities and process strategy to produce comprehension.

Carrell et al. (1988, p. 2) claim that only recently has second language reading been viewed as an active rather than a passive process. Early work in second language reading, especially in reading in English as a second language, assumed a passive, bottom-up view of second language reading, that is, it was viewed primarily as a decoding process of reconstructing the author's intended meaning via recognising the printed letters and words, and building up a meaning for a text from the smallest textual units at the "bottom" (letters and words) to larger and larger units at the "top" (phrases, clauses onto sentences and whole paragraphs). This is often referred to as the interactive process.

Other researchers beginning with Rumelhart (1977) have proposed interactive models which argue that lower-level and higher level processes work together

interactively as parts of the reading process. In its simplest form the interactive process means a process that incorporates both top-down and bottom-up strategies in reading. According to Grabe, cited in Carrell et al. (1988, p. 60), there is no single interactive model. Interactive models include any model that minimally tries to account for more serial processing and that does so assuming that any parallel or array processing will interact. A number of important implications for English second language reading follow from an acceptance of interactive models. First, the very nature of interactive models suggests that higher level processing abilities play a significant role. At the same time, the interactive models strongly imply that many lower-level processing skills are basic to good reading.

Eskey (1973) observes that it is important to distinguish between the use of prior knowledge (top-down processing to facilitate the simple recognition of words) and the use of such knowledge to facilitate higher levels of interpretation. Frequent use of top-down strategies at word level suggests a simple failure to decode properly. Good readers are more reliant on content for accuracy (Stavonich, 1980, p. 51). To achieve both, properly developing readers must therefore work at perfecting skills and their top-down interpretative strategies.

Jolly (1978, in Alderson, 1984); Groebel (1980) and Mott (1981) in the same source, suggest that it is first language reading ability rather than the degree of control of the new language that determines a reader's capacity in a second language. Alderson, Bastein and Madrazo (1977), in a study of Mexican subjects' reading in both their native Spanish and in English, found a significant correlation between proficiency in Spanish and reading comprehension of a text in English, leading them to conclude that native language competence was the best predictor of reading success in a second language. (Alderson and Urquhart, 1984).

Yorio (1977) claims that reading problems of foreign learners are due largely to imperfect knowledge of their native language, and to native language interference in the reading process. He maintains that the problems of second language readers are due to a lack of familiarity with the new language. Interference from the native language compounds the problem of imperfect command of the second language, making the task of the second language reader even more complex.

Anderson and Pearson (1984 in Carrell et al. 1988, p. 37) claim that to say one has comprehended a text is to say that one has found a mental home for the information in the text, or else one has modified an existing mental home in order to accommodate that new information. This view regards reading as a process of interaction between old and new information. Carrell and Eisterhold (1983), reviewing the state of English second language theory, concluded that our understanding of reading is best considered as the interaction that occurs between the reader and the text, an interpretative process.

Writing about the nature of communication competence in English, Chick (1984) presents a useful diagram, from a 1975 paper, of the components of the level and sort of competence pupils are expected to have for successful reading.

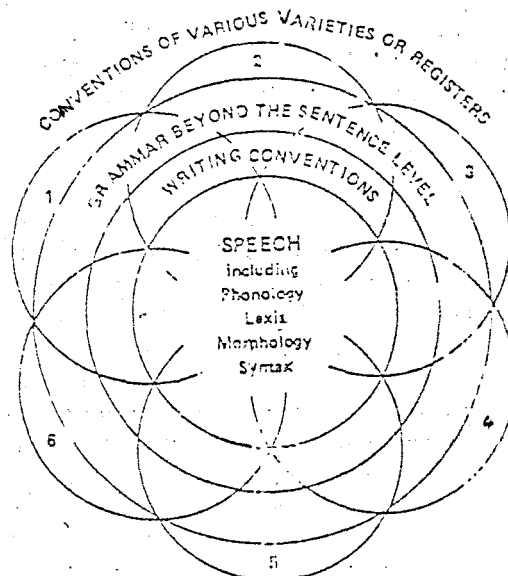


FIGURE 2.1
THE GRAMMAR OF A LANGUAGE

William Grabe (1984 in Carrell et al. 1988) lists a unique set of problems for second language readers:

- (i) They may or may not read in their first language.
- (ii) If second language students do have literary training it is not known how they approach reading in their mother tongue as a social phenomenon.

- (iii) Second language readers are often assumed to transfer readily their language reading abilities to the second language context; though Alderson (1984) argues that there is no adequate empirical evidence for assuming such a strong position.
- (iv) Second language students coming from different orthographic traditions do appear to be affected by different orthographic conventions, depending on their stage of reading skills acquisition (Tzeng and Hung, 1981; Taylor and Taylor, 1983).
- (v) Second language readers do not begin reading English with the same English language knowledge available to English speaking children. For English second language reading, one cannot assume that a large vocabulary or basic syntactic structures are already available. Both Eskey (1983, 1986) and Clarke (1979) have characterised these limitations as a language ceiling or threshold, which English second language students must surpass if they are to develop fluent reading skills.

This study is concerned with the problems encountered by second language learners in comprehending material in their history textbooks. Therefore, attention will now be paid to comprehension skills and the different categories of comprehension levels.

Eskey (1973) states that knowledge of the language of the text must be an integral part of whatever background knowledge is required for the full comprehension of the text. He views language as a kind of schema, albeit one that for fluent native users may be activated automatically, and there is no easy top-down route around the fact that fluent reading entails bottom-up perceptual and linguistic skills as well as higher-order linguistic skills.

Rubin (1983, p. 63) asserts that background knowledge of reading comprehension is important for all readers regardless of what they read because the development of higher levels of comprehension is closely related to the development of higher thinking skills. She states that if content area teachers find that their students lack certain reading comprehension skills that they need to understand content material, those teachers should help their students acquire these needed skills by using an integrative approach. This

means that the skills (needed to understand content) and the content are taught together.

According to Ulijn (1978) and Ulijn and Kempen (1976), cited in Alderson and Urquhart (1984), poor foreign reading comprehension is not due to insufficient knowledge of grammar, but to lack of conceptual knowledge; the meaning of words and subject knowledge. It follows that, since native speaker readers may also lack knowledge of the subject matter, the only difference between first and foreign language readers is in their knowledge of vocabulary.

Bransford, Stein and Shelton carried out a study on how comprehension depends on the activation of relevant knowledge. They did this by manipulating the availability of knowledge and assessing the effects on comprehension and memory. They sum up their findings by observing that the ability to understand a linguistic message is not simply a function of knowledge of a language; language comprehension depends on the availability of relevant knowledge to fill in the gaps in the messages (Alderson and Urquhart, 1984, pp. 28-43).

Rubin (1983, p. 39) gives a list of characteristics of what she calls good comprehenders. She states that good comprehenders are able to do inferential reasoning; they can state the main or central ideas of information; they can assimilate, categorise, compare, make relationships, analyse, synthesize and evaluate information. Next, she gives a list of reading comprehension taxonomies derived from Barrett which consist of four levels: literal comprehension, inferential comprehension, evaluation and appreciation. This model is close to that of Chick (1984) reproduced earlier in this chapter.

A model adapted from Nila Banton Smith (1969, reproduced in Rubin, 1983) divides comprehension skills into four categories. Each category is cumulative in that each builds on the others. The four comprehension categories are:

- 1 Literal comprehension.
- 2 Interpretation.
- 3 Critical reading; and
- 4 Creative reading.

Each of these will be explained.

CATEGORISING

When pupils are categorising things they are classifying things. To be able to classify they must know what belongs together and what does **not** belong together. They must be able to organise information.

COMPLETING ANALOGIES

Pupils must have a good stock of vocabulary and the ability to see relationships. Students who have difficulty in classifying will usually have difficulty with analysis.

Anderson et al. (1989) give as an example a passage and an example of each question type (understanding main idea, understanding direct statements, drawing inferences) that illustrate the tasks the reader must perform (College Entrance Examination).

TIME : 30 minutes

DIRECTIONS: Each passage below is followed by questions based on its content. Answer all questions following a passage on the basis of what is stated or implied in that passage.

SAMPLE PASSAGE

During the 50's each TV season offered 39 weeks of new shows, and 13 weeks of repeats. Slowly the ratio has reversed. The ultimate goal may be a one week season, 50 weeks of repeats, and one week off for good behaviour.

I The main point the writer is making is that -

- A television shows are being repeated more often than ever.
- B shows must be repeated to allow time to prepare new shows.

LITERAL COMPREHENSION

This represents the ability to obtain a low type of understanding by using information explicitly stated. Although literal type questions are considered a low-level type of thinking, it should not be concluded that reaching for details to gain facts is unimportant in content area courses. A fund of knowledge is important and necessary; it is the foundation for higher-level thinking.

INTERPRETATION

This category demands a higher level of thinking ability because the questions in the category of interpretation are directly concerned with answers that are not directly stated in the text but are suggested or implied. To answer questions at the interpretative level, readers must be able to work at various levels of abstraction. Smith asserts that the interpretative level is the one in which the most confusion exists when it comes to categorising skills. The confusion concerns the term inference which is a broad reasoning skill involving analysis and synthesis and the fact that there are many different kinds of inference.

Some of the skills that are usually found in interpretation are listed as:

- determining word meaning from text;
- finding main ideas;
- "reading between the lines" or drawing inferences;
- drawing conclusions;
- making generalisations;
- recognising cause and effect reasoning;
- recognising analogies; and
- metaphors.

CRITICAL READING

Critical reading is at a higher level than the other two categories because it involves evaluation, the making of a personal judgement on the accuracy, value and truthfulness of what is read. To be able to make judgements, a reader must be able to collect, interpret, apply and synthesize the information. Critical reading includes such skills as the ability to differentiate between fantasy and reality and the ability to discern propagandist techniques.

CREATIVE READING

Creative reading uses divergent thinking skills to go beyond literal comprehension, interpretation and critical reading levels. In creative reading, the reader tries to come up with new or alternative solutions to those presented by the writer.

Another model of comprehension skills also occurs in Rubin's (1983) book. She, herself, lists the skills in the following way:

Finding the main idea of a paragraph

In reading, the main idea helps students to remember and understand what they have read. In writing, the main idea gives unity and order to a paragraph.

Finding the central idea of a group of paragraphs, an article or a story

To find the central idea of a story, pupils must find what common elements the paragraphs in a story share.

Reading between the lines

Many writers do not directly state what they mean but present ideas in a more indirect, roundabout way. That is why inference is called the ability to "read between the lines".

Implied statements

Rather than directly stating something, it is presented indirectly. To understand the writing, the reader must be alert and be able to detect the clues that the author gives.

Rubin then suggests that there are important tasks which teachers should impose on the pupils when giving them practice in reading comprehension. Teachers should ask key questions about the material that will encourage students to draw inferences from what they are reading. The students should also be asked to supply data from the text that would substantiate their inferences.

- C repeated shows are used to gain good ideas for new shows.
- D repeating shows cuts down costs. (MAIN IDEA)
- 2 When did the change in television that the passage describes take place?
- A during the past year.
- B only very recently.
- C over a period of time.
- D several years ago. (DIRECT STATEMENTS)
- 3 What does the writer most probably think of the situation in television that he or she is telling us about?
- A it is better than it was before.
- B it cannot be helped.
- C it may soon improve.
- D it is becoming ridiculous (INFERENCES)

It will be seen that a similar model of comprehension questioning was used in compiling the test passages in the present study. Here the Merritts' (1969) system of literal, re-organisation of material, inference, evaluation and appreciation questions formed the basis of the test on a comprehension passage on slaves. A fuller explanation of Merritts' terms occurs in chapter three. Once again similarities between Banton, Smith, Rubin and Merritt are obvious.

Royer et al. cited in Alderson and Urquhart (1984, p. 45) assert that most accounts of the reading comprehension process focus on three elements: the text being read, the background knowledge possessed by the reader and the contextual aspects relevant to interpreting the text. These three characteristics have been explored earlier in this chapter. They also claim, however, that another element that is important in a discussion of reading comprehension is the reader's intent. Three techniques for controlling the reader's intent, while reading a text, include presenting readers with learning

objectives that specify what is to be acquired from the text, inserting questions into the text and asking questions that require more than the recall of specific information. Such broader reading purposes, however, underlie the skills outlined by Banton, Smith, Rubin and Merritt.

TEXTBOOK ANALYSIS

It is also necessary to consider the reading problems which could be presented by the textbooks, particularly for second language learners. For the purposes of this thesis, the assessment of textbooks will focus on their readability for second language learners.

Lennard (1984, in Chick, 1984) gives a number of extracts from school texts across the curriculum to show how second language pupils are loaded with and exposed to information density in the text as well as unfamiliar/technical vocabulary. Two of these examples in the areas of social studies will be given:

GEOGRAPHY

When we give directions we often use expressions such as 'to the right', 'to the left', 'above, below' and so on. These terms are relative to our position and depend on the way we are facing at the time of speaking. Should we need a set of terms of reference that is universally acceptable, we must find a bearing independent of ourselves and one which does not change.

HISTORY

The plough changed farming from plot cultivation to agriculture (the tillage of fields) and welded indissolubly cultivation and stockbreeding. It relieved women of the most exacting drudgery, but deprived them of their monopoly over the cereal crops and the social status that conferred.

(Compare these with the passage on the industrial revolution from **History in Action Standard 8** in Appendix I).

Matoti (1990, p. 16) asserts that textbook analysis is not a new field of research as much has been done on this topic in Europe, America and South Africa. He states, however, that the major focus of research in this field has been on bias and prejudice through omission or commission in the treatment of minority groups. Dean (1983) shows that in 1925 the League of Nations recommended exchange of textbooks at international level and this encouraged their analysis. In 1949 UNESCO, the United Nations Educational Scientific and Cultural Organisation, issued guidelines proposing criteria for evaluating textbooks, such as accuracy and fairness. Countries like Germany, Britain, America and Canada also carried out textbook analysis.

Other studies by McDiarmid and Pratt (1971) and Nash (1972) also centred on bias and prejudice. McDiarmid noticed biases such as the failure to be aware of discrimination and an emphasis on politics, which resulted in history being presented mostly as war and conflict. These are biases by omission and commission.

South African textbooks, too, have received attention. Auerback (1965) examined, amongst other things, the differences between Afrikaans and English language history textbooks. He also examined the use of emotive words, and assessed the extent to which books reflected reasonably recent findings. Dean (1983) and du Preez (1983) sought to trace bias and prejudice in school history textbooks and to show how textbooks are used in the legitimisation of the status quo.

Matoti (1990) maintains that these studies have adopted, amongst others, techniques of analysis such as the qualitative and quantitative approach. Qualitative analysis refers not so much to how much bias has been introduced into a topic, but more specifically to how it is introduced. It is concerned with style of writing and quality of writing or "quality of scholarship" (Boyce, 1975, p. 175). Quantitative analysis, on the other hand, is intended to yield information about the space allotted to topics in the textbooks. It looks into the priority given to topics and histories of countries. As an example, van den Berg and Buchland (1983) observe that there is an almost complete absence of African history in the South African history syllabuses and that the existing core syllabus reflects an essentially white perspective on the history of the country. There is a very strong emphasis on historical developments affecting or precipitated by whites.

Boyce (1975, p. 174) states that space allocation is an indication of priority values with writers and publishers. But omission or giving little space to some topics may not always be due to prejudice but to other considerations. Textbooks, in putting emphasis on some topics to the neglect of others, may also be responding to a prescribed syllabus. In that case the syllabus itself is the limiting factor. In other cases, the cost of providing extended accounts of topics might increase too greatly the purchase price of books, especially if a market is small.

Although much information given on the analysis of South African textbooks is concerned with bias and prejudice, this research is concerned with second language problems in history learning. For this reason the assessment of history textbooks will focus on their readability.

READABILITY

There is a large amount of history reading material published. One of the main problems is to recognise whether a particular piece of work is likely to be suitable and readable for a particular group of readers. In the Ciskei schools the need to prescribe a suitable textbook for the pupils becomes even more important because schools normally rely on one particular textbook supplied by the education department for each standard.

In this case, readability analysis of textbooks may be necessary to assist the teachers beforehand in the selection of the texts suitable for their pupils and in helping them to decide how to lead their pupils through a complicated text. Williams (1980) states that the readability problem is particularly acute for pupils entering secondary year I, when in many countries they are required to make the transition from English as a subject to English as a medium of instruction. The second language pupils in countries like Nigeria and Hong Kong face the twin problems of (a) more advanced conceptual difficulties in science and social studies, etc; and (b) studying these through the medium of English. Although the reasons for the reported readability problems differ from country to country, Williams (1980) has attempted to give some of the five more common of these.

- 1 The spread of universal education resulting in lower average reading standards.

- 2 Inappropriate reading courses at primary level in terms of reading tasks required at content areas at secondary level.
- 3 Increasing competition between publishers, resulting in pressure to produce new content area titles to over-tight deadlines with insufficient consideration being given to matters of readability.
- 4 Unrealistic demands of the national syllabus, so that (for example) too much ground has to be covered in a certain year, and/or conceptually complex syllabus content has to be taught at too early a stage in the secondary school.
- 5 The difficulty of finding authors with a combination of:
 - classroom teaching experience at the relevant age level in the country concerned.
 - command of content.
 - awareness of the reading level of English of the target pupil.
 - sensitivity to principles of readable writing.

Readability refers to all the factors that affect success in reading and understanding a text. Gilliland (1972) cites these factors as interest and motivation of the reader, legibility of print, complexity of words and sentences in relation to the reading ability of the reader. For the purposes of this study the focus of attention will be on the complexity of words and sentences.

The readability of a text will depend, to a significant extent, on the relationship between the sequences it contains and their familiarity to the individual reader. What is readable for a child with one sort of linguistic background may not be readable for a child whose linguistic background is different.

Dale and Chall in Gilliland (1972) state that in the broadest sense, readability is the sum total (including interactions) of all those elements within a given piece of printed material that affect the success which a group of readers have with it. The success is the extent to which they understand it, read it at optimum

speed and find it interesting. They stress comprehension, fluency and interest as the three main aspects of the reading process. These three elements interact with each other to affect readability.

