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The Effect of Repeated Reading on Reading Fluency:

The Case of Second Year University EFL students at the English

Department, ENS, Constantine,2005

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DEDICATION

In the Name of God, Most Gracious, Most Merciful

All the Praise is due to God alone, the Sustainer of all the worlds

I dedicate this work:

To my sweety daughter, Nour Fatima Zohra.

To the only person with the exception of God nothing is more important: to you mom.

To my father who has helped me to make my dream a reality, mainly after my mother's death *"Thank you Dad".*

To my husband who has encouraged me to follow my studies, I am forever grateful.

To all my family: particularly my sisters Mounia and Nadira who have supported me, who shared the hard moment with me and encouraged me to go further.

To my nephew, Mohamed Zine Eddine, the first candle that has enlightened my family.

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At last, we pray God to convey that thanks in His own way back to you all "Amen".

ABSTRACT

This research work aims at describing and investigating the effects of "the Repeated Reading method (Samuels, 1979) on developing reading fluency. The purpose, then, is to determine if the components of reading fluency (reading speed and word accuracy) improve if learners receive Repeated Reading Method.

To reach such an aim, we have carried out an experimental study at the Teacher Training School of Constantine with sixteen (16) second year students during the scholar year of 2006-2007. All the participants have been selected from the English Department, and have been randomly assigned to two groups (experimental group and control group). They are, first, pre-tested through Curriculum Based Measurement Test, to know their reading fluency scores prior the beginning of the experiment. Over a six (06) weeks study, within twelve (12) sessions, the experimental group has received the Repeated Reading Method, and the control group does not receive the same reading instructions. At the end of the experiment, the participants have been, again, post tested via the same test used in the pre-test.

Results from the pre-test and post test are given in mean scores. These results have demonstrated that the students in the experimental group have outperformed those in the control group. In that after the treatment period, the experimental group has shown a progress in reading fluency which has not been the case of the control group. To determine the validity of these results, a *t* test analysis has been established. The *t* test analysis has determined that these results are statistically significant, and on the light of this conclusion the established hypothesis has been accepted. This investigation, then, confirmed that the students who have followed the Repeated Reading Method have improved their reading fluency as indicated by the increase of the total number of words read correctly per minute.

On the basis of the conclusions drawn from this experiment, we propose some pedagogical implications for English as Foreign Language teachers who want to embed Repeated Reading Method in their teaching courses. We conclude this research study with suggestions for future research.

Résumé

Ce travail de recherche vise à décrire et à examiner les effets de "la Lecture Répètée" (Samuels, 1979) sur le développement de la maitrise de la lecture. Notre but et de déterminer si les composantes de la maitrise de la lecture (tel que: vitesse de lecture et la précision dans l'identification des mots) s'améliorent si les apprennents suivent les instructions de la lecture répètée.

A fin de réaliser notre objectif, on a mis en exécution une étude expérimentale à l'Ecole National Supérieur des Enseignants de Constantine avec seize (16) étudiants de la Deuxième année Anglais durant l'année scolaire (2006-2007).

Les participants sélectionnés ont été répartis au hasard en deux groupes. Avant d'administrer le traitement au groupe expérimental, on a testé le niveau de la maîtrise de lecture des deux groupes. Le test élabore, nomme "Curriculum Based Measurement" test, mesure la vitesse de lecture et la précision dans l'identification des mots au même temp. Durant six semaines (durée du traitement), le groupe expérimental suient les instructions de la lecture répètée, quand au groupe de controle suivent la method de la lecture non répètée. A la fin de l'expérience, les participants ont été encore testés par le même test utiliser au paravent.

Les résultas obtenus dans les deux testes montrent que les étudiants ont montré un progrès dans la maîtrise de la lecture ce qui n'était pas le cas du groupe de controle. Et pour confirmer la validité de ces résultas en a établi un test statistique nomme le t test. Ce test a déterminé que ces résultas sont statistiquement signifiantes. Donc, l'hypothèse a été accepte.

Cette investigation a confirmé que les étudiants ont profité de la méthode de la lecture répètée en augmentant le nombre total des mots lu correctement par minute. Ajoutant que ces étudiants ont transféré ce gains dans la vitesse de lecture et la précision dans l'identification des mots à de nouveaux textes non pratiqué.

A partir des conclusions tires de cette expérience, en a envisagé quelque implications pédagogique pour les enseignants des Langues Etrangères qui veulent intégrer la method de la lecture répètée dans leur cours.

ملخص

هذا العمل الاستقصائي مصوب لوصف و تفحص آثار "القراءة المتكررة" (سامويل 1979) على إنماء و تطوير التمكن من القراءة. هدفنا هو تحديد ما إذا كانت عوامل التمكن من القراءة [مثل: سرعة القراءة و الدقة في تحديد الكلمات] قد تتحسن إذ ما طبقت تعليمات القراءة المتكررة.

لأجل تحقيق أهدافنا, تم وضع دراسة تجريبية بالمدرسة العليا للأساتذة بقسنطينة حيث ساهم 16 طالب من السنة الثانية إنجليزية خلال السنة الدراسية (2006-2007). وزع المشاركون المختارون عشوائيا على فوجي (فوج تجريبي و فوج مراقبة). قبل إعطاء الدراسة للفوج تجريبي ثم اختبار مستوى التمكن من القراءة للفوجين. هذا الاختبار المعد مسبقا يقيس سرعة القراءة و الدقة في تحديد الكلمات في نفس الوقت.

خلال ستة أسابيع (مدة الدراسة) تلقى الفوج تجريبي تعليمات القراءة المتكررة أما فوج المراقبة فتلقى تعليمات القراءة الغير المتكررة و في نهاية التجربة امتحن المشاركون بنفس الاختبار المستخدم سابقا.

من خلال النتائج المتحصل عليها في الاختبارين تبين أن الطلبة موضوع هذه الدراسة, قد أظهروا تقدما في التمكن من القراءة عكس فوج المراقبة. للتأكيد على صحة هذه النتائج تم تحليلها عن طريق اختبار إحصائي. نتائج هذا الاختبار أثبتت الصحة العلمية و الإحصائية للنتائج المتحصل عليها خلال هذه الدراسة. و من ثم, تم إثبات صحة النظرية.

هذا البحث أذن أكد أن الطلبة استفادوا من منهجية القراءة المتكررة التي ساعدتهم على تحسين تمكنهم من القراءة بزيادة العدد الإجمالي للكلمات الصحيحة في الدقيقة, إضافة إلى أن هؤلاء الطلبة حولوا هذه الفوائد في سرعة القراءة و الدقة في تحديد الكلمات إلى نصوص جديدة.

انطلاقا من الاستنتاجات المستخلصة من هذه التجربة فقد قدمنا بعض الاقتراحات البيداغوجية من أجل أساتذة اللغات الأجنبية اللذين يريدون إدخال تعليمات القراءة المتكررة في دروسهم خاصة و أن فوائد من منهجية القراءة المتكررة لا تعد و لا تحصى .

LIST OF ABREVIATIONS AND SYMBOLS

EFL: English as a Foreign Language

L1: First Language

L2: Second Language

FL: Foreign Language

RR: Repeated Reading

NRP: National Reading Panel

CBM: Curriculum Based Measurement

IRIs: Informal Reading Inventories

CWPM: Correct Word per Minute

WPM: Word per Minute

WRE: Word Recognition Errors

WRC: Word Read Correctly

%: Percentage

N°: Number

EG: Experimental Group

CG: Control Group

DV: Dependent Variable

IV: Independent Variable

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INTRODUCTION

1. Statement of the Problem

The importance of developing fluency in reading within English as a Second Language/ English as a Foreign Language learners has become an important issue for pedagogy in English as a Second Language/ English as a Foreign Language setting (Nation, 2001) because one of the problems faced by these students is that the lack of reading fluency. They lack the skill of reading texts with an appropriate speed, less error and with a proper expression. They do not have the means to enhance their reading fluency as they are not exposed to effective instructional reading methods that focus on the improvement of reading fluency.

Is it feasible that the Repeated Reading Method could be the appropriate means in developing different aspects in students' reading performance, mainly developing reading fluency? In the current study, we will try to examine the effect of this method in developing students' reading fluency.

2. Aim of the study

The purpose of this study is to provide the so-called "Repeated Reading" (Samuels, 1979) as a workable method to enable poor readers to overcome such a problem and ultimately enhance their reading fluency. The present study, then, is designed to investigate if the application of the "Repeated Reading Method" (Samuels, 1979) best facilitates the aspects of reading performance such as rate and accuracy. Moreover, it seeks to answer the following question: over a six week period, through a repeated reading method, implemented thirty (30) minutes per day and two (2) days per week, will this method enhance students' reading fluency as signalled through rate and word accuracy.

3. Hypothesis

As the aim of the current study is to examine the nature of the relationship that may exist between fluency improvement and fluency instruction, we hypothesize, then, that if the second year English EFL students at the Teacher Training School of Constantine/ENS follow "the Repeated Reading Method", they would significantly improve their reading fluency.

4. Research Questions

The present study is designed to answer the following questions:

1- Does the Repeated Reading Method improve reading fluency of second year English as a Foreign Language student at Teacher Training School of Constantine?

1.1 Does the Repeated Reading Method facilitate rate in reading performance as an aspect of reading fluency?

1.2 Does the Repeated Reading Method facilitate word accuracy in reading performance as an aspect of reading fluency?

5. Means of Research

To achieve the aim of this study, we rely on an experimental design. First, the participants are pre-tested prior the beginning of the experiment. After the pre-test, each group follows particular reading instructions for six weeks (duration of the treatment). During the treatment period, the experimental group follows the Repeated Reading method and the control group does not follow the same reading instructions. At the end of the experiment, both groups are again post-tested. The collected data of the pre-test and the post test are compared via a t-test analysis.

6. Limitation of the Study

This study has several limitations:

a) In the present study, prosody has not been measured. Although, the participants in the experimental group are taught about the role of using the prosodic features in a fluent reading, but this component is not measured both in the pre-test and in the post test because the CBM test measures only reading speed and word accuracy.

b) Progress in reading comprehension, too, is not measured during the application of the Repeated Reading Method because we limited the investigation to the effect of this method on two components of reading fluency (reading speed and word accuracy).

c) The number of the subjects in this study is relatively small only sixteen participants that are divided into two groups. The choice behind restricting the number of the participants is due to the requirements of the Repeated Reading Method which prevents the researcher from using a large number of subjects, so that to ensure the appropriate application of the method. Therefore, any generalization must be done with caution.

d) The application of the Repeated Reading Method, which has extended over six weeks, may have been too short for the students in the experimental group to demonstrate more gains in reading fluency growth.