Gilliland (1972) observes that more recently the interest in readability has led to an increase in the need to search yet further for accurate measures for predicting and controlling the difficulty of texts. Application of a readability formula involves the selection of a sample from a text, the counting of some easily identifiable characteristics, such as average number of words per sentence, and then performing a calculation to produce a score. The score produced indicates the difficulty level of the text. For this research, the Smog formula, Gunning's Fox index and the Flesch formula were applied to the standard 8 and standard 10 textbooks. These are some of the widely accepted methods of measuring readability and they are based upon an analysis of identifiable and more objectively assessed aspects of a text (Gilliland, 1972). The following description of the three measures presents the formulas in increasing order of complexity. The Smog index is the easiest to compute, slightly more complex is the Fog; and the Flesch is the most time-consuming of the three.

THE SMOG GRADING

This formula involves the easiest calculations. Three passages containing ten sentences are selected. In the thirty selected sentences every word of three or more syllables is counted. The square root of the number of three syllabi words thus counted is estimated.

The Smog formula is:

$$\text{Reading age} = N + 8$$

To find N this procedure is followed:

$$N = \sqrt{p} \text{ where } p = \text{the sum of the longer words in the three passages}$$

For example, if in the three passages, omitting titles and quotations, there are 32, 42 and 35 three syllable or longer words respectively:

$$p = 32 + 42 + 35 \text{ (TOTAL} = 109)$$

$$N = \sqrt{109}$$

$$\begin{aligned} \text{Reading age} &= 10.5 + 8 \\ &= 18.5 \end{aligned}$$

This now gives the Smog reading age which is the reading level that a person must have reached if he is to understand fully the text assessed. It is claimed to be quick and easy to apply. Using a very simple sample, this formula is, however, predicting readability on the basis of only one factor, namely the word length (Gilliland, 1972).

GUNNING'S FOX INDEX

This formula involves the selection of at least three passages of one hundred words each, spaced throughout the book, the calculation of the average sentence length (SL), the calculation of the number of "long" words in the passage, i.e. words with three or more syllables; adding and averaging (a) the sentence length for all three passages; (b) the number of "long" words in each passage; adding of these two final figures together and multiplying by 0.4. The result is expressed in American Grade levels, e.g.:

Grade 4 is roughly equivalent to South African Std 2

Grade 12 is roughly equivalent to South African Std 10

THE FLESCH FORMULA

The factors measured here reflect aspects of the difficulty of reading single words and sentences. The higher syllable count will tend to reflect difficulty of meaning. The sentence length measure is a reflection of memory span, since the longer it is necessary to remember the parts, the more difficult it will be to understand (Gilliland, 1972). To apply the formula, three passages of one hundred words each, spaced throughout the book, are selected and the total number of syllables in these 100 words (represented in formula by 'WL') are counted. Then the average sentence length, computed in the same way as in the previous formula, is noted. The formula $206.835 - 846 - 1.1015$ is applied. The result will fall somewhere between 0 and 100, with 0 indicating a very easy passage. The results of the three passages are averaged to obtain a final picture of the whole book.

The following is an example of the application of the formula to a passage which consists of 100 words, 166 syllables and 14.8 words per sentence:

$$\begin{aligned}
 &206.835 - (0.846 \times 166) - (1.015 \times 14.8) \\
 &140.43 - 15.022 \\
 &140.43 + 15.022 \\
 &= 155.452 \\
 &206.8.35 - 155 - 452 \\
 &= 51.383
 \end{aligned}$$

The apparent complexity of the formula is reduced when a graph compiled by Kerry and Sands (1978) is used. The word length (syllable count) and the average sentence length still have to be calculated. These figures are simply found on the graph and linked with a ruler. It is then possible to read off the Reading Difficulty Index without doing mechanical calculations.

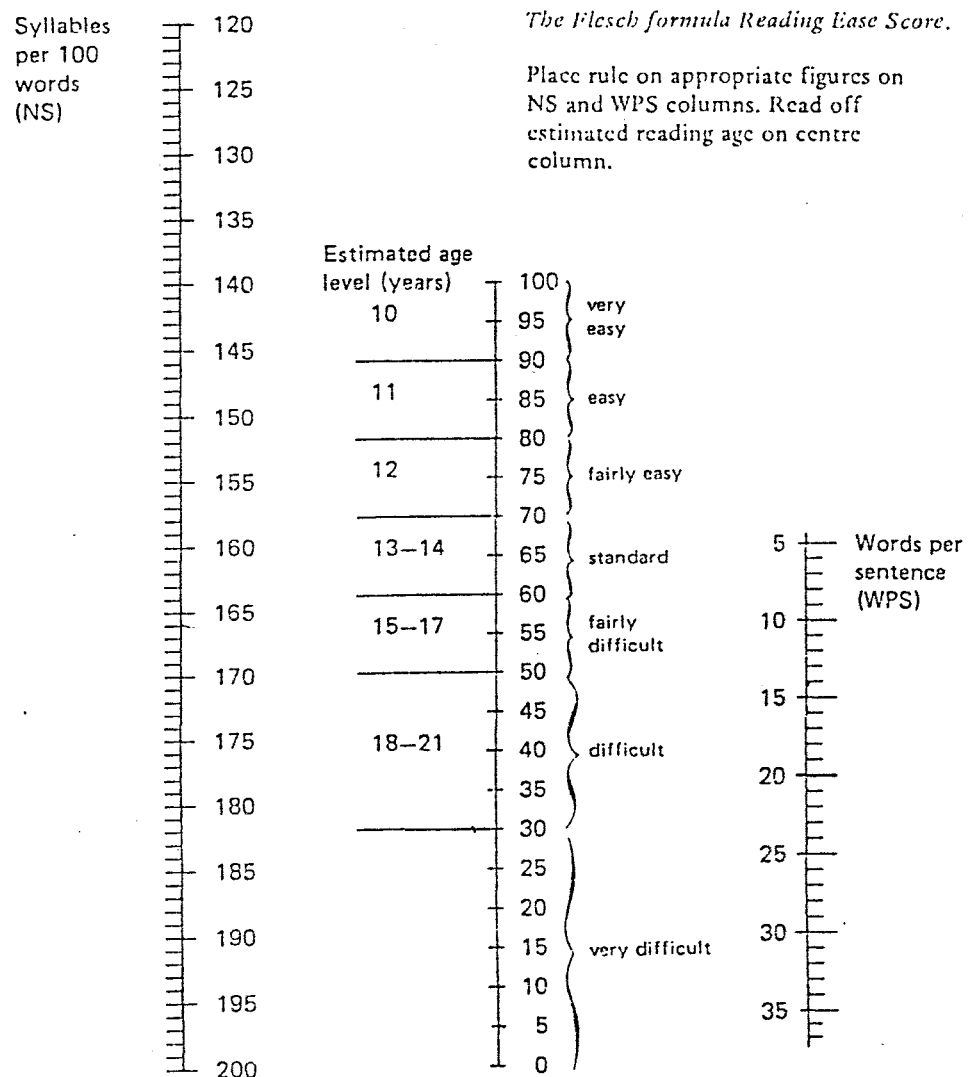


FIGURE 2.2
FLESCH'S PATTERN OF READING EASE SCORES

Calculations can also be avoided by using a table which presents a rough interpretation of difficulty by using the two components of word and sentence length separately to gain an indication of the final reading ease-score. The indication of the interpretation of the raw-score figures for the Flesch calculations can be seen in Table 2.1.

<u>Reading ease score</u>	<u>Style</u>	<u>Typical Magazine</u>	<u>Syllables per 100 words</u>	<u>Average sentence length</u>
0-30	Very difficult	Scientific	192 or more	29 or more
30-50	Difficult	Academic	167	25
50-60	Fairly difficult	Quality	255	21
60-70	Standard	Digests	151	17
70-80	Fairly easy	Slick fiction	139	14
80-90	Easy	Pulp fiction	131	11
90-100	Very easy	Comics	123 or less	8 or less

From: Flesch - A new readability yardstick, Journal of Applied Psychology 2,3 June 1948

FIGURE 2.1

FLESCH'S PATTERN OF READING EASE SCORE

Both the Flesch and Fog index have limitations in that they are based on the assumption that long words and long sentences make reading comprehension difficult. But their advantage is that they can give a teacher in a short time a rough but fairly reliable guide to the demands being made on pupils.

Gilliland claims that a comparison of Dale-Chall and Smog gradings showed that the Smog gradings were generally two grades higher. To illustrate the effect of applying different formulae to different texts, the Dale-Chall, Gunning and McLaughlin formulae were applied to passages from two books, *The Plowden Report* and a novel, *The Valley of Adventure*.

	Plowden Report	Valley of Adventure
Dale-Chall	13-15th grade	7-8th grade
Gunning (Fog)	15th grade	10th grade
McLaughlin (Smog)	13th grade	8th grade

The Dale-Chall index is comparatively rarely used, as it has a very arbitrary definition of difficult words. A list of "easy" words is provided. Any word not in the list is interpreted as a difficult word. Continuous checking of the word order is tedious. The possibility of a word being "easy" or difficult varies with time and place.

In both cases the Gunning's formulae produces higher results than the other two. This could be taken to indicate that the Dale-Chall and McLaughlin formulae are underestimating the difficulty of the texts or that Gunning's index is overestimating the difficulty (Gilliland, 1972).

All the formulae applied involve the general use of a word measure or sentence measure. This reflects the conclusion of researchers that reading difficulty is centred around factors at word or sentence levels. Although this assessment may not apply to all cases, longer sentences do tend to be more complex than shorter sentences and sentence measures reflect the effect of memory span upon readability.

It is recognised that the difficulty analyses used in this study were originally devised for mother tongue speakers of English and any conclusions based upon the applications of these texts apply to such pupils. If a text matches well with either the age or standard levels of pupils for which it is intended, this does not mean that it would be equally appropriate for pupils who use English as a second language.

Xhosa pupils in South African schools, however, are supposed to be taught through the medium of English (although it is well known that many teachers present key concepts or ideas in a subject in Xhosa and translate them into English). The textbooks in schools for black pupils are all written in English and were originally intended for first language speakers. It can be assumed, therefore, that a difficulty level appropriate for a mother tongue speaker in a particular standard would be very much more difficult for a second language speaker.

If the difficulty level of a text is far above the appropriate level for a mother tongue speaker, it would clearly be even more inappropriate for a second language speaker. Any results obtained from the application of reading difficulty analysis tests to material used in black schools must be interpreted in the light of these comments.

ENGLISH AS MEDIUM OF INSTRUCTION

In reviewing literature for this research it is important to look into the question of how English received preference over the mother tongue as medium of instruction for black schools in South Africa. Attention will be paid to the history of the use of English as a medium of instruction in black education in South Africa as well as the attitudes of blacks to the use of either the vernacular or English as medium of instruction.

Before the formation of the Union of South Africa in 1910 each colony or Republic had a slightly different approach towards the issue of the medium of instruction for blacks in its area. The Cape and Natal followed the normal pattern of the use of a vernacular up to junior or lower primary school level, gradually transferring to English from the senior primary school. In the Orange Free State and Transvaal the transition from vernacular to second language came later and latest in the Free State where it occurred only at the secondary school level.

In some parts of the rest of Africa examples of both early and later use of a European language as a medium of instruction can be found. In the French and Portuguese colonies pupils moved straight into a European language as medium of instruction. In the Belgian Congo and German colonies long periods of use of the vernacular are common. In the British colonies like Kenya and Ghana transition, as was the case in the Cape colony and Natal, came somewhere in the middle of the primary school.

These policies have to be set against the fact that, up until the Second World War, very few children in these European colonies or in South Africa went beyond primary school. The arguments were based on what medium was the best for a very short educational experience - a mother tongue or a European medium. From the Second World War onwards there was a big increase in the number of pupils staying on to secondary school. The argument was now based on how and when to make a transition to a European language.

It is generally argued that the quality of African languages make it difficult to present abstract ideas especially in subjects like mathematics and science. Many African languages are spoken by few people. For instance, the 1989 survey showed that about half a million people of all ages are living in Venda (1989/89 Race Relations Survey, p. 34). In other words, to prepare reading material over a wide range of school subjects for a very small population will be enormously expensive. In 1948, in South Africa, the nationalist government came to power with its policy of separate development. This led to the creation of national black ethnic groups with different languages. These groups were to develop their own culture and not borrow too greatly from European culture. The Eislen Commission recommended much greater use of the vernacular and favoured the Free State model of eight years of primary schooling in the vernacular. This was instituted with the Bantu Education Act of 1953.

Another part of the problem was that black learners must have some knowledge of two official languages. For employment purposes equal attention had to be paid to both European languages and this remained the policy from 1923 to 1976. This situation placed heavy burdens on the black pupils. In white education the pupil learns his own language and the second language is taught as a subject. For the first two to three years he learns the second language only in oral form and starts the reading and writing from standard 1 or standard 2. In black education the child started learning both official languages in his first year at school and this learning included reading, writing, speaking and listening.

This is a much heavier burden than white pupils had to face. This burden was made worse by the fact that apartheid made it impossible for white teachers to teach in black schools and so the teaching of the European languages was often done by black teachers whose own command of those languages was not always good. This decline in teaching skills got worse as the 23 years of this policy continued.

The burden of the learning of language became even greater in the secondary school where the development of the black languages made it impossible for these languages to go on being used as mediums of instruction. Once again, in the secondary school, the employment argument was used and so both English and Afrikaans were expected to be used as mediums of instruction with half the subjects taught in English and half in Afrikaans. But in practice,

at the secondary school level, Afrikaans was rarely used as a medium of instruction because the teachers could not handle it. In fact at secondary school only English was used as a medium of instruction.

Even though the pupils had had English as a subject for eight years of primary school, few could handle it as a medium of instruction when they started secondary school. For this reason the secondary school period for blacks was extended by one year to a five year cycle. The first year of the cycle was expected to concentrate on improving the fluency in English of pupils. The Soweto uprisings of 1976 stemmed initially from objections to the language policy of the National party government, particularly to the attempt to impose the English-Afrikaans 50/50 basis rigidly. One of the first things to be changed immediately after the 1976 riots was the language policy. Late in 1976 only one language was used as a medium of instruction in secondary schools and the language to be used was to be decided by the school and local community. Practically all schools opted for English as medium of instruction.

This total approach towards the vernacular and the European languages was unpopular. There was strong opposition to the policy and regulations of the Department of Bantu Education. The extent of opposition to the language policy of the Department is clearly seen in the responses of the different semi-independent states, as they were created according to Nationalist party theory. When the Transkei gained semi-independence in 1963 it appointed the Cingo Commission to look into the teaching of the official languages and the use of the mother tongue as medium of instruction. The commission recommended the use of English as medium of instruction from standard 3 to senior certificate.

The preference given to English was based on the belief that the mother tongue was undeveloped and had not reached the stage when it alone could be used to put across ideas found in the modern world. Other national states' governments, including Ciskei, followed the example of Transkei and introduced an official language, especially English, as a medium of instruction.

Lanham (1967) has analysed the inappropriate syllabuses and methods which were prescribed by the Department of Bantu Education and suggests that teachers in training were not well prepared for the difficulties of learning in

the second language medium. In his preliminary work for the Molteno Project, Rodseth showed that the problems of black pupils reading in English were at least partly linked to the fact that they were not reading well in their own language.

It is clear from the survey attempted in this chapter that final agreement on the factors which influence pupils' reading comprehension, particularly when reading is done in a second language, has not yet been reached. There does, however, seem to be greater agreement on the hierarchy of questions that could be used to train and test pupils' comprehension. It can be, unfortunately, fairly safely assumed that few teachers in Ciskei schools are aware of the controversies about reading in the second language or have been trained in more flexible and wide-ranging question types.

This thesis will look at the efficiency of pupils' reading of a comparatively simple text and answering questions in English and in Xhosa. In the following chapters the difficulties experienced by senior secondary pupils will be made clear. The next chapter will describe how the research was carried out.

CHAPTER THREE

METHODOLOGY

The possibility exists that the reading difficulty of the pupils' textbooks might be too high even for mother tongue speakers of English. If that is the case they would be even more difficult for second language speakers. Using the Smog formula, Gunning's Fox index and the Flesch Reading Ease formula, reading difficulty indices were established for two standard 8 and four standard 10 textbooks commonly used in Ciskei schools. (The results of this will be described in chapter four.)

If pupils are having difficulty with their textbooks, is it because they are being presented with materials too difficult to read or is it because they are still having difficulty in reading English regardless of the reading difficulty at which the textbooks are written? In an attempt to find an answer to these questions a passage on slaves was devised based upon Malherbe's text, **Always Working** (Malherbe C, Worden N, 1986). The passage included prose, maps and picture material taken from different parts of the book.

Several factors governed the choice of material for the experiment. First, it was important to find material which would only briefly have been included in the pupils' primary school syllabuses, and not dealt with at all in the secondary school years. This would prevent any results being affected by the pupils' ability to comprehend previous teaching. In other words, if material had come from the standard 8 and standard 10 syllabuses it could not have been known whether the scores reflected the pupils' ability to comprehend English or the way they had been taught in the recent past. The slavery topic is dealt with very briefly in the primary school syllabus. In the secondary school syllabuses the topic is presented largely in terms of the effects of the abolition of slavery. The topic was selected from a book which emphasised the origins and conditions of slaves.

Secondly, it was likely that the difficulty level of conventional standard 8 and standard 10 textbooks would be fairly high. Other South African research has

shown that this is the case. For instance, the results of Matoti's (1990) research concerning the difficulty level of four standard 8 texts can be seen in Table 3.1.

<u>Book</u>	<u>Flesch Rating</u>	<u>Kerry & Sands Rating</u>	<u>Percentage of complex sentences</u>	
	<u>Reading score</u>	<u>Style</u>	<u>Age level</u>	
History for Today	63	Standard	13-14	36%
History 8	54	Fairly Difficult	15-17	44%
History in Perspective	53,4	Fairly Difficult	15-17	24%
Timelines	53	Fairly Difficult	15-17	54%

TABLE 3.1

SUMMARY TABLE: DIFFICULTY LEVEL OF THE BOOKS

These figures are in some cases reasonable for mother tongue speakers of English for whom the books were written. In other cases they are high even for those readers. When it is remembered that few black pupils use English as a mother tongue, these levels are likely to be too high. The present research plan was to find material which would be deliberately much simpler than that available in the text books frequently prescribed in the Ciskei schools.

The book from which the topic was taken was intended for senior primary pupils who had English as mother tongue. Because the text was intended for this age group, it was hoped the difficulty level would be considerably lower than that found in the pupils' prescribed textbooks for standard 8 and standard 10.

Thirdly, a passage was chosen which would arouse and maintain the interest of the pupils. It was expected that, along with most other pupils of any race group, sympathy could be roused for the plight and the problems of slaves.

Fourthly, it was decided that the text would not be simplified any further. Occasionally a sentence could have been re-arranged to make more straightforward semantic links for a second language reader. For instance, one sentence read: "Like a house or a horse, they can be bought or sold." This might have been re-written as: "They could be bought or sold, like a house or horse can be." If the passage was already very simple in comparison with the levels in the pupils' textbooks, the further simplification might be easing the pupils' task too greatly. The original version of the sentence was, therefore, retained. It was in a style commonly found in expository writing, to which the pupils are continuously exposed.

Once the passage had been created, reading difficulty tests were applied to it. The full text can be seen in Appendix 2 and the difficulty levels of the texts, according to three commonly used indices, are shown and discussed in chapter four. A comprehension test based upon the slavery topic was devised to measure the pupils' abilities in handling this comparatively simple passage. Sixteen questions, based on Merritt's (1969) question types were devised. These questions included:

- 1 **The literal type:** These were questions whose answers were provided directly in the passage. For example: "Apart from South Africa, name three parts of the world where slavery was common at different times in history" (Question 2).

- 2 **Reorganisation of material type.** The answers to these questions still depend entirely on the document or passage, requiring the extraction of relevant bits of information which might be found in several parts of the complete comprehension passage. For example: "Describe how slaves were brought to the Cape" (Question 7).

- 3 **Inference type:** Here the reader has to read between the lines to bring out the hidden message. For example: "What kind of farming do you think would be found in the Eastern Cape?" (Question 10).

- 4 **Evaluation type:** The answers here depend on the reader's own assessment of the passage. For example: "Give three words which you could use to describe a country which allowed slavery" (Question 13).

- 5 **Appreciation type:** These questions require empathy from the reader, i.e. he has to put himself into the shoes of the people or person of the period under discussion. For example: "Give two words to describe the feelings of slave owners when slavery was abolished" (Question 16).

It was recognised that pupils would not necessarily be used to this full range of questioning, but if their problems were to be analysed it was important to see at what levels or stages their difficulties occurred. The test, it was calculated, would take approximately an hour to administer. The maximum number of marks was 80. The comprehension questions and the mark allocation can be seen in appendices 3 and 4.

One further aspect was added to the experimental design. The passage and the questions were in English, the language of the textbooks and the language in which much, but not necessarily all, of the teaching would be conducted. It was possible that pupils might be able to comprehend, reasonably well, material presented in English, but they might have difficulty in generating replies in a language which was not their mother tongue. It was therefore decided that half of the pupils selected in standards 8 and 10 would answer the test in English and the other half in Xhosa. The aim was to find out whether the pupils would be advantaged by being able to generate answers in their mother tongue or whether greater difficulty might be caused by having to translate information and ideas from English into Xhosa before questions could be answered. It was also important that the sample of pupils should reflect a wide range of attainment in history. The sample, therefore, included those who did well in history, the mediocre range and those whose performance was rather poor.

The comprehension passage and questions were first tried out on a standard 9 history class which was not used for the final experiment. The aim was to find out whether it would be necessary to make any adjustments to the passage, the questions and the time before the test was administered to the final experimental group. Using the history marks of the mid-year examinations to select a wide range of attainment in history, 40 pupils were selected, twenty of whom answered the questions in English and the other twenty in Xhosa.

The pupils were first given the comprehension passage to read in English. When they were ready to write they were given the questions. The questions had been set with enough blank space after each question to enable the pupils to write down their answers. Some pupils were concerned about answering in Xhosa a passage written in English. The researcher supervised the writing of the test. After an hour the pupils were stopped from writing.

The test was marked by the researcher (the raw scores obtained by the pilot group are in Appendix 5). The pupils' answers were used to effect minor modifications in the marking schemes and to assess whether the language difficulty level was too high or whether some questions were too difficult for the pupils to answer. After examining the results it was decided that no major changes to the passage or the questions needed to be made. Some adjustments were made, however, to the marking scheme. It was then possible to move to the main testing programme.

The final experiment was to be conducted in two schools. These schools were selected because both have large numbers of history pupils. There was a total of 400 pupils involved in the research. Their distribution is shown in Table 3.2.

<u>SCHOOL A (JABAVU)</u>			<u>SCHOOL B (MPAMBANI-MZMBA)</u>		
<u>Group</u>	<u>English</u>	<u>Xhosa</u>	<u>English</u>	<u>Xhosa</u>	<u>Total</u>
Std 8	40	40	40	40	160
Std 10	60	60	60	60	240
Total	100	100	100	100	400

TABLE 3.2
PUPIL DISTRIBUTION IN THE EXPERIMENT

School A is situated about five kilometres from the town of Alice. Some of its pupils are children of Fort Hare University staff, civil servants and

businessmen in town. Some, however, come from the townships around Port Elizabeth and Mdantsane but as there is no hostel accommodation at the school, they have to find lodgings in town. School B is situated about twenty kilometres from Alice and almost all of its pupils come from the surrounding rural community. This means that school A pupils are more likely to be exposed to English than those of school B.

If the pupils are to be compared on the basis of writing in English and writing in Xhosa, then the two samples have to be matched as closely as possible and should reflect a wide range of attainment in history. In each school the pupils' marks for previous history tests were collected, averaged and arranged in rank order. Four tests were available for use in school A and three tests in the second school. The top pupil in each school was allocated to the English group, the second to the Xhosa group, the third to the English, the fourth to the Xhosa. The procedure was continued until the last two pupils in the rank order were reached and allocated.

It is recognised that this matching process did not cover all the possible variables. The pupils were not matched for intelligence, as no reliable intelligence test results are available in Ciskei schools. The closest approximation to intelligence tests were attainment test scores which were the ones finally selected for the research. Secondly, the pupils were not matched for sex. In both schools the boy-girl ratio in both standard 8 and standard 10 history classes was approximately 1:2. If sex had also to be taken into account it would have been much more difficult to match closely for attainment. Although it is recognised that girls might perform better on average than boys in verbal subjects such as history, it was decided that as the comprehension passage measured attainment, matching based on attainment had greater priority than matching based on sex. This limitation, however, should be borne in mind when the results are examined.

Once the matching process had been completed, 400 pupils, or 200 matched pairs, were available for the research and wrote the comprehension text. The test was first conducted in school A where the researcher herself is teaching. Out of 120 pupils selected in standard 10, 60 pupils answered the questions in English in one group and another 60 in Xhosa in another group. One group was supervised by the researcher. Another history teacher was used to

supervise the second group. In conducting the test the same procedure as with the pilot group was followed. The test was then repeated with the standard 8 class. This time the pupils seemed to take a longer time to read the passage. As with the other group, the test took approximately one hour. The whole testing procedure was repeated in the second school.

Once the test had been marked by the researcher, the first stage of the analysis was to compare the pupils' scores as a whole in the English and the Xhosa groups. This was done by using 't' tests. Comparisons were then made between the English and Xhosa results for each school in turn. The analysis had to compare the school by school results in the two different languages; once again 't' tests were used for this analysis. If there were statistically significant differences between the schools, these would have to be taken into account when the total sample's results were assessed.

It was further decided to examine the comprehension test results in terms of two sub-groups of questions, the first being where the pupils had to do no more than reproduce information contained in the passage. The second group consisted of interpretative question types falling into Merritt's four last categories (reorganisation of material, inference, evaluation and appreciation). The questions allocated to the literal group were numbered 1, 2, 4, 6, 7 and 12 and can be seen in Appendix 3. These questions contributed 24 marks out of the maximum of 80 for the test. The interpretative questions were questions 3, 5, 8, 9, 10, 11, and 13-16. These questions constituted 56 marks out of the total of 80.

It was decided to follow this procedure to see if the difficulties found by the pupils were greater in interpretative than in literal questions, and which group might have scored more highly through answering in English or Xhosa. To analyse the scores on the sub-groups of questions, 't' tests were once again used. Because the basis of 24 and 56 marks were so different, the marks had to be reflected as percentages and these were used as the results to calculate the 't' tests for this purpose.

Finally, a broad analysis was made of the language control of those pupils who answered in English and those who answered in Xhosa. This was restricted to a simple subjective description of the most frequently recurring errors. No extensive qualitative analysis was made, for reasons described in chapter five.

The next chapter will examine the quantitative results obtained by the pupils in the comprehension test, will apply straightforward statistical analyses to them and will make some general comments on these results.

CHAPTER FOUR

QUANTITATIVE RESULTS

This research has been concerned with three broad issues. The first is the difficulty levels demanded of pupils who use English not as their mother tongue but as their second language. The second is the ability of pupils to handle questions based on a comprehension passage which has been deliberately set at a level much lower than that normally expected of senior secondary pupils. To explore this point still further, half the pupils responded in English and the other half in their mother tongue, Xhosa. The third issue to be explored was a brief qualitative examination of the errors made in both the English and the Xhosa scripts. In this chapter the first two of these issues will be explored. The third issue will be dealt with in the following chapter.

Part of this research is concerned with the problems of second language medium of instruction in history in the Ciskei. For this reason it is necessary to look at the demands made on the pupils by the textbooks they have to read in a language which is not their mother tongue. The readability formulae calculations described in chapter two were applied on two standard 8 and four standard 10 textbooks. It has already been explained in chapter three that the textbooks selected for analysis are commonly used in Ciskei secondary schools. Both the schools used for the research use the two standard 8 texts analysed in this part of the chapter for their pupils. The sample schools' standard 10 pupils use both **Active History** and **History in Action**. The **Active History** text is used in a large number of Ciskei schools. The last two texts, **Exploring History** and **New History to the Point** are much less popular.

Three passages were chosen from each of the texts. Care was taken to ensure that the passages covered the same topics. The topics for the standard 8 and standard 10 texts were as set out in Table 4.1 below.

<u>STANDARD 8</u>			
<u>Passage</u>	<u>Topic</u>	<u>Books</u>	<u>Page</u>
1	Political results of the discovery of diamonds	Active History History in Action	227 110
2	Zululand into Natal	Active History History in Action	261 126
3	The industrial revolution	Active History History in Action	88 57
<u>STANDARD 10</u>			
<u>Passage</u>	<u>Topic</u>	<u>Books</u>	<u>Page</u>
1	Main features of South African Society in 1910	Active History History in Action Exploring History New History to the point	194 163 114 185
2	The issue of neutrality (in 1939)	Active History History in Action Exploring History New History to the point	284 240 212 305
3	The strike of 1922	Active History History in Action Exploring History New History to the point	218 181 140 217

TABLE 4.1**TOPICS FOR ANALYSIS FROM THE TEXTBOOKS**

Obviously, reading difficulty levels can vary with the content being handled. A straightforward narrative explanation is likely to yield a lower score than a passage explaining, often in abstract terms, cause and effect conditions. If radically different topics were chosen for analysis in different books, meaningful comparisons would not be possible. (The passages from the six books are reproduced in Appendix I.) The calculations for each of the three passages in each book were averaged to produce the final difficulty level figures and these can be seen in Tables 4.2 and 4.3.

<u>TEXT BOOKS</u>	<u>SMOG READING AGE</u>	<u>FOG AMERICAN GRADE LEVEL</u>	<u>FLESCH READING EASE SCORE</u>	<u>APPROXIMATE READING AGE FROM FLESCH FORMULA</u>
Active History	17.4	15.6	46.6	18.6
History in Action	19.25	17.76	38.4	20

TABLE 4.2
DIFFICULTY LEVELS OF STANDARD 8 TEXTBOOKS

From these results it can be seen that the difficulty level of both books is far beyond the mother tongue speakers for whom the books are intended, and therefore even further beyond second language speakers in standard 8. In both textbooks the final result is above American Grade 12 which is equivalent to South African standard 10.

An identical approach to that used in the standard 8 texts was followed for the four standard 10 textbooks. The results are indicated in Table 4.3.

<u>TEXT BOOKS</u>	<u>SMOG READING AGE</u>	<u>FOG AMERICAN GRADE</u>	<u>FLESCH READING EASE SCORE</u>	<u>APPROXIMATE READING AGE FROM FLESCH FORMULA</u>
Active History	18.5	14	49	17.3
History in Action	18	17.3	49.1	17
Exploring History	18	21	43	18.2
New History to the Point	17.5	14	56	15.9

TABLE 4.3
DIFFICULTY LEVELS OF STANDARD 10 TEXTBOOKS

Several points should be noted from this table. The first is that the standard 8 **History in Action** text seems to be more difficult than the standard 10 texts. The standard 8 **Active History** text is almost as difficult as the standard 10 version. When the results of comprehension tests for standard 8 pupils are considered later in this thesis the very high difficulty levels of their textbooks are almost absurd.

The second point is that although there is reasonable consistency among the scores within each test, they are not as close as they are for the standard 8 texts. For mother tongue speakers reading levels expected of 17 and 18 are not inappropriate for pupils in standard 10. The Fog index as usual inflates the scores. This can be seen particularly in **History in Action** and **Exploring History**. Although these four texts are reasonably appropriate for standard 10 mother tongue speakers, they could clearly present considerable difficulties for Xhosa speaking pupils.

It has been explained that one of the main aims of this research study was to see how adequately the pupils were able to comprehend a text considerably simpler than anything they might find in their prescribed textbooks. If difficulties were still found with this simpler material, then adequate teaching and understanding of secondary school history becomes almost impossible. Table 4.4 shows the results of applying the same reading difficulty texts to the passage.

<u>SMOG READING AGE</u>	<u>FOG AMERICAN GRADE LEVEL</u>	<u>FLESCH READING EASE SCORE</u>	<u>APPROXIMATE READING AGE FROM FLESCH FORMULA</u>
14	8.9	80	11.5

TABLE 4.4
DIFFICULTY LEVEL OF THE COMPREHENSION PASSAGE

The results for the 'slave' text indicate that the material is written for approximately the standard 6 and standard 7 levels. This is far easier than what the pupils work on in standard 8 and standard 10. It is also worth noting the high reading difficulty levels of the pupils' textbooks in contrast to the much lower reading level of the test passage.

One other feature of reading difficulty level which is not taken into account in the difficulty indices used in this study, is the type of sentence used. The comprehension passage consisted of 38 running sentences (excluding the captions to maps and illustrations or the wording in the two tables).

No	<u>SENTENCE TYPE</u>			
	<u>Simple</u>	<u>Compound</u>	<u>Complex</u>	<u>Compound-Complex</u>
	17	7	12	2
<u>TOTAL</u>				38

TABLE 4.5
VARIETY OF SENTENCE TYPES IN THE TEXT PASSAGE

None of the complex sentences contained more than one subordinate clause. It can therefore be claimed that in this respect, as well as in sentence length and in the number of long words, the passage met the criterion of comparative simplicity.

The first part of this research study therefore has shown that the school textbooks are likely to make very high demands on second language speakers. The text passage, on the other hand, has been deliberately set at levels approximately two years below standard 8 and four years below standard 10. In normal circumstances both literal and interpretative questions on the passage should produce high scores for both the standard 8 and standard 10 pupils.

It now becomes possible to examine the results of the pupils' test.

The first point that should be noted from Table 4.6 is the comparatively poor performance by the pupils despite the reasonably simple level of difficulty of the passage. Both groups, whether they answered in English or Xhosa, were able to score only a little over one quarter of the maximum marks. The second point is that the average scores for the English and Xhosa groups were very similar. At this standard there seems to be little advantage for pupils' writing their answers either in English or Xhosa. It might be argued that either the passage or the questions or both proved difficult for these pupils.

MAXIMUM SCORE : 80						
RANGE	SCHOOL A		SCHOOL B		TOTAL	
	ENG	XHOSA	ENGLISH	XHOSA	ENGLISH	XHOSA
1-5	-	-	-	-	-	-
6-10	4	2	4	5	8	7
11-15	2	5	10	6	12	11
16-20	9	9	10	9	19	18
21-25	8	7	8	9	16	16
26-30	7	6	4	9	11	15
31-35	7	8	1	1	8	9
36-40	1	2	1	-	2	3
41-45	1	1	2	-	3	1
46-50	1	-	-	-	1	-
No.	40	40	40	40	80	80
Mean raw score	24	24,5	19,9	20,5	21,95	22.49
Mean %	30	34,9	24,9	25,6	27.44	28.11
Standard Deviation	9,186	8,533	8,748	7,507	9,154	8,245

TABLE 4.6
FREQUENCY TABLE - RAW SCORE RESULTS - STANDARD 8

The next point is that the pupils in school A apparently did better than pupils in school B. This reflects the better background circumstances of the pupils in school A. It can also be seen that school A produces a slightly greater advantage for those answering in English. This difference is much smaller in school B. In the total scores where both schools are combined, the percentage difference is only about 0.5%. It is now necessary to look at the raw scores obtained by the standard 10 pupils.

As was to be expected, the standard 10 pupils, whether answering in English or Xhosa, scored better than the standard 8 pupils. It is, nevertheless, worrying to find that in comprehending material appropriate for the lower end of junior secondary school, these standard 10 pupils are able to score on average less than 50% for those who answered in English and on average just over one third of the total marks for those who answered in Xhosa.

RANGE	SCHOOL A		SCHOOL B		TOTAL	
	ENGLISH	XHOSA	ENGLISH	XHOSA	ENGLISH	XHOSA
1-5	-	1	-	-	-	1
6-10	1	1	-	1	1	2
11-15	1	7	3	3	4	10
16-20	3	7	4	13	7	20
21-25	2	11	6	5	8	16
26-30	11	8	9	14	20	22
31-35	11	7	13	11	24	18
36-40	7	10	15	9	22	19
41-45	16	4	8	3	24	11
46-50	2	3	-	-	2	3
51-55	2	1	1	1	3	2
56-60	2	-	1	-	3	0
61-65	2	-	-	-	2	-
No.	60	60	60	60	120	120
Mean raw score	36,4	27,9	32,2	27,9	34,32	27,9
Mean %	45,5	34,9	40,25	34,9	42,9	34,9
Standard Deviation	11,056	10,933	9,346	8,696	10,403	9,909

TABLE 4.7
FREQUENCY TABLE - RAW SCORES - STANDARD 10

One striking result from this table is that the Xhosa pupils in the two schools have the same mean raw score. Unlike the standard 8 results where school A pupils were slightly better than school B pupils, a larger difference is found in the pupils' scores achieved by the English pupils of just over four raw score points (5% points). The slightly more favourable circumstances in school A in terms of exposure to English could explain this difference. When the results of the two schools are combined, raw scores favour the English group by over six raw score points (8% points).