7. Organization of the Dissertation

The present study is composed of four chapters. In chapter one, we review the field of reading fluency by highlighting some key elements that are deeply related to our study. Reviewing the different definitions about reading fluency and how they changed over time help us in understanding how researchers view this concept. The components of reading fluency discussed deeply in this chapter: word accuracy, reading rate, and prosody. The LaBerge and Samuels (1974) Automaticity Theory is important in the present study, as it provides a theoretical support for developing reading fluency. It explains how readers achieve fluency in reading, and forms the principles for one of the models of reading which is the Interactive Model. Then, we will consider two models of reading acquisition –Top down and Bottom up- which bear on determining clear definitions of the components of reading fluency. The role of memory in reading is important in our understanding to the Automticity Theory. For such reason, it is vital to define some concepts such as: visual memory, eye movement, phonological memory, semantic memory.

Chapter two covers two main areas: the teaching and the measurement of reading fluency. Two instructional methods for developing fluency, the Independent Silent Reading and the Repeated Reading, are discussed in this chapter. The focus is on the Repeated Reading Method which is the independent variable. Knowing how this variable is manipulated in various empirical studies (Tagushi and Gorsuch, 2002; Taguchi, Gorsuch, and Takayasu-Maass, M. 2004) previously done in first Language and Second/ Foreign Language settings is of a great help to our study. The measurement of reading fluency is another aspect raised in our study where the Curriculum Based Measurement Test is selected to be a tool of measurement because of many factors.

Chapter three is the core of this research. It covers our experimental study where the design followed in our field work is introduced. Sixteen participants have been selected to participate in this study. To know their reading fluency level, they have been pre-tested. These participants, who have been randomly assigned to either experimental group or to control group, spend six weeks following particular instructions. At the end of the treatment period, both groups will be post tested. In order to analyze the collected data, we use a quantitative analysis relying on a *t*-test. The interpretation of the results, which is the last point in this chapter, will be done in light of what has been said earlier.

In chapter four, some pedagogical implications for improving reading fluency through the Repeated Reading Method in English as a Foreign Language are presented to help teachers who want to embed fluency instruction in their language courses or reading courses or lessons.

Chapter One

READING FLUENCY

Introduction

This chapter reviews reading fluency in terms of how fluency is first defined. We attempt, at this point, to consult the different definitions offered for this concept; and to adopt the definition to be relied on in the current research. So reading with a proper expression, with an appropriate speed, and with an accurate recognition of words are the indicators of a fluent oral reading. Dealing with the components of reading fluency (word accuracy, reading rate and prosody) would help us to know more about our dependent variable (reading fluency). One important issue which is raised in this chapter concerns fluency development and how it is viewed by the different models of reading acquisition: the Bottom-up model and the Top down model. How the Interactive model of reading sees fluency development will be explained by focussing on the LaBerge and Samuels's (1974) model of reading. It stands on a theory which forms the theoretical basis for reading fluency development. The LaBerge and Samuels' (1974) Automaticity Theory explains how readers achieve fluency in reading, and forms the theoretical foundation for the Repeated Reading method. The role of memory in reading is important for the understanding of this theory, for such reason, it is so vital to define some concepts such as: visual memory, eye movement, phonological memory, semantic memory. These concepts, then, represent the key elements of the Automatic Processing theory. It is almost important, then, to shed light on how do these key elements, which are attention, visual memory, phonological memory and semantic memory, facilitate for readers to achieve automaticity in reading. Then, we discuss the role of the automatic word recognition in a fluent reading. We end this chapter by pointing out the main characteristics of fluent/ non-fluent readers which sum up all what have been said earlier.

1. Defining Reading Fluency

Reading fluency which is considered as a new phenomenon (Rasinski, 2006f) in language teaching dated back to 1905 when Huey published his book: *The Psychology and Pedagogy of Reading*. According to Samuels (2006t: 24), this book provides important psychological insights into how reading fluency develops. But this field did not flourish until 1974 with the seminal article of LaBerge and Samuels that set up the theoretical foundation of the Automaticity Theory in Reading. Since 1974 reading fluency has been the core of a number of researches where they find that fluent reading plays an important role in a successful reading comprehension (Samuels, 1979; Pikulski and Chard, 2003; Rasinski, 2003; Samuels, 2006t).

One of the main attempts of researchers in the field of reading fluency is to define this concept, but they have not agreed on a single definition. The reason behind, argues Rasinski (2006a: 5), is that the emphasis on what constitutes reading fluency has changed over time. Meaning that in defining reading fluency, the researcher tries to focus on what is seen as the important constituent of this latter. To define this concept, we try to have a look on how it has been defined since the publication of the seminal article of LaBerge and Samuels 1974.

First, let us look up the word fluency in some English dictionaries. Even though the dictionary definitions are generalizations rather than specifications, it is almost important when studying something to move from general to specific. The Collins Cobuild English Language Dictionary (1987) defines fluency as the ability to speak, write and read a language accurately with no hesitation. In addition, The Collins Dictionary provides us with the main characteristics of a fluent reader, writer and speaker. The fluent reader reads smoothly and rarely stops at unknown words.

Similar to the Collins Dictionary definition, in the Concise Oxford English Dictionary (2001) defines fluency as smoothness, easiness and accuracy in speaking, reading and writing. However, fluency, according to the Cambridge Advanced Learner's dictionary (2005), is defined in relation to speech. It refers to the ability to speak a language easily, well and quickly. What can be noticed from these definitions is that fluency is viewed as being characterized by smoothness, easiness and accuracy in all the language skills speaking, writing, or reading.