It should be remembered that the standard 10 pupils have been exposed to English for two more years than the standard 8 pupils. They have also read the passage in English and might have found it easier to use the English vocabulary and concepts rather than having to translate from English back to their mother tongue. It should finally be noticed that the standard deviations for both the English and Xhosa results for both standard 8 and standard 10 pupils are high. This means that the distribution of pupils' scores is very wide.

Differences and similarities between the performances of pupils answering in English and Xhosa have been examined. It is of course not possible to say whether any differences are statistically significant, that is, in how many cases would differences as great or greater than those observed have occurred by chance. To assess this, 't' tests were applied.

<u>STANDARD 8</u>	<u>MEAN RAW SCORES</u>	<u>S.D.</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
English	21,95	9,15	-	Not significant
Xhosa	22,49	8,45	0,29	
STANDARD 10				
English	34,32	10,10	-	Significant at 0,1%
Xhosa	27,9	9,91	4,87	
No. 160				
No. 240				
('t' test results at 5%, 1% and 0,1% levels of significance = 1,96; 2,58 and 3,3).				
TABLE 4.8				
'T' TESTS RESULTS - RAW SCORES - ALL PUPILS				

In standard 10 the difference favours the pupils answering in English. There is no significant difference between English and Xhosa in standard 8 but it would have been unlikely to have found any when the standard 8 mean raw scores are as close as 21,95 and 22,49. It is therefore possible to state again that answering such a comprehension test in English or Xhosa will not necessarily favour either language at the standard 8 level. In contrast the English Xhosa standard 10 average marks produce a highly significant difference where a 't' value of 4,87 is well beyond the 3,3 level necessary for significance at the 0,1 level.

By standard 10 the pupils are clearly able to handle English better, and not having to translate their answers back into Xhosa might have benefitted the English pupils. Once again, however, it must be stated that, although the English pupils did better, they were still not able to score sufficiently well to bring the average result up to a 50% mark.

't' Tests were also applied to find out if there are any significant differences between the schools, as some fairly big differences were noted between

school A and school B. By examining the raw scores and percentages in Table 4.9 the difference between the mean percentages for the standard 8 pupils in schools A and B was about five percentage points and a similar difference was found between the Xhosa mean percentages for the two schools. Table 4.9 shows the 't' values obtained for the standard 8 scores.

<u>STANDARD 8</u>	<u>MEAN RAW SCORES</u>	<u>S.D.</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
<u>ENGLISH</u>				
School A No. 40	24	9,186	2,018	Significant at 5% level
School B No. 40	19,9	8,748		
<u>XHOSA</u>				
School A No. 40	24,5	8,533	2,198	Significant at 5% level
School B No. 40	20,5	7,507		
('t' value at 5%; 1%; 0,1% levels of significance = 1,96; 2,58 and 3,3)				
<u>TABLE 4.9</u>				
<u>'T' TEST RESULTS - RAW SCORES - DIFFERENCES BETWEEN SCHOOLS</u>				

There is a significant difference in both English and Xhosa results and in both cases it is in favour of school A.

A similar set of 't' test applications was made for the standard 10 results as is shown in Table 4.10.

There is a significant difference at 1% level in favour of school A in English. It is immediately clear that school A is significantly better than school B in three of the four comparisons reflected in the two tables. The only non-significant difference between the two schools at the standard 10 level concerns pupils answering in Xhosa.

<u>STANDARD 10</u>	<u>MEAN RAW SCORE</u>	<u>S.D.</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
<u>ENGLISH</u>				
School A No. 60	36,4	11,056	2,58	Significant at 1% level
School B No. 60	32,2	9,346		
<u>XHOSA</u>				
School A No. 60	27,9	10,933	0	Not significant
School B No. 60	27,9	8,696		

TABLE 4.10
'T' TEST RESULTS - STANDARD 10

The difference in the backgrounds of the pupils in the two schools might be an explanation of the results, as has already been suggested. Even though differences between the schools were found, however, this does not affect the implications of the poor levels of performance found in both languages in both schools and in both standards.

Differences between the two schools in three of the four comparisons have been shown to be significant when performances in English are compared and when performances in Xhosa are compared. Because of the school differences it is necessary to discover whether the differences between the English and Xhosa scores are significant within each school. Table 4.11 shows the results of these 't' tests.

The results are worth considering briefly. In three of the four cases no significant difference was found. This lack of significance occurred in both schools' performances at the standard 8 level, and in school A's performance at the standard 10 level. The only significant difference (although it was as great as the 1% level) occurred between school B's pupils answering in English and Xhosa.

<u>STANDARD 8</u>	<u>MEAN RAW SCORES</u>	<u>S.D.</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
<u>SCHOOL A</u>				
English	24	9,186	0,251	Not significant
Xhosa	24,5	8,533		
<u>SCHOOL B</u>				
English	19,9	8,748	0,325	Not significant
Xhosa	20,5	7,507		
<u>STANDARD 10</u>				
<u>SCHOOL A</u>				
English	36,4	11,056	1,423	Not significant
Xhosa	27,9	10,933		
<u>SCHOOL B</u>				
English	32,2	9,346	2,587	Significant at 1% level
Xhosa	27,9	8,696		
('t' value at 5%; 1% and 0,1% levels of significance = 1,96; 2,58 and 3,3)				
<u>TABLE 4.II</u>				
<u>'T' TEST RESULTS - RAW SCORES - DIFFERENCES WITHIN SCHOOLS</u>				

The difference favoured the English scores. Clearly the significant difference found in Table 4.10 between all English and Xhosa pupils at the standard 10 level has been largely influenced by the pupils in school B. This effect was not exclusively the result of school B scores because the 't' value for school A's English and Xhosa results (1,423) while not significant itself, was approaching the 5% of significance at 1,96.

It is often argued that black pupils' results in secondary schools are affected by the struggle to work in a second language. As far as the results from this investigation are concerned, it has been shown that in many cases there are significant differences between the pupils' performance in English and in Xhosa. One possibility, therefore, is that it is the comprehension of English that is causing the pupils' difficulties. It will be remembered that the comprehension was presented to all pupils in English.

There is, however, another possibility that needs to be explored. Were the pupils hampered more when they had to answer the questions needing interpretation rather than questions which simply required them to select information directly from the text - the so-called literal questions? It was therefore decided to divide the questions into two broad types.

- 1 **Literal questions.** An example of a literal question where the answers are directly found in the passage is question 1:

"What is a slave?"

Out of the sixteen questions set, six were regarded as literal questions. The maximum score for these questions was 24 marks. It will be remembered that the full set of this type of question consisted of questions 1, 2, 4, 6, 7 and 12.

- 2 There were also a number of **interpretative questions.** Here the pupils were expected to use their own comprehension skills to select material from different parts of the text or to give their own opinions. An example is question 13:

"Give three words which you could use to describe a country which allowed slavery."

Another example is question 3 where the pupils had to think about the quality or implications of different kinds of work done by slaves. Ten such questions were set with a maximum score of 56 marks.

By making comparisons between schools and standards when the literal and interpretative scores were separated, it might be possible to see if language problems were significantly greater when pupils had to think independently and create more extended answers either in their mother tongue, Xhosa, or in their second language, English.

Table 4.12 shows the raw scores expressed as percentages for each of the two schools in each of the two languages when the literal and interpretative results were calculated separately.

<u>SCHOOL</u>	<u>STANDARD 8</u>		<u>STANDARD 10</u>	
	<u>A</u>	<u>B</u>	<u>A</u>	<u>B</u>
Literal				
English	52,9	52,4	71,55	68,12
Xhosa	46,9	44,7	54,8	59,6
Interpretative				
English	20,2	19,98	34,30	34,30
Xhosa	23,8	17,4	35,6	24,4

TABLE 4.12
MEAN PERCENTAGE SCORES FOR LITERAL AND INTERPRETATIVE QUESTIONS

By examining this table we notice that the performance is clearly better for the literal than for the interpretative questions. It is the interpretative questions that have brought the pupils' marks down. Some of the implications of this table need to be noted before the results of significance tests are presented. It is immediately clear that the percentage scores are often twice as good for the literal as opposed to the interpretative questions. For instance, in school B, standard 8, the percentage mark is almost three times better than its interpretative mark (52% and 19%). One possibility for this big difference is that the children, regardless of the language in which they are writing, are not used to answering questions which require interpretation.

When the percentage scores for the English and Xhosa pupils are compared for the literal questions, the English pupils constantly score better, and at times by quite a wide margin. The narrowest margin (6 percentage points) is found between the scores for school A's standard 8 pupils. The widest margin is between the English and Xhosa performance of the standard 10 pupils in school A (nearly 17 percentage points). The differences are not as clear when the interpretative results are examined. In both cases in school B the English scores are slightly better than the Xhosa scores, but in both cases for school A Xhosa pupils scored very slightly better than the English pupils. The small differences must be seen in relation to the generally poor performance in both languages when the pupils are faced with interpretative questions.

With the percentage differences that we found in Table 4.12, however, it was essential that tests of significance should be applied to these results. Table

4.13 shows the 't' test results of four analyses when all the pupils are considered together, and the English scores are compared with the Xhosa scores.

<u>STANDARD 8</u>	<u>MEAN % SCORE</u>	<u>S.D.</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
Literal				
English	52,84	13,68	3,30	Significant at 0,1% level
Xhosa	45,39	14,69		
Interpretative				
English	20,09	12,68	2,06	Significant at 5% level
Xhosa	20,64	11,90		
<u>STANDARD 10</u>				
Literal				
English	70,09	14,45	5,93	Significant at 0,1% level
Xhosa	56,76	17,64		
Interpretative				
English	31,45	15,42	3,29	Significant at 1% level
Xhosa	25,15	13,66		
('t' value at 5%; 1% and 0,1% level of significance = 1,96; 2,58 and 3,3).				
<u>TABLE 4.13</u>				
<u>'T' TEST RESULTS IN PERCENTAGE SCORES - ALL PUPILS - LITERAL AND INTERPRETATIVE SCORES</u>				

It can be seen that all the differences in performances are significant. The direction of significance is not, however, consistent. In one case (standard 8 interpretative results), the Xhosa pupils do better than the English pupils. In the other three cases, however, the difference always favours the English pupils. This result is somewhat similar to that found when the total test results were analysed. The smaller experience of the standard 8 pupils with English could explain why the Xhosa pupils had an advantage over the English pupils when handling interpretative questions.

When the total test scores were analysed for differences between the two schools, some significant differences were found, and these suggested that school A produced better performances than school B. It would therefore be important to examine the differences between school performances when the literal and the interpretative questions are separated.

Table 4.14 shows the results of the 't' tests applied to the schools when the schools are separated.

<u>STANDARD 8</u>	<u>MEAN % SCORE</u>	<u>S.D</u>	<u>'T' VALUE</u>	<u>SIGNIFICANCE</u>
Literal				
School A				
English	52,9	13,84	1,77	Not significant
Xhosa	46,9	15,99		
School B				
English	52,04	23,5	1,97	Significant at 5% Level
Xhosa	44,57	13,22		
Interpretative				
School A				
English	20,2	12,96	1,97	Significant at 5% Level
Xhosa	23,88	12,74		
School B				
English	12,98	11,45	1,75	Not significant
Xhosa	17,4	10,72		
<u>STANDARD 10</u>				
Literal				
School A				
English	71,55	15,76	5,78	Significant at 0,1% level
Xhosa	54,84	17,50		
School B				
English	68,1	13,39	1,37	Not significant
Xhosa	59,6	17,34		
Interpretative				
School A				
English	34,30	13,39	2,92	Significant at 1% level
Xhosa	25,89	17,34		
School B				
English	28,4	13,88	1,65	Not significant
Xhosa	24,4	12,33		
('t' test results at 5%; 1% and 0,1% levels of significance = 1,96; 2,58 and 3,3).				
<u>TABLE 4.14</u>				
<u>'T' TEST RESULTS - PERCENTAGE SCORES - LITERAL AND INTERPRETATIVE SCORES - DIFFERENCES BETWEEN SCHOOLS</u>				

It can be seen that the pattern found when the total test results were analysed is repeated when the school results are considered separately. In six out of the eight comparisons the mean percentage score for the English pupils is better than that of the Xhosa pupils. The six cases include all four results for standard 10 pupils and the two results for the literal scores for both schools at the standard 8 level. These differences are greatest in standard 10, when the literal results are considered. The differences are much smaller when the interpretative scores are examined. The English pupils had an advantage but a comparatively small one over the Xhosa pupils for literal questions at the standard 8 level. When the interpretative scores at the standard 8 level are examined, however, Xhosa pupils do better than the English.

When the 't' values are examined, four of the eight differences achieved significance with two of these at the highly significant level of 1% or 0,1%. Two of the results that are significant, but only at the 5% level, occur when the standard 8 results are examined. It has already been found that the differences in performance between the English and the Xhosa pupils are much smaller at the standard 8 level. It might be worth noting, however, that two of the 't' values (1,77 and 1,75), although not significant, are approaching the 5% level of significance of 1,96.

The results are, as was found before, not as clear cut in standard 8 as they are in standard 10. In the former case, in both school A and school B, the literal marks favour English, with no difference at 1% level. Xhosa is favoured for interpretative scores, with significant difference at 5%. When the two schools are combined, English is better than Xhosa at literal scores. Xhosa is better than English at interpretative scores and both differences are significant. This means that although the pupils generally show some reluctance in answering in Xhosa a passage written in English, they are better able to express their opinions in Xhosa than in English at the standard 8 level.

This chapter has shown the generally poor performance of the pupils in the test as a whole. Within this poor performance the pupils answering in English tended to do better than the pupils answering in Xhosa at the standard 10 level. At the standard 8 level, however, the differences in performance are not as clear. It was found, however, that there were differences between the two schools. When these differences were analysed, the differences reached significant levels in some cases. The broad tendency of the results, however, continued to be similar to those found when all the pupils were considered together.

Once again, this same pattern tended to emerge when the pupils' results were analysed in terms of their scores on literal and interpretative questions, which, whether they were in standard 8 or standard 10, contributed in a very important way to their total result. Such results might suggest that the pupils' difficulties might partly have been caused by the fact that they had had little experience in answering such questions. In the next chapter an attempt will be made to examine the quality of the pupils' writing and the kind of errors they made.

CHAPTER FIVE

QUALITATIVE RESULTS

In marking the comprehension test it became clear that one of the factors that brought the pupils' marks down was the errors or mistakes they made. Corder (1973, p. 256) claims that all learners make mistakes. From the study of the learners' errors, however, we are able to infer the nature of their knowledge. By describing and classifying their errors we build up a picture of the features of the language problems. Look, for instance, at a pupil's response which reads: "I was to steal his gun and shot him." In this case we can say the pupil has selected the wrong tenses for the verbs he has used. Therefore, he has not yet mastered the tense system of English. He should have said: "I would steal his gun and shoot him."

Corder (1973, p. 258) says that in such cases we should try to identify the errors by comparing what the pupil actually said with what should have been said to express what was intended to be expressed. In other words, we try to compare the erroneous utterances with what a native speaker would have said to express meaning.

In this thesis, the word used throughout is "error" rather than "mistake", as a mistake can be usefully defined as something that the maker can recognise as being wrong. An error is a fault that is not recognised as such.

This chapter has to be divided into two major parts. The first section will be concerned with the kinds or categories of errors that the pupils who wrote in English made. The second section will examine the types of errors made by those pupils writing in Xhosa. Finally, a brief discussion will be presented on the quantitative nature of the errors and on the comparisons and contrasts between English and Xhosa problems.

It was possible to identify seven frequently recurring errors in the pupils' English writing. These will be presented in roughly a descending order of frequency. It was not always possible, however, to make a precise frequency table of the errors for at least two reasons. The first is that within an answer or part of an answer, a number of errors could be found. Two examples can

be given: "Because this farming want many slaves because it supposed to finish it (wine) in time." This answer was given to the question on why farming in the Eastern Cape might need a large or small number of slaves (Question II). There are at least five errors in this response:

- (a) "want" instead of need (incorrect verb choice).
- (b) "want" instead of wanted or needed (incorrect tense).
- (c) Omission of "was" in the phrase "because it supposed" (error in auxiliary verb).
- (d) "supposed" instead of necessary (incorrect verb choice).
- (e) "finish it in time" (unrelated pronoun).

The second example comes from the same question. This pupil wrote: "Its because there must slaves who responsible for removing weeds and harvesting, and the must those who are threshing and made the soil fertile." In this example there are at least five errors:

- (a) : "Its" instead of It's (incorrect punctuation).
- (b) "must slaves" omission of be (error in the verb to be).
- (c) "slaves who responsible" instead of who are or would be responsible (error in the verb to be).
- (d) "and the must those" instead of there must be those (spelling error and error in verb to be).
- (e) "threshing and make the soil fertile" instead of threshing and making the soil fertile (incorrect and inconsistent use of the present participle).

Several of these examples show how difficult it is to allocate precisely an error to a particular category.

The second problem about doing an accurate frequency count is that it is not always possible to determine what structural form the pupil was trying to use. A particularly complicated example of this problem can be seen in the

following answer: "If a person were not working or have a case then judge sell that person." The most likely explanation for these errors is that the pupil did not understand that "a person" is singular and therefore the plural verb "have" is incorrect. Another possible reason is that the pupil used "were", reflecting the conditional case. The pupil might then have been influenced by the word "were" as the plural by writing "have" instead of has even though the subject (person) is singular.

These two examples show a number of errors in verb formation and it is, therefore, not surprising that verb errors have to be placed at the top of the list in Table 5.1.

As indicated in number 3, there are cases where thoughts were transferred or translated literally from Xhosa to English. This is sometimes referred to as mother tongue interference. Corder (1981, p. 24) explains this as a case where the learner is carrying over the habits of the mother tongue into the second language. For example, "They are not educated for factory task, they want farm task." In Xhosa the word "funda" means to be educated whether it is formal education or a training for vocational work; the word "umsebenzi" refers to work, job, or task. He wanted to say: "They were not trained to work in industry and could only work on the farms".