Researchers (Samuels,1979; Rasinski,2003; Samuels,2006) in the field of reading fluency have attempted to define reading fluency, but since this phenomenon has existed since the 19th century, they have failed to agree on one single definition. In his article *A Brief History of Reading Fluency* (2006a), Rasinski finds that one problem with reading fluency lies in its definition because researchers have not agreed on one single definition. Accordingly, he points out the following:

> To some reading fluency is considered primarily an act of oral reading specifically the oral interpretation and expressiveness (prosody) associated with the oral production of a written text. To others, reading fluency has to do with accuracy and speed (automaticity) in word decoding. And to yet others, reading fluency has largely to do with understanding or comprehension that comes as a result of reading with appropriate decoding speed and accuracy. Because the emphasis on what constitute reading fluency has changed over time. (2006a: 4-5)

Since there, there are three distinctive views to what reading fluency refers to, and on the basis of each view a definition is built.

According to the first view, reading fluency is seen as an oral reading phenomenon where the oral production of the written text has the same characteristics of speech. Rasinski (2004: 2) postulates that there is no distinction between fluency in speech and

fluency in reading, since both speakers and readers use the same fluency features in their two different tasks: speaking and reading. The fluency features -word accuracy, appropriate speed and proper expression- which speakers embed in their voices, facilitate for the listener his understanding of speech as they may facilitate the reader's comprehension too. In the same context, Richards (2000: 534) considers that the task of a fluent reader is to project the natural pitch, stress and juncture of the spoken word on a written text automatically and at a natural rate. For them, reading fluency has to do with the appropriate use of fluency features used in speech by the reader at an appropriate speed during the oral production of a written text.

Another definition of reading fluency regards that this skill refers to the accurate recognition of words with an appropriate speed during the reading activity. Reading fluency, according to this definition, refers to the automatic word recognition (see section 5.2). The influence of LaBerge and Samuels (1974) automaticity on the definition of reading fluency can be seen in Shanahan's (2006) definition to this concept. Reading fluency, according to him, is referred to as "the ability to read texts aloud with sufficient speed and accuracy" (2006: 30). Accordingly, both reading speed and accuracy in the identification of words are the signals of fluent reading, and this accurate and rapid identification of words (the automatic word recognition), add Pikulski and Chard (2003), allows the reader to construct the meaning of the text.

The last view, however, considers that reading fluency has to do with comprehension (Samuels, 2006r; Pikulski, 2006; Rasinski; 2006f). Reading fluency is, then, defined as the ability to decode and comprehend at the same time. Samuels (2006r) considers that reading fluency is the ability to perform simultaneously both decoding and understanding the written text. He states the following:

> The essence of fluency is not reading speed or oral reading expression, but the ability to decode and comprehend text at the same time. (2006r: 9)

Samuels sees reading speed, accuracy and proper expression as indicators of fluency. For him, they are like *temperature readings on thermometer* that only indicates if the person is sick/sane meaning that being fluent or non-fluent reader depends on the temperature reading degree. This last definition to reading fluency gathers all what have been said earlier; it incorporates elements of the definitions cited previously. That is why we may notice that some researchers in this field modify their definitions to reading fluency. For example, Samuels's 1979 definition is not the same as his 2006 definition. Pikulski (2006) has also modified his previous definition to reading fluency arguing that:

> Reading fluency is a developmental process that refers to efficient, effective decoding skills that permit a reader to comprehend text. There is a reciprocal relationship between decoding and comprehension. Fluency is manifested in accurate, rapid and expressive oral reading and is applied during and makes possible, silent reading comprehension. (2006: 73)

These various definitions for reading fluency give the opportunity for any investigator in this field to be free in his research study by selecting the definition which seems adequate to the context he is investigating in, or the definition whose components are part of the research objectives. The reason is that, in any experimental study, the definition of the construct determines and influences, to a large extent, the way it will be measured.

In the present study our definition of reading fluency will be based on the LaBerge and Samuels's 1974 theory. We define reading fluency then as "the ability to recognize

written words in a connected text accurately, with an appropriate speed and with a proper expression ".

2- The Components of Reading Fluency

Reading fluency has been regarded by Rasinski (2004: 4) as multidimensional where each dimension stresses one component of reading fluency. One dimension stresses the importance of word accuracy in reading; a second dimension focuses on quick and automatic recognition of words in connected text, and the third dimension stresses expressive and meaningful interpretation of text. Reading fluency, then, is composed of accurate word recognition known as "accuracy", reading with ease or at a conversational rate known as the "rate/pace" of reading, and reading with a proper expression referred to as "prosody". These components according to Samuels (2006:9) are indicators of fluency where they indicate the students' fluency progress. In the following we shall shed light on each of these components.

2.1. Fluency and Word Accuracy

Accuracy or the correct recognition (identification) of words during the reading task is almost an important characteristic of a fluent reader. Hudson et al (2005) define word reading accuracy as "the reader's ability to recognize or decode words correctly" (2005: 703). In their explanation to the role of accuracy in a successful reading comprehension, they see that it is the accurate recognition of words that would facilitate the reader's understanding and correct interpretation of what is being read. An inaccurate word recognition or poor reading accuracy, then, would has a negative influence on reading comprehension and fluency. They argue that inaccurate word recognition may lead to the misinterpretation of what is being read.

Helping readers to accurately decode words in a text is insufficient for them to be considered fluent. Kuhn and Stahl (2003) find that it is not enough to recognize words correctly if a great deal of attention is required to do so. Accurate word recognition, then, is important in building fluency, but it can never stand alone as the predictor of a fluent reading. To achieve fluency in reading students should be able to develop the ability of recognizing written words not only accurately but as quick as possible. Fluent reader, then, is someone who accurately and rapidly recognizes words; or rather say it is someone who automatically recognizes words in a text during the task of reading, argues Mc Ewan (2002: 54).

2.2. Fluency and Reading Rate

Fluent decoding depends on the readers' ability to achieve what reading specialists call "automaticity" or the accurate and rapid word recognition (Samuels, 1979; Day and Bamford, 1998; Shanahan, 2006). According to these reading specialists, a fluent reader is someone who manipulates the speed of reading; generally, he reads at a conversational rate. Hudson et al (2005: 702) assume that reading rate is a prerequisite for good comprehension. They consider that the speed with which the information is processed in the working memory will affect the speed of reconstructing the meaning of text. Reading rate is not only acknowledged as an integral component of effective and efficient reading, it also reaches the extent of representing an accurate measure of reading fluency. Deno (1982) compares oral reading rate to a thermometer that can be used to measure the current temperature and ongoing changes of the oral reading performance. (Deno, 1982 In. Hudson et al, 2005)

Both rate and word accuracy or the automatic word recognition should be emphasized during reading fluency practice. Students should be taught how to combine

the accurate recognition of words with the speed of reading. This kind of assistance is provided by the teacher during the reading instruction. In this context, Anderson (1999) suggests that the teacher's assistance during the reading activity should keep a balance between increasing both reading speed and word accuracy of their students, rather than enhancing one aspect at the expense of the other because this would have a negative effect on reading fluency. His argument is that "teachers, often in effort to assist students to increase their reading rates, overemphasize accuracy; when this occurs, reading fluency is impeded." (1999: 5)

The task of teachers is, then, to help students to shift from decoding words accurately, but deliberately to the stage of recognizing words automatically by using the appropriate instructional method that ensures this shift. This shift according to Stanovich (1980) allows readers to concentrate on the meaning of the text, rather than on identifying words.

Hence, reading fluency is more than reading with speed and accurately recognizing words; reading fluency goes further to how does the reader successfully manipulates the prosodic features of speech on the written passage.

2.3. Fluency and Prosody

Prosody or reading with expression is the third key element of a fluent reading. *Prosody* as stated by Hudson is a linguistic term that describes the rhythmic and the tonal aspects of speech. Simply, it refers to the music of oral language (Hudson et al, 2005: 704). Prosody is the ability to project the tonal aspect of speech onto print, so that the reader's reading sounds natural as if he is speaking. So, what are these prosodic features? They refer to the variations in pitch (intonation), stress pattern, and duration. All of them constitute the prosodic features that contribute to expressive reading of a

text. An expressive reading, argues Richards (2000), is mainly based on how the reader projects those rules of oral speech on a written passage, so that the reader's reading sounds natural as if he is speaking. Hudson et al (2005) further explain that these features are mainly applied when the reader faces questions, surprises, exclamations and other meanings. In these situations the reader must use these combinations of pitch, duration, and stress pattern because of their importance in manifesting his understanding of the writer's message. In other words, when readers embed appropriate volume, tone, emphasis, phrasing, and other elements in oral expression, argues Rasinski (2004: 4), they are giving evidence that the reader is actively interpreting or constructing meaning from the passage.

The three different dimensions of reading fluency: word accuracy, the rapid word recognition, and prosody stand complementarily to promote an effective fluent reading. According to Rasinski (2004), these dimensions are interrelated: accurate and automatic reading creates the conditions for expressive reading. All three are important as indicators of fluency progress because fluency is manifested through them (Pikulski, 2006: 73). These components are, then, essential in the building of a fluent reading that results in an effective comprehension. Consequently it is almost necessary that all of them must be taught and monitored at the same time, and students must be aware that their progress in oral reading fluency is automatically linked to their progress in these three components.

3. Fluency and Models of Reading Acquisition

The model of reading acquisition tries to explain what the reader does from the time his eye meets the print to the point of comprehension. Three models of reading will be described in light of their influence on fluency development. Gough's model (1972) is an example of Bottom-up model of reading; Goodman's model (1985, in Davies, 1995) is described as an example of Top-down model; and lastly LaBerge and Samuels's (1974) Interactive model of reading. Each model, of course, has different components to focus on in explaining what really happens during the reading process.

According to Hoover and Gough (2001), most of researchers agree on the fact that the reading process involves two separate but highly interrelated areas: word identification (decoding) and comprehension. Decoding refers to the ability to recognize written representations of words, whereas comprehension refers to the ability to construct meaning from spoken representations of language. This means that reading is a multidimensional act which involves decoding alphabetic symbols and using strategies effectively to construct the meaning. So, to perform both tasks adequately, the reader is in need of developing both the decoding and the comprehension skills and strategies. Developing the decoding skills depends on developing the word recognition skill.

In his article *Toward a Model of a Fluent Reading*, Samuels (2006t) sees that to experience a good reading comprehension the reader must be able to read words fluently -an activity which is based on the quick and accurate identification of words. he highlights here the delicate role of fluent reading in a successful reading comprehension as manifested through the fast and accurate recognition of words. However, the role of fluent reading, as being the key for successful reading

comprehension, has been a subject of controversies among the various models of reading acquisition between Bottom-up theorists who consider that the lower level processing (word recognition) plays an important role in the reading process, and Top-down theorists who consider that reading comprehension starts at the highest level processing where little to no contribution is given to word recognition. Neither the first model nor the second one succeeds in giving the same level of importance to the components of reading, decoding and comprehension. That is why the best model is the Interactive one that considers a successful reading comprehension as a combination of word recognition skills and interpretation strategies, one that gives equal importance to the components of the reading process (decoding and comprehension). According to Stanovich, (2000) reading today stresses the importance of the automatic, accurate and fast, recognition of words as one of the main factors to achieve a successful reading. Since reading fluency is viewed as the automatic word recognition; consequently, we need to examine how fluency development is viewed by the different models of reading.