Other examples of language interference are:

- 1 "It is because of modern methods which need no vast of workers." In Xhosa one word, "ninzi", means a lot, many, quite a few or plenty. He wanted to say: "It is because modern methods make it unnecessary to have a lot of workers."
- 2 "Because the farms are not only one." The Xhosa word "inye" means "one". It is accepted in Xhosa to use the term "ayinyanga"; it is not only one when you actually mean there are quite a number or a few of them.
- 3 "England is the most prosperous and is the most wealthy in the world." It is acceptable in Xhosa to say it is the most prosperous and it is the richest. There is only one word, "tyeba", for rich, wealthy and well off."

1	VERBS	(intrusion and omission especially of auxiliary verbs; consistency of verb formation throughout the sentence; number; verb accuracy and consistency; and incorrect use of participles)
2	PRONOUNS	(incorrect usage; intrusion and omission)
3	MOTHER TONGUE INTERFERENCE	
4	PUNCTUATION AND OMISSION	
5	PREPOSITION ERRORS	
6	ADJECTIVAL ERRORS	(particularly when creating adjectives from nouns)
7	ERRORS IN THE FORMATION OF NOUNS	(particularly abstract nouns and at times confusion between singular and plural)

Some typical examples of each of these types of errors can now be given:

- 1 "their cattle could not died" (omission of auxiliary verb)
or "all slaves was work hard." (incorrect number and participle).
- 2 "some slaves they rebel." (intrusive pronoun)
or "clothes which they don't have money to buy them." (intrusive pronoun)
- 3 "They are not educated for factory task, they want farm task."
(explained above)
- 4 "Others may look after goats others may milked the cows others may share the sheep the wool." (punctuation marks omitted)
- 5 "To hoe the land by the spades." (preposition error)
or "I would beg for help to the trade union." (preposition error)
- 6 "They are ignorance and non-professional." (adjectival error)
- 7 "They need food to eat and so they get slavery."
or "They were doing hardworking." (noun formation errors)

TABLE 5.1
APPROXIMATE FREQUENCY OF ERRORS IN ENGLISH SCRIPTS

In many of these examples it is possible to determine the pupils' meaning despite the errors. Such mistakes must not be confused with examples where

the pupil has clearly failed to comprehend the passage itself. Several examples of this occurred in answers to question 1 about the meaning of a slave. To some pupils a slave was a poor person who had to accept any kind of work for low wages in order to support his family. To others, a slave was an oppressed black labourer under the system of apartheid, while to yet others slaves were people who were forced by poverty to leave their countries to get work elsewhere and were exploited by their employers.

Language errors must also not be confused with situations where the pupils' writing is so poor that it becomes impossible even to guess what is meant. These kinds of problems fall into two types: Type A, where the pupils write sentences whose meaning is not clear and can only be guessed at. Example: "I can just to see whether the master is and I can just try to run away." (Question 15). The intended meaning might be: I will just make sure that the master is out of sight and then try to escape. Type B, where the sentence is so wrong as to be meaningless. An example is: "They want to help our bodies although the slave owners made them slaves and the slave owners where poor." This is supposed to be an answer to question 13, which reads thus: Give three words which you could use to describe a country which allowed slavery. Apart from language or spelling mistakes, the sentence does not make sense and is completely irrelevant to the question. Here are other examples of this type:

- 1 "When the country were no military for the defenced to another country or state they easily owned as slaves."
- 2 "Because of the most workers in our homes."

The third part of this chapter comprises an attempt to give a rough estimate of the frequency of errors produced by the sample of pupils. In the first instance the English scripts were isolated and the answers to the interpretative questions were examined. A total of 73 examples was extracted. An example was counted once, regardless of the number of errors in the particular example. It will be remembered how many cases showed multiple errors in several different categories when the English scripts were analysed. The examples, as already mentioned, were divided into two broad categories: Type A - where, despite the errors, it was possible to understand what the pupil had written; and type B, which comprised those answers which were incomprehensible to the researcher. Exactly the same procedure was followed when the Xhosa scripts were examined.

	<u>TYPE A</u>	<u>TYPE B</u>
<u>ENGLISH</u>		
Standard 8	24	16
Standard 10	20	13
<u>XHOSA</u>		
Standard 8	14	11
Standard 10	13	6

TABLE 5.2
ERRORS AND COMPREHENSIBILITY - ALL PUPILS

The table shows that more errors of both types occurred in the English answers than in the Xhosa answers.

It also emerged that some pupils did not even attempt to answer certain questions, especially those where extended interpretative writing was demanded. It could be assumed that their comprehension skills collapsed completely when they had to give full explanations or express their opinions in their own words. Table 5.3 shows, for each of the interpretative questions, the number of Type A and Type B errors made, as well as the number of pupils who did not answer that particular question at all.

In looking at the figures presented for Type B errors (where the response was incomprehensible) it is alarming to note the comparatively large number of such answers and even more worrying to note that the standard 10 pupils did not do significantly better than the standard 8 pupils. Equally worrying is the large number of cases where Type A errors (of grammar or structure) occurred, remembering that for each case there were likely to be many errors contained in one single pupil's answer.

STD	QUESTIONS	ERRORS		QUESTION NOT ANSWERED
		TYPE A	TYPE B	
8	5	8	6	9
	8	-	-	-
	11	5	3	9
	14	1	-	7
	15	8	7	9
	16	2	-	20
TOTAL		24	16	54
10	5	7	4	6
	8	-	3	-
	11	3	-	5
	14	-	1	5
	15	6	4	8
	16	2	1	19
TOTAL		18	13	43

TABLE 5.3

COMPREHENSION ERRORS IN INTERPRETATIVE QUESTIONS IN ENGLISH - ALL PUPILS

The possibility has frequently been mentioned in the thesis that pupils would find it very difficult to generate their own extended answers to questions in a language which was not their mother tongue. This possibility would seem to be confirmed by this table. In standard 8 there was a total of forty cases where either Type A or Type B errors in answering six interpretative questions occurred. In contrast to this, in fifty-four cases no answers could be given at all to interpretative questions.

When examining the standard 10 analysis the same pattern can be seen. There was a total of thirty-one situations where Type A or Type B errors occurred, but as many as forty-five situations where no answer was given.

Question 13 did not require an extended answer but forced the pupils to interpret the information contained in the passage. The question asked for three words which could be used to describe a country which allowed slavery. The problem answers to question 13 are shown in Table 5.4.

<u>STANDARD</u>	<u>ERRORS</u>		
	<u>TYPE A</u>	<u>TYPE B</u>	<u>NO ANSWER</u>
8	-	1	21
10	2	-	22
<u>TOTAL</u>	2	1	43

TABLE 5.4
COMPREHENSION ERRORS IN QUESTION 13 - ENGLISH PUPILS

As could be expected, there was one Type B (incomprehensible) error, and in only two cases were there structural errors in the words chosen. There were, however, a large number of cases where no attempt was made at all to answer the question. Two possible explanations might account for these high figures. The first is that the pupils found difficulty in understanding the question or the relevant parts of the passage. The second possibility is that they did not have the vocabulary to suggest words which might mean: merciless, ruthless, inhuman, cruel, which would be acceptable answers to the question.

It is important to look also at the grammatical errors made by the pupils writing in Xhosa. The written form of Xhosa, as is the case with many languages rooted in traditionally oral cultures, owes its beginnings to the general interest in missionary work which swept through Europe at about the end of the eighteenth century. The London and Glasgow Missionary Societies as well as other denominations had a great impact on the literary development of Xhosa in the Eastern Cape. These missionaries, all of whom represented one or other of the Protestant denominations, realised from the onset that the conversion of the Xhosas to Christianity would have to go hand in hand with instruction in reading and writing.

Shortly after the arrival of the 1820 Settlers, the Wesleyan missionaries who worked in the Peddie/Grahamstown area had the same objective, namely, to

teach the Xhosa people to read and write their own language so that the word of God could be conveyed to them in the language they understood. The establishment of the printing presses at various mission centres of the Eastern Cape during the nineteenth century also assisted greatly in the development of Xhosa in its written form. As a result of the grammatical works of John Bennie, Boyce, Davis and Appleyard, the way was opened for the scientific study of Xhosa (Doke, 1959, p. 8). The publication of school readers was another educational benefit derived from the development of Xhosa in its written form. The first printed Xhosa grammar was published by the Methodist Missionary, Rev William Boyce. His **Grammar of the Kaffir Language** (1934) had a great impact on the study of the Xhosa language.

Makalima (1981, p. 77) points out that the teaching of reading from the nineteenth century Xhosa texts succeeded in laying a foundation for the promotion of literacy among the Xhosa people. But from the didactical point of view, the strategy for the teaching of Xhosa reading left much to be desired. The introduction of full sentences and meaningful topics or paragraphs was delayed until a very late stage in the first Xhosa readers. This method of delaying the introduction of meaningful reading deprived the pupils of the opportunity to develop comprehension skills in reading. Children who are drilled on meaningless syllables and words are not provided with the means to make the words come to life in an attractive and meaningful context (Makalima, 1981).

Many of the errors by the Xhosa group in the comprehension test in this study are due to the pupils' failure to use the formal and accepted Xhosa words. This resulted in the wrong forms of verbs, concords, pronouns and auxiliary verbs being used. Instead of using the Xhosa word for slave which is "iKhoboka" (class 6), they referred to them as "islave", which falls into class 8 in Xhosa. In some instances both the English and the Xhosa forms have been used within one sentence. This resulted in the use of different concords and pronouns to refer to the same word. Example: "Babewasebenzisa nzima kwaye zona zazingenandlela yokubaleka." The underlined "wa" is an objectival concord which refers to the Xhosa word "iKhoboka", but "zo" in the pronoun "zona" as well as "zazi" in the next verb refer to the English word "slave".

Another type of error concerned the use of nouns and wrong concords - "Awanayo imvume yokuba bafumane imisebenzi." In this sentence "a" agrees

with a class 6 noun (amaKhoboka) but the concord "ba" agrees with a class 2 noun which is not in the sentence.

"Abanye baye baze bazinikezele". Both underlined words are incomplete verbs. In this case only the first one should have been used.

"Ngoba zazinintsi intsimi zediliya." "intsimi" is a wrong form of the plural noun and its use has resulted in the use of the wrong concords.

There were many examples of structural errors:

"Amakhoboka aye engacenga" - 'slaves could not plead' - he wanted to say slaves were given rough treatment but the suffix 'wa' has been omitted in the formation of the passive verb.

"yilonto" - two parts of speech combined i.e. a copulative and a noun - means 'that is why'.

"Uzakubangela" - 'it will result in'. There are two parts of speech i.e. 'uza', which is an auxiliary verb in the future tense used with an infinitive verb.

"Kengoku" - two words in Xhosa which mean 'now then'.

Other examples where word division had been ignored:

"Ababantu" - these people (two words).

"Kulamazwe" - in these countries (two words).

Other language errors occurred where the pupils used words borrowed inappropriately from English, Afrikaans and Zulu. For instance:

"Kukuthi wenza into" - Zulu.

"bayawadinga amakhoboka" - Zulu.

"Kuba ubhatala imali" - borrowed from an Afrikaans word - betaal - 'because you have to pay with money'.

"babesebenza igangs" - 'they worked in groups'.

"babefela kwi voyage" leyo - 'they died on the voyage'.

"babengena tshansi" - this word is the Xhosa version of 'chance' but there is a Xhosa word - "ithuba".

Zulu, together with Xhosa, Swazi and Ndebele, all belong to the Nguni group. All these languages are, therefore, related. Work situations have brought the Xhosas and the Zulus into contact with each other and this has had an impact on the two languages. Xhosas who work in the mines and industries often come back using a lot of Zulu words which are copied by the children. Some tend to regard it as a sign of sophistication that they speak a mixture of Xhosa and Zulu. The Zulu used on television has also affected Xhosa.

Xhosas work on the mines, on white owned farms and in the industrial cities. They are therefore forced by circumstances to learn English and Afrikaans, the languages of their masters. This situation has led to many Afrikaans and English words becoming modified and incorporated into Xhosa. Examples: "bhetele" for better or beter; ipeni for pen; isitulo for stoel; eketile for kettle. Another factor which might have caused the pupils to use more English words in this context is because the passage and the questions were in English. Pupils failed to readily recall the Xhosa equivalents of the English words in the passage, as in the case of 'iships' and 'ivoyage'.

At the end of the section on English errors distinctions were made between Type A (structural but comprehensible) errors and Type B (incomprehensible) errors, where it was impossible to determine what the pupil meant. A similar analysis was made of the Xhosa errors as shown in Table 5.2. When the table is re-examined, the greater incidence of English than Xhosa errors can be seen. Nevertheless, the examples of Xhosa errors of both types are considerable. A separate question by question analysis of the six interpretative questions was made from the Xhosa papers as was done for the English papers.

As was the case with the English papers, the number of "no answer" examples exceeded the Type A and Type B errors.

STD	QUESTIONS	<u>ERRORS</u>		
		<u>TYPE A</u>	<u>TYPE B</u>	<u>QUESTION NOT ANSWERED</u>
8	5	2	1	
	8	-	-	1
	11	1	3	1
	14	2	-	3
	15	1	1	8
	16	3	2	14
<u>TOTAL</u>		9	7	27
10	5	3		1
	8	-		1
	11	2	1	1
	14	-		3
	15	1	-	8
	16	3	2	14
<u>TOTAL</u>		9	3	28

TABLE 5.5
COMPREHENSION ERRORS IN INTERPRETATIVE QUESTIONS IN XHOSA -
ALL PUPILS

It is clear, however, that there were fewer Type A and Type B errors in the Xhosa than there were in the English scripts. When the marks allocated to the pupils' scripts were analysed statistically in chapter 4, no consistent advantage for the Xhosa pupils emerged. The advantage seems to come in the smaller number of structural or grammatical errors that the pupils made. This, allowing for the fact that they are writing in their mother tongue, is understandable. Similar concern, however, must be expressed about the large number of no answer examples found in the Xhosa scripts, as was expressed about the English scripts.

Once again, the responses to Question 13 (three words to comment on a country that allowed slavery) need to be made as was done with the English analysis. A total of twenty-six cases occurred where no answer was given to question 13 at all, as can be seen in Table 5.6

<u>ERRORS</u>			
<u>STANDARD</u>	<u>TYPE A</u>	<u>TYPE B</u>	<u>NO ANSWER</u>
8	-	-	18
10	-	1	8
<u>TOTAL</u>		1	26

TABLE 5.6
COMPREHENSION ERRORS IN QUESTION 13 - XHOSA PUPILS

This is high and may have been caused by the difficulty the pupils might have had in translating appropriate words from English into Xhosa. The Xhosa scripts' 'no answers' occurrences were, however, fewer than those found in the English scripts (43 examples).

It can be noted that while there were no structural errors with literal questions in English, these errors (21 examples) were found in the Xhosa answers. The explanation for this could be that the English groups' answers to literal questions could be reproduced directly from the passage which is written in English. In the case of the Xhosa pupils' answers, translation problems could have intervened.

It has been pointed out on several occasion that there were big differences in the number and types of errors made in the English and the Xhosa scripts. The comparison is easier to follow if the results in the last four tables are combined into a single table. This is done in Table 5.7.

<u>ENGLISH</u>				<u>XHOSA</u>			
<u>QUESTIONS</u>	<u>TYPE A</u>	<u>TYPE B</u>	<u>NO ANSWER</u>	<u>TYPE A</u>	<u>TYPE B</u>	<u>NO ANSWER</u>	
Std 8	5	8	6	9	2	1	-
	8						1
	11	5	3	9	1	3	1
	14	1	7	7	2	-	3
	15	8	7	9	1	1	8
	15	2	-	20	3	2	14
<u>TOTAL</u>		24	16	54	9	7	27
Std 10	5	7	4	6	-	-	
	8	-	3	-	-	-	1
	11	3	-	5	2	1	1
	14	-	1	5	-	-	3
	15	6	4	8	1	-	8
	16	2	1	19	3	2	14
<u>TOTAL</u>		18	13	43	9	3	28

TABLE 5.7
COMPREHENSION ERRORS IN INTERPRETATIVE QUESTIONS
IN ENGLISH AND XHOSA - ALL PUPILS

The analysis of errors made in this chapter has not been a complicated or sophisticated one. What has emerged, however, suggests that more complex work on this aspect of the problem could be undertaken in the future. Another feature of the analysis is the pupils' difficulty with interpretative questions which emerged so clearly in this and in the previous chapter. The need for greater attention being paid to this aspect of teaching is shown clearly in this chapter. In the next and final chapter, a summary of the research and its findings will be given, together with some comments on the implications of the research.

CHAPTER SIX

CONCLUSION

This study set out to look into the problems encountered by black pupils learning history through the second language medium of English. The literature review on the issue focused on the various approaches to and theories of second language learning, on the problems of reading in English second language, the problems of comprehending an English text, as well as categories of comprehension levels. Attention was also paid to the problems presented by the difficulty levels of textbooks for second language learners, with special emphasis on their readability. A brief history of the question of medium of instruction for black pupils was also given.

A review of the theory on second language learning has revealed that this problem should not be regarded as being of concern to language teachers only, but as a problem across the curriculum. Content area teachers must be aware of language problems in the content area classroom situation. Reading is viewed as a process of acquiring information from the text. It is also an interactive process in which higher level processes (at sentence or paragraph level) interact with lower-level processes (at letter or word level). In this process prior knowledge is used to facilitate the simple recognition of words in order to achieve higher levels of interpretation. Other authors maintain that reading problems for second language learners are due largely to imperfect knowledge of the subject as well as to language interference from the native language.

On the issue of comprehending the text, some authors maintain that knowledge of the language of the text forms an integral part of the background knowledge required for full comprehension of the text. Comprehension may be divided into the following categories:

- 1 Literal comprehension.
- 2 Interpretation.
- 3 Critical reading; and
- 4 Creative reading.

Previous researchers have adopted techniques of analysis such as the qualitative and quantitative approaches. History textbook analysis researchers have concentrated largely on bias and prejudice. For this research textbook analysis, however, has stressed readability or the actual difficulty level of text. A brief review of some of the commonly used formulae was given.

The purpose of this study was to examine the problems of learning history through English in black Ciskei secondary schools. This was done through:

- 1 The assessment of the difficulty levels of history textbooks commonly used in Ciskei secondary schools and originally written with mother tongue speakers in mind.
- 2 The assessment of the comprehensive ability of the pupils when they had to answer questions on an English text which is deliberately written at a lower level of difficulty than that of the current secondary school texts. Comprehension scores of those who answered in English and those who answered in Xhosa as well as the quality of their answers were compared.

Six commonly used textbooks (two in standard 8 and four in standard 10) were assessed for difficulty using the Fog, Smog and Flesch formulae. A passage on the topic of slaves was devised to test the pupils' abilities to comprehend work on an unknown topic written for a lower level. This text was in English. Comprehension questions, in English, were set, based upon the question setting scheme of Merritt. A pilot testing was done in a standard 9 class after which necessary adjustments were made to the passage, the questions and the time.

The final version of the text was administered to 400 pupils drawn from two schools. This means that 60 pupils in standard 10 from each school answered in English and a further 60 pupils from each school in Xhosa. Forty standard 8 pupils in each school wrote in English and the same number in Xhosa. Pupils were selected on the basis of class test results to ensure that relatively closely matched pairs were allocated to the English and Xhosa tests. These samples were selected to reflect a wide range of achievement in history in the two schools.

In chapter four an analysis of the difficulty levels of the textbooks used in standard 8 and standard 10 in the Ciskei schools was done. The results of the analysis of the standard 8 textbooks indicated that the difficulty levels of both books are far beyond the mother tongue speakers and therefore even further beyond the second language speakers. In both textbooks the final results are above American grade 12, which is equivalent to our standard 10. Concerning the standard 10 texts, the results showed that although the reading levels of 17 and 18 are reasonably appropriate for standard 10 mother tongue speakers, they could clearly present considerable difficulties to Xhosa-speaking pupils. This analysis has therefore shown that the school textbooks are likely to make very high demands on second language speakers. When the same approach was used with the slave text it showed that the material is written for approximately the standard 6 and standard 7 level and therefore far easier than what the pupils get in standard 8 and standard 10.

When examining the pupils' test results it was disheartening to note the poor performance of the pupils despite the reasonably simple difficulty level of the passage. Both groups, whether they answered in English or Xhosa, were able to score on average only a little over a quarter of the maximum marks in standard 8. Although the standard 10 pupils did better than the standard 8 pupils, they were only able to score on the average less than 50% for the English group and on average just over 33% for those who answered in Xhosa. School A did better than school B, possibly because school A pupils are likely to be more exposed to English than those of school B.

'T' tests were applied to the test raw scores to determine the differences and similarities between the performances of pupils in English and Xhosa. The results showed that the difference in standard 10 is in favour of the pupils answering in English. There is no significant difference between English and Xhosa pupils' scores in standard 8. Standard 10 pupils can handle English better and the pupils are at an advantage if they do not have to translate their answers into Xhosa.

The scores on the test were then divided into those obtained on the literal questions and on those on the interpretative questions. Literal question scores were reasonably high (an approximately 50% average score in standard 8 and a range of between 54%, for Xhosa answers, and 70% for English answers in

standard 10). Only six of the questions, however, could be classified as literal. The scores for the remaining ten (interpretative) questions were extremely low (20% to 23% accuracy in standard 8 and approximately 35% in standard 10). The answers to these questions, in other words, largely accounted for the pupils' poor results.

In chapter five an analysis of the errors made by the pupils answering in both English and Xhosa was carried out. This analysis revealed that:

- (i) There are quite a number of language and grammatical errors occurring within one sentence in both languages.
- (ii) The frequency of these errors often makes it difficult to determine what the pupil actually wanted to say.
- (iii) There were cases where the pupils' sentences were so wrong as to be meaningless.
- (iv) The pupils' comprehension abilities with interpretative questions were very poor, suggesting that the generation of ideas in more extended prose was a poorly mastered skill, regardless of the pupils' language.
- (v) There were big differences in the number and types of errors made in the English and Xhosa scripts in the interpretative answers.

RECOMMENDATIONS

The implications of these findings are that history teaching in black schools is in a crisis. The level of second language competence among the pupils is bound to render them incapable of high quality work. The viewpoint still prevails that many black parents regard English, rather than the mother tongue, as a better medium of instruction for their children. Blacks are also forced by circumstances to study content subjects through the medium of a second language.

Because English is an international language and the language often used in commerce, industry and science, it should be used as a medium of instruction. Books in English form a storehouse of ideas and knowledge. It

also becomes impossible to imagine, in the foreseeable future, a time when textbooks and other reading material will be available in a black mother tongue with all the appropriate terms and concepts that must be translated and coined because as yet they do not exist. Therefore, the English language is bound to remain the medium of instruction in the future in most if not all black schools in South Africa, including those of Ciskei.

It is a fact that a good command of English is of vital importance in the teaching of history in black schools. To improve on the poor performance of the pupils in history it is recommended that there should be co-operation by all groups concerned in the writing of textbooks to produce material suitable to the level of language competence of the black English second language learner. This means that writers of history textbooks must consult widely with black educationists to get their views on the level of English suitable for a black learner. The books have to be written in simple language with few elaborate expressions. Textbooks must be presented with clear sub-headings and headings. Good maps, clear illustrations and cartoons contribute towards making the text interesting to read.

In the analysis of textbook difficulties it became clear that ways and means to supplement the textbook are necessary. This means that provision has to be made in every school that teaches history for a history library or media centre. This could provide the pupils with more reference materials, historical documents and other useful material.

In this respect teachers will need to be trained in the training colleges and in in-service training centres in the use and proper handling of these materials in their history classes. Teachers need special training in looking for words in the textbooks which are likely to cause difficulties for the pupils. Burston et al. (1972, p. 45) state that this activity consists of far more than just searching out the long and unfamiliar words. It means that the teacher must examine closely the ordinary common words that are used, for it is often these words that cause the most trouble. This occurs precisely because they are very common and the pupils already have in their minds many associations and referents for them, which may not be appropriate to a specific history situation.

Teachers also need training in the analysis of textbooks to assist them beforehand in the selection of textbooks suitable for the language level of

their pupils. This means that readability of books will of necessity have to be included as part of the teacher training programme both at training colleges and during in-service training courses. If a teacher could be equipped with knowledge of all the features he has to look for when selecting texts for his class as well as the requisite skills for assessing the difficulty levels of books, he could make a better contribution towards the improvement of the pupils' performance in the subject. Teacher training should also make a teacher aware that there are many aids to explanation. Maps, diagrams and pictures could be used as useful and valuable means of communication for second language learners. Burston et al. (1972, p. 49) conclude by saying that it is important to emphasize to teachers the part they have to play in developing childrens' understanding by enlarging their pupils' linguistic resources. Teachers should be able to select tutorial material and use suitable methods in such a way that the subject matter in the second language may be meaningful to the child.

The history syllabus itself should be made meaningful to the black child. The current syllabus is not representative of a large section of the South African population. Learning a foreign content in a foreign language could contribute to the pupils' problems. Perhaps if the experiences, ideals, values and aspirations of all communities in South Africa could be reflected in the history syllabus, this could arouse the interest of the learner even though the content is in a foreign language.

The research has also shown that there is a need for training the pupils in comprehension skills. Once again, the teacher training colleges should provide the teachers with expertise in appropriate reading skills. It is also the responsibility of the subject committees both within the school or in the circuit or region to recognise the problem areas and make recommendations to textbook writers on the strategies of asking questions which challenge readers to move beyond an unquestioning approach to the literal level of the textbook content.

As this research was conducted in Ciskei schools, the findings may not be relevant to the whole of South Africa. The researcher's experience as history sub-examiner for standard 10 has shown, for instance, that many of the schools in the PWV area have a better command of a second language medium (English) than is the case in the rural areas of the Cape. While this

may not be a general case it does, however, indicate that more research may need to be done on this problem of the use of English as a second language medium, taking regional background circumstances into account.

APPENDIX I

STANDARD 8**1 POLITICAL RESULTS OF THE DISCOVERY OF DIAMONDS****Active History, p. 227**

The annexation of Basutoland and Griqualand West marked the beginning of a new British policy of territorial expansion which was eventually to lead to war between Britain and the two republics. The loss of the diamond fields - after the untimely annexation of Basutoland - increased the bitterness of the Free Staters towards Britain. And Afrikaners in the two republics now realised that they had to stand together against the new British imperialism. They therefore opposed Lord Carnarvon's plea for federation. Thousands of Blacks also flocked to the diggings. Here they came into contact with Western civilisation and soon became detribalised*. They also managed to buy fire-arms illegally which were later sold in their homelands. This soon created a threat to the Whites.

(d) Social and economic results

- The large market on its western border was of great financial advantage to the Free State. The farmers became wealthy and many Free Staters made a living by transporting goods to Kimberley by ox-wagon.

History in Action, p. 110**The restoration of British authority**

The discovery of diamonds led to the revision of the British convention policy towards the republics. By annexing Griqualand West Britain embarked on a policy of imperialism. British interests called for increased involvement in matters north of the Orange River to safeguard Britain's position as the most important power in South Africa. At the same time Britain again became interested in protecting the Blacks north of the Orange and Vaal Rivers. This gave rise to the ideal of a closer union of all the territories in South Africa under British influence.

Carnarvon's confederation scheme

When Lord Carnarvon became Secretary of State for Colonies in 1874, he wished to solve South Africa's problems and free the Imperial Government of its financial obligations by creating a confederation of all the regions in South Africa. This ambition lay behind the reconciliation policy towards the OFS and the offer of R180 000 compensation in the hope of winning the co-operation of the stronger of the republics.

Because the Volksraad had not given Brand the authority to discuss such matters at the time of his visit to London, he declined the invitation to attend Carnarvon's conference on confederation.

Next Carnarvon planned to lure the Cape Colony into the federation scheme by tempting it with the riches of Griqualand West. His plan was to form a confederation of the two colonies and the Transvaal, but the Cape Colony declined to assume responsibility for the new territory.

2 ZULULAND INTO NATAL

Active History, p. 261

The first permanent White settlers were 26 English traders, among whom were Lieutenant F G Farewell and J S King. When, in 1824, Shaka (king of the Zulu nation) granted land around Port Natal (now Durban) to Farewell, the White settlers hoisted the British flag. However, Britain refused to annex the territory. Later, more immigrants arrived and in 1835, Dingane ceded* to them the land around the bay. The town of Durban was established, but the British government once again rejected the idea of annexation.

Piet Retief met the English when he arrived in Natal. About 20 of them lost their lives with the Voortrekkers in clashes with the Zulus.

Land occupied by the Voortrekkers

The Voortrekkers arrived in Natal in 1838.

According to the Retief-Dingane Treaty, Dingane granted the territory between the Tugela, the Drakensberg, the Indian Ocean and the Umzimvubu river to the Voortrekkers. However, Dingane afterwards killed Retief and many of his people.

History in Action, p. 126

Area occupied by the Voortrekkers

Between 1834 and 1836, thousands of Afrikaner colonists on the Cape east coast decided to search for a new home in the interior. Thorough preparations were made. In 1834 Piet Uys and five others left from Uitenhage to investigate the area around Port Natal (present-day Durban) as a possible living area. The good prospects that Natal had to offer also led other trek leaders like Gerrit Maritz and Piet Retief to move there.

As 'governor' of the Voortrekkers who wished to settle in Natal, Piet Retief decided first to see the Zulu king, Dingane, in 1837 to obtain permission to live there. Dingane was prepared to give the Voortrekkers the strip of land between the Tugela and Umzimvubu if they brought back the cattle that Sekonyela had stolen from his people. The area that the Voortrekkers asked for was largely uninhabited. After Dingane's dispute with British traders at Port Natal in June 1833, he ordered his followers to move back to Zululand, i.e. north of the Tugela River.

The cattle were taken away from Sekonyela and returned to Dingane. However, when Retief and about 100 men arrived at Ungungundlovu in February 1838 to sign the treaty that would cede the promised territory to the Voortrekkers, they were murdered.

3 THE INDUSTRIAL REVOLUTION

Active History, p. 88

Definition

The economic changes which began to take place in England around 1760 and later in Europe, have long been referred to as the Industrial Revolution. The term "revolution" is misleading because no revolution actually took place, but rather there was a series of economic changes over a long period of time. These changes made possible the age of machinery in which we live today, and they had a greater influence on the daily lives of people than any other event in history. A complete or fundamental change of the conditions which had existed until about 1760 took place.

To appreciate the full impact of the Industrial Revolution and all it implied in every sphere of life, it is necessary to understand what the world was like before the Industrial Revolution.

(a) Agriculture and stock farming

Up to this time, the economies of Europe and Britain had been based on peasant labour in the fields. Farming was important, but the methods used were the same as those used by their ancestors for hundreds of years, and were therefore primitive*. There was no rotation of crops*; wooden ploughs were used; farms were not fenced; sheep and cattle were small because there was no cross-breeding* (this affected both their size and the quality of their milk and meat).

(b) Industry

Before 1760, a "manufactured" article literally meant a "handmade" article. Each master tradesman's home was his "factory" where he practised his trade with the help of day labourers and apprentices.

History in Action, p. 57

What was the Industrial Revolution?

During the eighteenth and nineteenth centuries Europe witnessed two great revolutions that helped to shape the modern world: The French Revolution and the Industrial Revolution. The French Revolution was a violent overthrow of the political and social order, which furthered political freedom and nationalism. The Industrial Revolution, by contrast, was a gradual process resulting in radical economic and social change, creating at the same time two new economic systems, namely industrial capitalism and socialism.

Some historians say that it is a misnomer to describe as a revolution the changes which economic life underwent during the nineteenth century. What is called the Industrial Revolution is only part of a process of change by which the old feudal economy of the Middle Ages gradually developed into a modern capitalist economy.

Obviously, one can prove that economic change and development had begun long before 1750 and that this has continued to evolve and expand to the present day. Yet the fact remains that between 1780 and 1850 a breakthrough did occur that transformed man's material existence and his society more radically than all the economic changes

of the previous ten centuries. In less than a hundred years a Europe of country estates, peasant holdings and domestic workshops became a Europe of sprawling industrial cities. Hand tools and simple mechanical devices were replaced by machines, the craftsman's cottage by the factory and muscle power by steam power. The mechanized, steam-powered factory system ushered in the era of mass-produced goods at greatly reduced costs per unit.

STANDARD 10

I MAIN FEATURES OF SOUTH AFRICAN SOCIETY IN 1910

Active History, p. 194

The South African Act (1909) was a great disappointment to the Blacks of South Africa.

Why?

- The franchise was not extended to race groups other than Whites in the two northern provinces of the Transvaal and the Orange Free State.
- Only Whites could become members of parliament.
- The votes of other race groups were not to be taken into account in the delimitation of electoral divisions.

The Union of South Africa was therefore a White dominion.

Widespread dissatisfaction among the other race groups resulted in the founding of the **South African Native Convention**. This body met in Bloemfontein in March 1909 and protested in vain against the colour-bar and the inferior status of the Blacks in the new South Africa. After this, a delegation consisting of, amongst others Dr A Abdurahman, Rev W Rubusana and J T Jabavu went to Britain to ask for support. They returned home empty handed because the British Government regarded the question of the franchise as an internal matter in which it could not interfere.

From then on the Blacks were to try to obtain justice by constitutional means. In 1912 Blacks from all four provinces gathered in Bloemfontein and established the African National Congress.

History in Action, p. 163

In September 1909 the South Africa Act was approved by the British king and on 31 May 1910 the Union of South Africa came into being. At that time the population of the Union was just less than six million and consisted of approximately four million Blacks, 1,2 million Whites, 500 000 Coloureds and 150 000 Asians, of which about 95 per cent were Indians.

In 1910 Blacks were still mainly confined to the traditional tribal areas of the Transkei, Ciskei, Zululand and parts of northern and eastern Transvaal. About 88 per cent were either in 'reserves' or worked on farms as labourers.

Although urban life was alien to their tradition, a steady trickle of Blacks had moved to urban areas since the early 1870s, drawn to the Kimberley diamond fields and later the gold-mines on the Witwatersrand. The migrant labour system was thus launched. As industries developed, the demand for unskilled Black labour grew, and a permanent urban Black work-force was quickly established.

Why did urbanization take place? In the first place, the once adequate tribal areas had become depleted by wasteful methods of cultivation and could no longer support a growing population. Whites already occupied other areas and the Blacks could not simply move elsewhere. They were forced to supplement their living by finding work in White areas.

Exploring History, p. 114

The economic and social position of the different groups

During the 19th century the great majority of the Black nations lived under tribal rule in their National States. They had a mainly subsistence farming economy, where every family was responsible for providing food for its own immediate members. The family also had to supply their own needs as far as clothing and other consumer articles were concerned. At that time large portions of the interior of South Africa were inhabited only by Whites. The Whites also depended mainly on farming for their living.

The discovery of diamonds in 1867 and the main gold reef on the Witwatersrand in 1886 resulted in many Blacks and Whites going to settle in the mining towns. The closer contact between Black and White people led to a certain amount of westernisation among the Black people. They began to buy clothes and other consumer items. The men came to work on the mines to provide for the needs of their families.

Although South Africa had experienced large-scale development in the mining industry even before 1910, development in the industrial sector had not progressed very far, and there were limited opportunities for work for both the Black and the White people.

New History to the point, p. 185

The economic and social positions of the different groups

In 1910 agriculture and mining formed the basis of the South African economy, which was slowly starting to overcome the effects of the Anglo-Boer War, drought and a depression. People of all population groups were moving to the towns - a process called urbanization - in search of work.

An integrated society developed in which Whites and Blacks were dependent on each other in the economic sphere. The Whites, generally speaking, provided the expertise and capital, while Blacks filled the urgent need for unskilled labour. This pattern of labour relations had been set much earlier - on the diamond mines in the 1870s. Now again, the link between race and class was accentuated. A capitalist system had developed, controlled by Whites, with Blacks forming the bulk of the working class.

Social divisions between the races had also developed. In 1910 Blacks were still permitted to buy land in all areas other than the Orange Free State, but a system of Black settlement had been devised called the Trust System. Black reserves had first been delimited in the Transkei and Zululand.

2 THE ISSUE OF NEUTRALITY (IN 1939)

Active History, p. 284

The decision to participate in World War II

(a) Superficially the United Party appeared to be firmly in the saddle and well able to contain the re-awakening of Afrikaner nationalism. Yet it was not well in the party itself - the members were not bound together by inner conviction. Members of the party, especially Hertzog and Smuts, differed on important issues:

- the flag
- the national anthem
- the right to neutrality in time of war
- the divisibility of the Crown.