3.1. Bottom-up Model

In the Bottom-up processing, the reader recognizes and analyzes perceived linguistic information like letters, words, combination of words and sentences to construct the meaning of the text (Hoover and Gough, 2001). So, theories that stress the bottom-up processing focus on how the reader starts from the bottom and moves upward to construct the meaning of what has been decoded piece by piece with little interference of background knowledge. Therefore the main focus of Gough's model (1972) is on how the text is processed from the time the eyes perceive the printed word

to the moment where meaning is derived from this visual input. In her description to Gough's model, Davies (1995) points out how this model perceives the reading process:

> Gough characterizes reading as a letter-by–letter progression through the text; with letter identification followed by the identification of sounds of the letter until words, their syntactic features and then meaning are finally accessed. (1995: 50)

Accordingly, the successful reading process depends on the successful word identification (decoding task) simply because, for bottom-up theorists, it is the textual input which controls reading. Good readers, according to this model, are good decoders because the comprehension of what is being read depends mainly on how well the decoding skill is being performed. Hoover and Gough (2001) believe that the identification of letters by fluent readers occurs rapidly because the print is mapped into a string of systematic phonemes. The individual words are then stored into the working memory until they can be meaningful and comprehended. The question, that may be asked in this context, is has the working memory the capacity to store this amount of information to the time it will be understood. And this was one the criticisms to the bottom-up reading model

This model connection to fluency lies in the main focus of the model: word recognition. The faster the words are recognized, the more fluent the reading of the passage will be. But the main criticism that this model receives is its ignorance of the role of comprehension in the reading process and its focus on word recognition aspect as a key for better comprehension.

3.2. Top-down Model

The Top-down model is another theory that explains the processing of information during the reading task. In this model the stages involved in the reading process are

higher up and the success of this process does not depend on the reader's ability to identify words, but rather on his ability in to get the meaning of words from what can be predicted and inferred from them in relation to the reader's prior knowledge. This model places minimal attention to word recognition skill and focuses on what is called "higher order' source of information" (Davies, 1995: 61). In the top-down model, the flow of information proceeds from top down-ward and the process of word identification is dependent first on meaning where the reader has to rely on his background knowledge, and on all what he can derive as information about the topic to form hypothesis about which word he will encounter and, then, test his hypothesis. For example, the reader may spend less time on "beach" in the sentence "My family spent the summer holidays in the beach of Annaba "than in the sentence" last weekend my family and I went to the beach." Because the activation of "summer holidays" will automatically activate all the activities done on such occasion including going to the beach.

So, the guesses and the predictions that the reader gets engaged in, that are based on his prior knowledge about the topic, must fit the sense of the sentence. Whenever the hypothesis is established the reader has to do is to test its validity in the context of the text. If the hypothesis is confirmed true this means that a new knowledge is assimilated, but if ever the hypothesis is disconfirmed the guess is then rejected because the prediction fails to make sense in the context of the text. Reading according to top-down theorists is a "psycholinguistic guessing game" as Kenneth Goodman (1985 in Davies, 1995) refers to. For them, fluent readers are those who are actively engaged in predicting or hypothesis testing when progressing through the text. In other words, the performance of fluent readers, as it is explained by Stanovich (2000), should be more dependent on contextual information where the role of the lower level processing (word

identification) is completely ignored not only for fluent readers but for beginning readers too.

For top-down theorists, fluency, as a reading skill, develops gradually as a consequence of the acquisition of some proficiency in the language being studied. So, the knowledge and language skills of fluent readers, argues Smith (2004:226), are the outcome of literacy rather than the cause. As an advocate of top-down model, Smith sees that fluency is reached not on the basis of the automatic word recognition, but on the basis of the wide reading experience with the different kinds of texts that will facilitate for the reader all kinds of reading. According to these theorists there is no need to develop the decoding skills to reach skilful reading, although this is not valid for beginning readers, because these skills will progressively develop as the reader is more and more exposed to reading experiences. Since fluency is based on the automatic word recognition and the proper expression (Samuels, 1979), there is a little reference to these components in the top-down position. That is why developing fluency as a reading skill in the top-down view is completely neglected.

3.3. Interactive Model

The criticism which has been arisen for both bottom-up and top down models have urged researchers from different disciplines to investigate the subject for a new reading theory: a theory that does not ignore the role of both word recognition and the reader's positive involvement in the success of a reading activity. Based on strong points of the bottom-up and top-down models and avoiding the criticism directed for each, the Interactive model has been proposed as the promising model to the theory of reading today. (Rumelhart, 1977; Stanovich, 1980 in Davies, 1995: 63-65) This model views comprehension as a product of both top-down and bottom-up processing. Because of its

deep relation with the topic of our research (reading fluency), the LaBerge and Samuels's model will be taken as an example of an interactive model of reading. In his description of this model Samuels (1979) states that.

> the model assumes that an individual will work at the highest level (comprehension) and drop down to lower levels (word recognition) when processing at the highest level becomes ineffective.(1979: 361)

According to this model the processing of information always begins at the highest level (top-down processing), but when the reader encounters difficulty in processing the information at the higher cognitive processing (when he encounters an unfamiliar word that hinders the understanding process), he then shifts to the lower level (bottom-up processing) to process the material. In other words, the LaBerge and Samuels's model makes a balance between the higher level processing when relating the information of the text to background knowledge and lower level processing when decoding the linguistic items.