Despite these differences, Hertzog persisted with his attempts at unity with Smuts.

In doing so, he gave his enemies the opportunity of accusing him of betraying the principles he had previously supported.

World War II showed up the points of conflict within the United Party. Hertzog was reluctant to involve South Africa in European disputes and in September 1938 the Cabinet decided that South Africa would remain neutral in the event of war unless its interests were directly threatened. On 2 September 1939 Parliament convened to extend the Senate's term of office, which had expired. The following day Britain and France declared war on Germany. The Cabinet was divided on the issue of neutrality: Hertzog was in favour of neutrality; Smuts believed that South Africa should give her fullest support to Britain.

Hertzog was supported in his view by five ministers, and Smuts by six.

History in Action, p. 240**The issue of neutrality**

For many years South Africa's political leaders had discussed what course of action this country would take in the event of a world war. General Smuts had predicted war as early as 1919, so the possibility of a war did not seem unlikely to South Africans.

On 1 September 1939 Hitler invaded Poland and on 3 September the Allies replied by declaring war on Germany. The Union, now a sovereign state, was not compelled to enter the war, although Germany could become South Africa's neighbour in the mandated territory of South West Africa should she win the war.

Both Dr Malan in 1932 and Hertzog in 1936 had declared that the Union would enter into a European war only if South African interests were threatened. In March 1938, when Austria was incorporated into Nazi Germany, the Union had decided not to get involved. In September 1938 the Union stated quite clearly that she would follow a policy of neutrality if war should break out in Europe. The South African Cabinet was in full agreement at that stage.

It so happened that a special session of Parliament was sitting when Germany invaded Poland on 1 September 1939. Both Prime Minister Hertzog and Opposition leader Malan immediately reiterated the decision not to get involved and to remain neutral, but within Cabinet ranks a serious rift was developing.

Exploring History, p. 212**Political strife in the ranks of the Opposition**

The outbreak of the Second World War brought about a split among the members of the United Party and General Smuts succeeded General Hertzog as Prime Minister.

The split brought to an end the political unity which had joined the vast majority of the White South African population together into one big political party. Because General Smuts and General Hertzog had decided to join forces, the Purified National Party was formed in 1934, for the sake of certain of General Hertzog's supporters who were not in favour of the union. Dr D F Malan became the leader of the Purified National Party which formed the official Opposition from 1934.

Different opinions about participation in the war

The question of participation in the war caused renewed bitterness, and divided the Afrikaners into two groups: those who supported this participation and those who were strongly opposed to it. General Smuts considered that Germany, under the leadership of Adolf Hitler, was striving for world domination, and was therefore also a threat to South Africa. General Hertzog, in common with many Afrikaners, saw no

threat in the rise of the Axis Powers. He wanted South Africa to remain neutral during the war and not become involved in European disputes. South African involvement in such a war would also result in heavy military expenses for the country.

Shortly before the closing of the parliamentary session early in September 1939, General Hertzog and Dr Malan travelled to Pretoria.

New History to the Point, p. 305

The issue of neutrality and the decision to participate in the Second World War

On 3rd September 1939, Neville Chamberlain, the British Minister, announced that Germany and Britain were at war. At the time of this declaration, quite by chance, a special session of the South African parliament was under way in order to extend the life of the Senate (which was due to expire on 5 September). Hertzog therefore had the opportunity to confront his Cabinet with the decision he had taken - to declare South Africa's neutrality in the war. He knew that in this he could count on the support of Malan's National Party. As we have seen, both Hertzog and Malan, in contrast to Smuts, had always held the view that the Union was at liberty to remain neutral in a British war.

Hertzog's announcement caused an immediate split in the Cabinet between the five members who accepted Hertzog's stance and the six who supported Smuts's view that as a member of the British Commonwealth South Africa was morally bound to enter the war. The following day, 4 September, the matter was debated in the House of Assembly. The discussions continued until late that evening. In an effort to persuade his listeners to accept his viewpoint, Hertzog used the example set by the prime minister of Ireland, who had proclaimed Irish neutrality. But he made a tactical error when he also used the argument that Germany's efforts to achieve their national aspirations could be compared with the Afrikaner struggle for independence.

3 THE STRIKE OF 1922

Active History, p. 218

Causes of the strike

As was happening in the rest of the world, South Africa experienced a great economic setback after the World War I (1914-1918):

- prices rose
- the cost of living soared
- the gold price fell and with it, profits and wages
- the life of the lower-grade mines and the jobs of many miners were threatened

- agriculture slumped*; there was bankruptcy*; unemployment and labour unrest
- more and more people streamed from rural areas to the cities and competed for jobs there.

The situation was aggravated by the fact that many Blacks had moved into semi-skilled jobs while the White miners were on active service during the war. Moreover, the Blacks were employed at lower wages, a trend which the mine-owners, faced with rising costs and falling gold prices, naturally wished to maintain.

The Whites, returning from the war to high living costs, little economic planning and the prospect of a collapse in their living standards, resented the undermining of their economic privilege. They demanded a return to the status quo, i.e. the agreement on conventional colour discrimination. This colour bar was really two-fold:

- the statutory bar, which was embodied in the Mines and Workers Act of 1911, and which forbade the employment of Blacks as skilled workers in mines
- the "conventional bar" which was an agreement between the Chamber of Mines and the trade unions to maintain the status quo in respect of semi-skilled work.

The post-war slump and rising costs forced low-grade mines to close down. The Chamber of Mines had to consider a reduction of costs. A commission of investigation recommended the removal of the colour bar. However, no action was taken.

History in Action, p. 181

The 1922 strike and its political consequences

Between 1914 and 1919 labour and industry experienced a period of relative peace. In 1914 and 1920 unrest among black workers occurred. However, in 1922 a far more serious disturbance broke out among the white miners on the Rand. This labour upheaval started out as a strike but degenerated into a revolt against the government.

The cause of the strike was the economic depression that followed the First World War. Falling prices, shrinking profits, unemployment and wage cuts characterized the years 1920-1923. The gold industry was seriously affected. The gold price, for instance, fell by about 15 per cent between 1920 and 1921. The post-war slump had forced many low-grade mines to close down and consequently the Chamber of Mines considered that the time had come to review the whole question of labour in order to reduce costs.

Apart from the statutory colour bar embodied in the Mines and Works Act of 1911, the Chamber of Mines and the Mineworkers' Union had entered into an agreement in 1918 - the so-called status quo agreement - according to which no change in the ratio of the division of work between Black and White miners was permissible.

Exploring History, p. 140

The economic situation

The world-wide depression that followed the First World War hit South Africa badly. The hardships brought about by the economy and the way in which Smuts handled them, contributed to his unpopularity. He could not always give the necessary attention to local problems as a result of his obligation towards the British Empire and his role in laying down a policy for the Empire.

During the years 1920 to 1923 the depression in South Africa became worse. Credit was not available and many merchants and speculators went bankrupt. The prices of agricultural and mining products dropped sharply. Many of the lower-grade gold mines were forced to close. The budget showed large deficits and the state started a savings programme. Unemployment among the White and Black people increased daily. The government tried to export more agricultural products and expanded the fishing industry.

New History to the Point, p. 217

The 1922 strike and its political results

As we have seen, an economic slump occurred in the early 1920s, after the First World War. The fall in the gold price and rising costs forced some of the low-grade mines to close down. The Chamber of Mines anxiously started to devise means of cutting expenses. In December 1921 they announced that three measures would have to be implemented to meet the crisis:

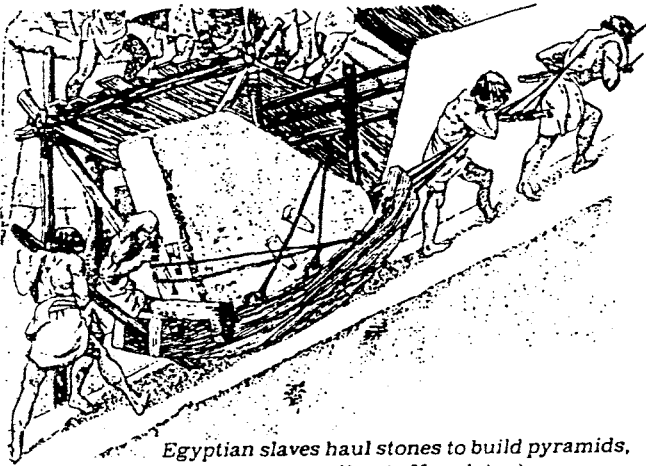
- The wages of those miners who were paid the most would have to be reduced.
- The "status quo" agreement, introduced in 1918, whereby the Chamber had agreed to maintain the ratio of black to white workers in the mines as it was at that stage, would have to be scrapped. This would change the white-black workers' ratio from 1:3,5 to 1:10. Thousands of whites would lose their jobs.
- The underground piece-work system would be reviewed and reorganised. Lower paid Blacks would be employed to do semi-skilled work which had previously been done by higher paid Whites. A substantial saving in production costs would thus be effected.

APPENDIX II

COMPREHENSION PASSAGE ON SLAVES.

Slaves are people owned by another person or people. Like a house or a horse, they can be bought or sold. The slave owners have complete control over their slaves and they are usually slaves for life. Their children are also slaves. Owners may beat and punish their slaves. Slaves have no right to own property of any kind. A family of slaves may be parted at any time. Slaves' children may be sold to someone else and husbands can be sold separately from their wives. The first map shows where slavery was common in different parts of the world at different times in history. The pictures show the kinds of work slaves have often done.

DIFFICULT AND DANGEROUS TASKS PERFORMED BY SLAVES

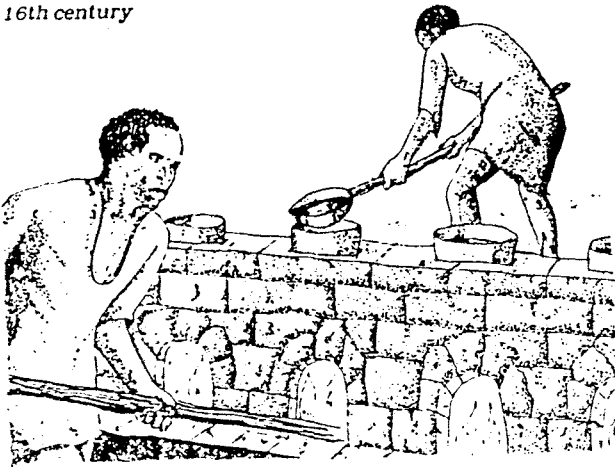


Egyptian slaves haul stones to build pyramids, c. 3000 BC (according to Herodotus)

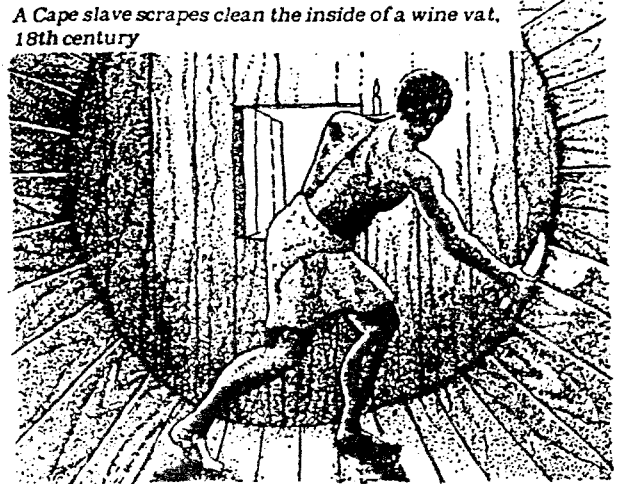


Roman slaves fight as gladiators, 1st century BC

Slaves in Spanish America pan molten silver, 16th century



A Cape slave scrapes clean the inside of a wine vat, 18th century



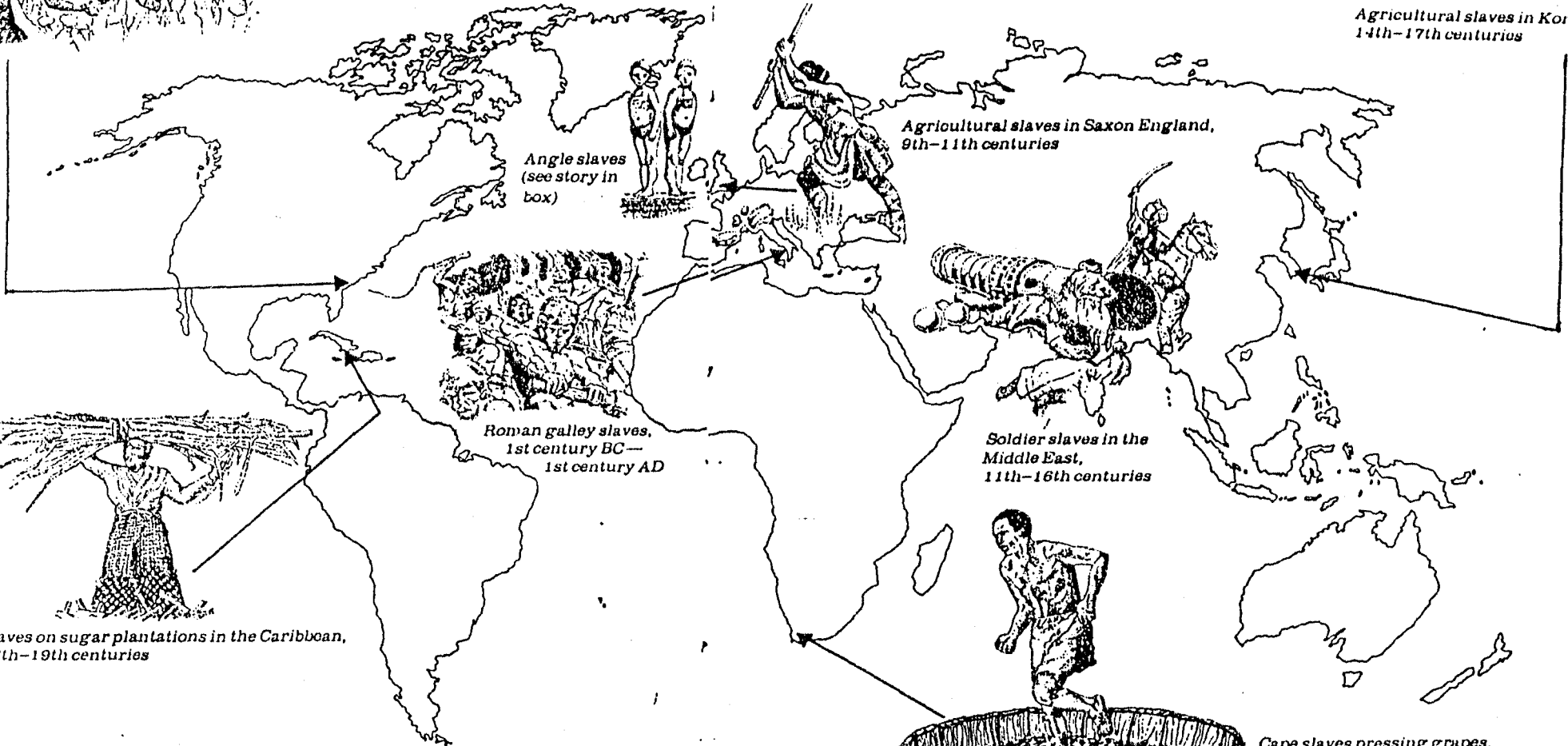
Slaves on cotton plantations, in the American South,
18th-19th centuries

MAP 1.

SLAVES HAVE BEEN USED IN MANY DIFFERENT TIMES
AND PLACES. HERE ARE SOME EXAMPLES.



Agricultural slaves in Korea,
14th-17th centuries



Angle slaves
(see story in
box)

Agricultural slaves in Saxon England,
9th-11th centuries

Roman galley slaves,
1st century BC—
1st century AD

Soldier slaves in the
Middle East,
11th-16th centuries

Slaves on sugar plantations in the Caribbean,
18th-19th centuries

Cape slaves pressing grapes,
17th-19th centuries

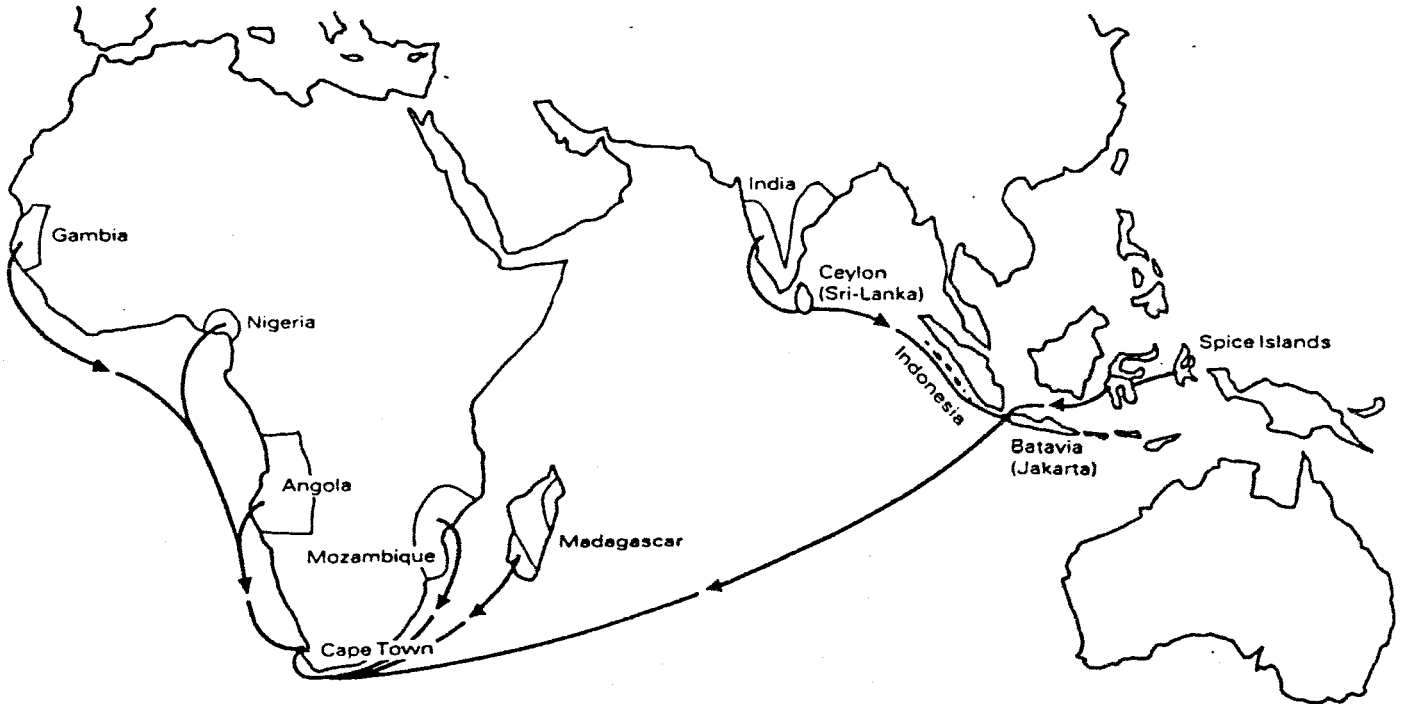
There are various reasons why people decided to own slaves. Landowners had many ways in which they could make people work for them. Many preferred slaves to free men because of the greater control they had over their slaves. They could force them to work long hours. They could make them do difficult and dangerous tasks. The following table shows when slaves were often used and when it was not worthwhile for people to use slaves.

Table 1

FARMERS OFTEN USED SLAVES WHEN:	FARMERS SELDOM USED SLAVES WHEN:
Land was divided among a few large land-owners;	Land was divided into small family-sized farms;
Free people were unwilling to work for the large land-owners. (If there was plenty of land, they preferred to have farms of their own);	Family members (with or without the help of paid labourers) could do all the farmwork themselves;
Government supplied slaves and made laws which enforced slavery;	Government refused to supply slaves, or permit slavery;
One, large-scale crop could be grown (such as rice, sugar, cotton, wine or tobacco), which kept workers busy most of the year;	Small-scale, mixed farming was carried out;
People worked in gangs which easily supervised.	People worked alone and so were could easily run away from their masters.

Slavery in the places controlled by the Dutch East India Company started long before the arrival of Jan Van Riebeeck at the Cape. They were used in the Dutch East India Company Colonies in India and the Pacific Islands where spices were grown. In 1657 Van Riebeeck allowed the first "free burgers" to grow wheat and raise cattle and sheep in the Cape. They could not get help that was needed on their farms because the Khoikhoi refused to work for the burgers. The company then decided to introduce slaves. If it brought them in its own ships, it could control the supply of slaves and their prices.

The first slave ship, the Amersfoot, brought Angolan slaves to the Cape. The second ship brought slaves from West Africa. The D.E.I.C. sent ships to Madagascar and Mozambique where brandy, guns and money were traded for slaves. Later slaves were captured in places like India, Ceylon and Batavia and sold in the Cape. See the second map which shows where the slaves, used in the Cape Colony, came from.



Map 2: Areas from which most slaves came

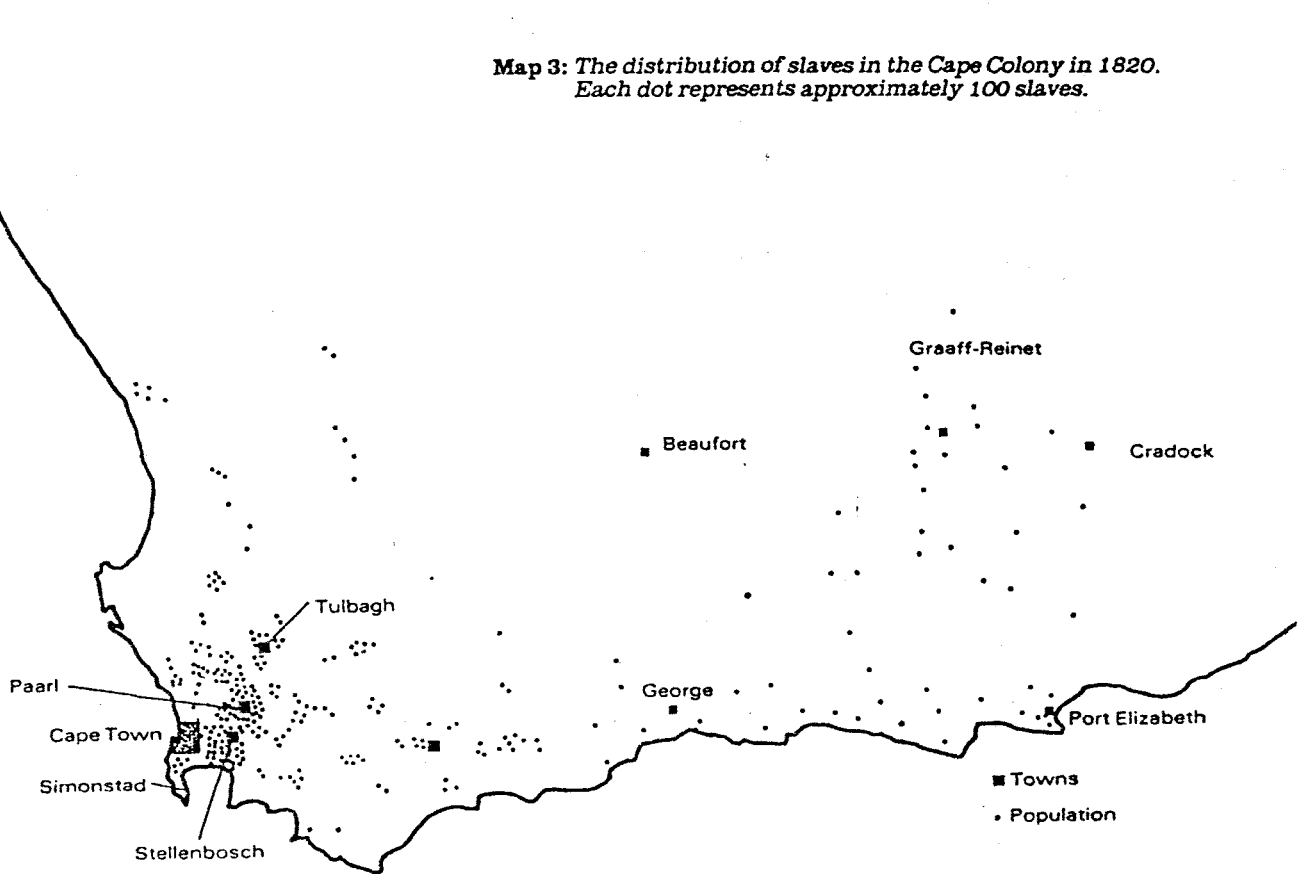
It cost lots of money to bring slaves to the Cape by sea. Besides the cost of the ship, there were the costs of feeding the slaves. Sometimes slaves died on the voyage because the ships were very crowded and they were not always given enough food. Sometimes the slaves tried to escape or to rebel against the captain and crew of the slave-ship, and so they had to be guarded right through the voyage to the Cape. This means that slaves were quite expensive for farmers to buy. But when they had bought slaves they could use them for farm work right through the year. The following table shows the different jobs slaves did on wheat (grain) farms and wine farms at different times of the year.

Table 2

Farm Calender	Grain	Wine
January	Harvesting and threshing	Grape picking and pressing
February		
March	Manuring soil Sowing and ploughing	Vine pruning and planting
April		
May-June		
July	Weeding Harvesting and threshing	Vat cleaning
August-Sept		
October-Nov		
December		

Some people were opposed to the use of slaves, but most people favoured the idea. Once slavery was allowed, the colonists became used to having slaves, especially on the farms of the Western Cape. It was not easy to end slavery. Look at the third map which shows where they were found in the Cape in 1820, when the British government was in charge.

Map 3: The distribution of slaves in the Cape Colony in 1820.
Each dot represents approximately 100 slaves.



COMPREHENSION TEST ON SLAVES.

INSTRUCTIONS.

You have read the passage about slaves. Keep the story in front of you while you answer the questions about the story which are on the following pages. There is space left for you to write your answers on these pages. The amount of space after each question will give you an idea of how much you should write for your answer.

BOY GIRL (Tick the right answer) Age (in years).....

Name of your school:

Your standard:

QUESTIONS.

1. What is a slave?.....
.....

2. Apart from South Africa name three parts of the world where slavery was common at different times in history.
 i)
 ii)
 iii)

3. Look at the pictures in Map one and at the pictures that show the difficult and dangerous jobs done by the slaves. Fill the spaces on the table to show if each work needed a lot of training before it could be done well or whether it was hard work or whether it was dangerous work. Sometimes you may want to put a tick in more than one column. The first line has been done for you.

Kinds of work done by slaves	Work which needs training	Hard work	Dangerous work
Wine pressing		✓	
Pulling stones for building			
Slaves as soldiers			
Agricultural slaves			

Kinds of work done by slaves

Work which needs training

Hard work

Dangerous work

Slaves as gladiators

Galley slaves

4. Name two ways in which slave owners had control over their slaves:

- i)
-
- ii)
-

5. Would you say that slaves only came from poor countries? [YES/NO]

I said this because I think

6. Name one place in Africa from which slaves in the Cape came:

.....

Name one place in the Indian Ocean from which slaves in the Cape came:

Name one place in the Pacific Ocean from which slaves in the Cape came:

7. Describe how slaves were brought to the Cape:

.....

8. Why did the writer say that slaves were often quite expensive to buy?

.....

9. Look at the second map. Which area of the Cape Colony had the most slaves?

10. What kind of farming do you think would be found in the Eastern Cape?

11. Would this kind of farming need many slaves? [YES/NO]
 Explain why you answered this question the way you did.

 (Tables 1 and 2 will help you to answer this question)

12. In cases where slaves were seldom used who did the work on the farms?

13. Give three words which you could use to describe a country which allowed slavery:
 i)
 ii)
 iii)

14. Name two things which show that slaves did not have happy lives.
 i)
 ii)

15. Suppose you were a slave at the Cape at the time when slaves were kept. Give three reasons why you might try to run away from your master.
 i)

 ii)

 iii)

16. Give two words to describe the feelings of slaves' owners when slavery was abolished:
 i)
 ii)

GLOSSARY

1. Galley: a low flat single-decked ship rowed by slaves or prisoners.
2. Gladiator: a trained fighter in Ancient Roman matches. He sometimes fought another gladiator, but sometimes wild animals.
3. Threshing: to beat corn so that the grain falls away from the husks or the dry outer covering.

APPENDIX IV

MODEL ANSWERS TO COMPREHENSION QUESTIONS

- 1 Slaves are people owned and controlled by another person. (3)
- 2 In Saxon England
In Italy
In the Middle East
In American South or in Africa; Europe and Asia. (any three).
2 x 3 = (6)
- 3
- | Kinds of work done by slaves | Work which needs training | Hard Work | Dangerous Work |
|------------------------------|---------------------------|-----------|----------------|
| Pulling stones for building | | ✓ | |
| Slaves as Soldiers | ✓ | | ✓ |
| Agricultural slaves | | ✓ | |
| Galley slaves | | ✓ | ✓ |
| Slaves as gladiators | ✓ | | ✓ |
- (20)
- 4 (i) They could force them to work long hours.
(ii) They could make them do difficult and dangerous tasks.
2 x 2 = (4)
- 5 (i) Yes. Because most of the slaves came from the Third World countries, like Africa. (4)
- 6 (i) Nigeria, Angola, Gambia, Mozambique (only one).
(ii) Madagascar, Mozambique, India, Sri Lanka (only one).
(iii) Spice Islands. 2 x 3 = (6)
- 7 They were captured in places like India and Ceylon and brought to the Cape by the company ships. They had to be fed and guarded throughout the journey. (4)
- 8 They were expensive to buy because when selling the slaves, the DEIC had to consider all the costs of bringing the slaves to the Cape by sea. (4)
- 9 The Western Cape or just Paarl, Cape Town, etc. (2)

- 10 Stock farming. (2)
- 11 No. Because stock farming does not need as many hands to work throughout the year as grain or wine farming. (4)
- 12 The family members. (2)
- 13 Cruel; merciless; hard hearted; inhuman. $2 \times 3 = (6)$
- 14 (i) They were often beaten and punished.
(ii) They had no stable family life.
(iii) They could not own property of any kind.
(iv) They worked hard/lack of food/dangerous work and long hours.
(any two). $2 \times 2 = (4)$
- 15 (i) To be free.
(ii) To escape from severe punishment.
(iii) To live a settled family life. $2 \times 3 = (6)$
- 16 (i) Anger.
(ii) Frustration.
(iii) Desperation.
(iv) Resentment. (any two) $1 \times 2 = (2)$

APPENDIX V

PILOT STUDY RAW SCORE RESULTS
(Maximum score : 80)

Number	Xhosa	English
1	13	17
2	17	18
3	19	18
4	22	21
5	22	21
6	24	24
7	25	25
8	25	25
9	25	27
10	26	27
11	27	30
12	31	30
13	32	30
14	33	34
15	34	35
16	34	38
17	35	39
18	36	40
19	39	43
20	44	49
TOTAL	563	591
MEAN	28,2	29,6

LIST OF REFERENCES

BOOKS

- ALDERSON, J C (1978). A study of the Close procedure with native and non-native speakers of English. Unpublished doctoral dissertation. University of Edinburgh.
- ALDERSON, J C (1984). Reading in a foreign language : A reading or language problem? in Alderson, J C and Urquhart, A H, Reading in a foreign language. New York: Longman.
- ALDERSON, J C & URQUHART, A H (Eds). (1984). Reading in a second language. New York: Longman.
- ALLEN, H B (1965). Teaching English as a second language. New York: McGraw-Hill.
- ANDERSON, N J (1989). Reading comprehension test versus academic reading: What are second language readers doing? Unpublished doctoral dissertation. University of Texas, Austin.
- ARORA, R K & DUNCAN C G (1986). Multicultural education. London: Routledge and Kegan Paul.
- AUERBACH, F E (1965). The power of prejudice in South African education. Cape Town: Balkema.
- BOYCE, A N (1975). Teaching history in South African schools. Cape Town: Juta.
- BLUNT, B & COUGHLAN, S (Eds) (1984) Breakthrough and Bridge: A project of the Institute for the Study of English in Africa. Johannesburg: ISEA.
- BROUGHTON, G (Ed) (1978). Teaching English as a foreign language. London: Routledge and Kegan Paul.
- CARRELL, P L, DEVINE, J & ESKEY, D (1988). Interactive approaches to second language reading. New York: Cambridge University Press.
- CORDER, S P (1973). Introducing applied linguistics. Harmondsworth: Penguin.
- CORDER, S P (1981) Error analysis and interlanguage. London: Oxford University Press.
- DEAN, E (1983). History in black and white. Paris: UNESCO.
- DUMINY, P A (Ed) (1967). Trends and challenges in the education of the South African Bantu. Pretoria: Van Schaik.
- DU PREEZ, J M (1983). Africana Afrikaner: Master symbols in South African school textbooks. Alberton: Librarius.
- GILLILAND, J (1972). Readability. London: Hodder and Stoughton.
- KERRY, T & SANDS, M K (1978). Mixed ability teaching in the early years of the secondary school. London: Macmillan.

LANHAM, L W (1967). Teaching English in Bantu primary schools: Final report on research in Johannesburg schools. Johannesburg: English Academy of South Africa.

MAKALIMA, R G S (1981). An assessment of the educational implications of the development of Xhosa as a written medium from 1820 to 1950: A historical-didactical analysis. Unpublished master's thesis. University of Fort Hare, Alice.

MALHERBE, C & WORDEN, N (1986). Always working: Salves. Pietermaritzburg: Shuter and Shooter.

MARLAND, M (1977). Language across the curriculum. London: Richard Clay.

MATOTI, S M (1990). An analysis of some school history textbooks with special reference to styles and concept presentation. Unpublished master's thesis. Rhodes University, Grahamstown.

McDIARMID, C & PRATT, D (1971). Teaching prejudices: A content analysis of social studies textbooks for use in Ontario. Ontario Institute for Studies in Education.

MERRITT, J (1969). Reading skills re-examined. Special Education 58(1).

RUBIN, D (1983). Teaching reading and study skills in content areas. New York: Rinehart and Winston.

RUMELHART, D E (1977). Toward an interactive model of reading. In Dormie (Ed). Attention and performance. Vol 6. New York: Academic Press.

TAYLOR, A (Ed) (1979). Commission of enquiry into education in the Republic of Transkei. Umtata: ELATA.

TAYLOR, I & TAYLOR M (1983). The psychology of reading. New York: Academic Press.

TZENG, I & HUNG, M (1981). Linguistic determinism: A written language perspective. In O. Tzeng and A Seyer (Eds). Perception of print. Hillsdale: Erlbaum.

VAN DER BERG, O & BUCKLAND, P (1983). Beyond the history syllabus: Constraints and opportunities. Pietermaritzburg: Shuter and Shooter.

JOURNAL ARTICLES AND REPORTS

CARRELL, P L & EISTERHOLD, J C (1983). Schema theory and English second language reading pedagogy, in Tesol Quarterly, 17-4.

CHICK, N L, September 1984. Perspective in Education. Vol 8 No 1.

CINGO, R (1963). Report of a commission of inquiry into the teaching of the official languages and the use of the mother tongue languages as medium of instruction in Transkeian primary schools. Department of Bantu Education.

CLARKE, M (1979). 'Reading in Spanish and English : Evidence from adult ESL students'. Language Learning, 29, 121-150.

CZIKO, G A (1978). Differences in first and second language reading: the use of syntactic, semantic and discourse constraints. Canadian Modern Language Review, 34, 473-489.

EISELEN, W W M, June 1971. Standard of English and Afrikaans in our Bantu school, in Bantu Educational Journal. Vol XVII, No 5, 4-7, 27.

ESKEY, D E (1973). A model programme for teaching advanced reading to students of English as a foreign language, in Language Learning, 23(2), pp. 169-184.

GOODMAN, K S (1967). 'Reading: A psycholinguist guessing game'. Journal of the Reading Specialist, 126-135.

NASH, R, August 1972. History as she is writ, in New Society. Vol 3, pp. 230-236.

STANOVICH, K E (1980). Toward interactive compensatory model if individual differences in the development of reading fluency. Reading Research Quarterly, 16, 32-71.

WILLIAMS, R C (1980). Longman readability study: Report of the project director. Mimeo.

YORIO, C A (1971). "Some sources of reading problems for foreign language learners", in Language Learning 21, pp. 107-115.