The main focus of this model is that accurate and automatic word recognition allows the reader to devote more of his attention to process texts and comprehend what is being read. Similar to the bottom-up model, this model stresses the role of lower level processing (decoding) in the reading process, but it differs from the former in that there is a focus on comprehension right from the beginning of the process as does the top-down model. The LaBerge and Samuels model does not propose a strict letter by letter sequence to word recognition; however, poor readers go through this sequence regardless of the context of the word. Moreover, the interactive processing is not linear as in the bottom-up because it contains feedback at any stage that allows the reader to go back or forth between the components during the process (Trieman, 2001).

Neither the top-down model nor the bottom up model can stand alone; there should be a balance between the two. In the top-down conception, reading is not controlled by textual inputs, rather it is controlled by a higher level cognitive processing that requires from the reader to use some strategies (prediction, making inferences, guessing from the context) to get the meaning of the text (Trieman, 2001). As for the lower level processing, top-down theorists consider that word recognition skill is called into play only when needed. By contrast in bottom-up processing, according to Weaver and Resnick (1979: 13), word recognition precedes comprehension in that the word is first recognized, and then a syntactic processing occurs which will be followed by a semantic interpretation based on the sentence syntax. In the interactive processing the role of word recognition is vital as key component in the reading process. Skilled readers, for the Interactive theorists, do not rely on context cues to guess the meaning of what is being read since they have developed an automatic visual recognition of words (recognizing words by sight) that enables their full attention to be focused on getting the meaning of the text.

Consequently, no one can deny the importance of lower level processing as the top-down theorists do or just rely on it as bottom-up theorists do. Thus a combination of both higher level processing (comprehension) and a lower level processing (decoding) is essential for the success of the reading activity. To ensure the rapid processing of information, argues Trieman (2001: 664), bottom-up and top-down processes have to work together in most situations. This implies the rapid processing of information during the reading task is the by-product of both top-down and bottom-up processing; that is why Eskey (1988: 95) suggests that developing readers must then work at perfecting both their bottom-up recognition skills and their top-down interpretation strategies. In this case, good (fluent) reading can result only from an interaction

between top-down and bottom-up processing as it is required by the LaBerge and Samuels's model (1974). According to this model, the main characteristic of fluent and skilled readers is their ability to perform both decoding and comprehension at once. It is the automatic word recognition which enables the readers to focus their full attention on the comprehension activity, the fact that facilitates for them decoding and comprehending what has been decoded at the same moment. In short, one can say that for the interactive theorists, achieving fluency in reading depends mainly on the gradual development of the automatic processing skills which is one of the main prominent factors in gaining proficiency in reading, argues Stanovich (2000).

The three models presented thus far represent the three most prominent theories or positions about reading acquisition. Many decisions and ideas about beginning reading and fluency development are based on these models.

4. Memory and Reading

The goal of this section is not to explain reading. Instead, the aim is to make clear the relationship between reading and memory. To do so, we will shed light on some concepts that help us not only in understanding this relationship, but further those same concepts will be encountered in many sections of this chapter.

4.1. Working Memory

Perhaps no concept so well reflects the interaction between reading and memory as that of working memory. The term working memory can be used synonymously with short-term memory. According to Baddeley (1999: 16)," short term memory is not one but a complex set of interacting subsystems", he refers to them as" the working memory". What role does the working memory play in the reading process?

Greene (1987) postulates that the working memory is the responsible part in the information processing. On the role of the working memory during the reading activity, Greene points out the following:

> The working memory is thought of as being the working space in which new inputs can be received and information from long term memory can be retrieved. Working memory is necessary for cognitive functions which depend on an interaction between new and old information. (1987: 39)

The processing of the new information in the working memory is mainly dependent on the old information which will be soon retrieved from long term memory. For example distinguishing and connecting speech sounds and recognizing speech and letter correspondence are activated from long term memory to the working memory, so that the processing of the new information becomes possible. We, then, conclude using Baddeley's (1998a) words that the working memory makes "an alliance of temporary memory systems that play a crucial role in many cognitive tasks such as reasoning, learning and understanding." (In. Nieuwenstien, 2004: 198)

These temporary memory systems that facilitate many cognitive processing will be highlighted in the following sub-sections. According to Caplan (1995), in the processing of the new information during the reading activity three different mechanisms are involved "one is specialized in the orthographic attributes of letter string, one for processing phonological attributes, and one for processing semantic information" (in G.Glosser et al, 1997: 234). Meaning that, when we get engaged in a reading activity the orthographic, the phonological, and the semantic mechanisms are activated in the memory; to help the processing of the new information. Within the scope of our study, the same types of memories as those previously mentioned by

Caplan (1995) will be explained. This includes the visual memory (orthographic memory), the phonological memory and the semantic memory.

4.2. Visual Memory and Eye Movement

Before talking about the visual memory, it seems important to have a glance on how does Smith (2004) view the task of reading. He says that "reading depends on some information getting through the eyes to the brain" (2004: 73). This information is referred to by Smith as *the visual information*. The eyes, then, are the responsible organs in the transfer of the visual information to the brain.

4.2.1. Eye Movement

An eye movement refers to the aspects of eye behavior such as: eye fixation, a saccade, regression. To shed some light on the different movement of the eye during reading, it is important to explain what is an eye fixation, a saccade, a regression?

In explaining these terms, Treiman (2001) sates that research on the reader's eye movement shows that the eyes do not sweep, or move across the lines of a text in a continuous fashion, but rather come to rest for somewhere around a quarter of a second, this rest is known as fixation; and then make a rapid jump to the next fixation. This jump is called a saccade. When is the information extracted from the print, then? For Treiman (2001: 664) the extraction of the information from the print occurs during the eye fixation, whereas during the saccade little or no useful information is extracted.

According to his description to the aspects of the eye behaviour, the eyes moves very rapidly and not continuously across lines but rather make a pause (rest) before they make another move. This pause is referred to as **the eye fixation.** It represents the time in which visual information are selected.

A saccade, however, represents the rapid jump of the eyes from one fixation to another. During the saccade, while the eye is moving from one fixation to another, very little is seen Smith (2004: 84). This means that the visual information is picked up between the saccades.

A regression is the rapid jump of the eyes (saccade) in the opposite direction. In English we read from left to right, when the regression occurs the movement of the eye will be from right to left along the line of the text, or upward on the page.

4.2.2. Visual Memory/ the Orthographic Memory

Once the visual information has been fixated, how this visual information is going to be processed in the brain, or how is it possible to have access to the orthographic representation of the perceived word. In the recognition process, the visual target activates in the memory the knowledge that this information has been seen before. Meaning that the orthographic processing of the perceived letters, words depend on what will be retrieved from the orthographic memory. During the orthographic processing, some information is retrieved from memory which includes the orthographic knowledge of the language that includes letters, combination of letters… This information helps in the recognition of the orthographic pattern of the visual information.

4.3. Phonological Memory

Phonological memory as its name indicates refers to the process of receiving, analyzing and processing of sound elements in language. When the word has been processed in the visual memory, to identify its orthographic code; the role of phonological memory is to identify the phonological representation of the visual target

word. The role of this memory is to assign a sound to letter, or better say how the spelling of words maps onto their spoken forms. As referred to by Treiman (2001: 667) the sounding out process.

4.4. Semantic Memory

When the visual information is examined and recognised both orthographically and phonologically, turn is given to the semantic processing of this new information. Understanding what has been recognised is the task of the semantic memory where all the semantic rules of the perceived information are activated. This includes the identification of the semantic properties of this visual information.

5. Automaticity Theory: Theoretical support for Developing Reading Fluency

5.1. Automaticity Theory: Learning New Skills

In our explanation of the three models of reading acquisition and their influence on fluency development, it has been shown that the interactive model is the most convenient model. The LaBerge and Samuels's (1974) model of reading stands on theory which is referred to as LaBerge and Samuels's "Automaticity Theory in reading" (1974), or the "Automatic Processing Theory in reading". The Automaticity Theory in reading follows the assumptions and principles of the Automaticity Theory in learning new skills. Before dealing with the components of LaBerge and Samuels's theory and how it is considered as a theoretical support for developing reading fluency, it is necessary to know more about the principles of the Automaticity Theory and how it contributes in any skill acquisition by explaining how an individual can gain proficiency while acquiring a new skill. We need to explain how learners shift from the early stages of learning a new skill to a more advanced level where they become professional in the performance of this skill.

This theory tends to explain how people acquire a skill starting from the stage where the components of the task are consciously controlled to a stage in which the performance of the task becomes automatic. The first stage in the acquisition of any skill, where the task is novel, is called the controlled processing and when the performance of the task is freed from this conscious control and executed somehow unconsciously this stage is known as the automatic processing. Detweiler and Schneider (1991) explain the mechanisms of skill acquisition in terms of contrasting automatic and controlled processing.

> Automatic processing is fast, parallel, fairly effortless process which is not limited by short term memory capacity, and is not under direct subject control. Automatic processing typically develops when subjects deal with the stimulus consistently over many trials […] Controlled processing is characterized as a slow, generally serial, effortful, capacity limited, and largely is under direct subject control. Controlled processing is required to process novel or inconsistent information. (1991:71)

At the beginning of the acquisition of a new skill, all the aspects of this skill are consciously attended to because they are under a direct control of the brain. This fact explains why the performance of a beginner learner is always slow, effortful. However, with practice the performance of this skill becomes automatic, rapid and effortless; because human performance, argue Detweiler and Schneider (1991: 70), changes markedly with practice. By practicing the same activity many times, the aspects of this skill which once require a conscious attention will be carried out unconsciously or automatically. This means that the learner has gradually gained proficiency in that skill. For Nevills and Wolfe (2004: 3) when someone first learns a skill every aspect is consciously attended to, but overtime and with a great deal of practice, the brain

"remembers" how to carry out all the procedures involved in the skill allowing it to attend consciously to something else.

The model of skill acquisition described above shows how people develop automaticity when acquiring a new skill. Similar to learning to play piano, or to drive a car, learning to read is a skill where the learner starts as beginner and through time and with practice he gains proficiency in that skill. But becoming a professional driver or professional piano player or a tennis player, argue Nevills and Wolfe (2004) is not similar to gaining proficiency in reading, simply because reading is a multi task activity (decoding and comprehension) in which more cognitive processes are involved. So, how is it possible to gain proficiency in reading and what role does the automaticity theory in the reading process?

Since reading is a complex process that involves both decoding and comprehension, it is then necessary that one of these tasks has to be performed automatically (unconsciously) freeing the reader's cognitive attention to be focused on the second. In this case which task can be performed automatically? Hudson et al (2005: 703) suggest that since comprehension requires higher order processes that can not become automatic, in this case it is the word identification (word recognition) that must become automatic. Automaticity in reading, then, refers to the automatic word recognition, or to the reader's ability to decode without conscious thought. This means that his recognition of words is done automatically (Nevills and Wolfe, 2004). To shed more light on the role of the automaticity theory in reading the LaBerge and Samuels's (1974) automaticity theory is a good example.

5.2. LaBerge and Samuels's Automatic Processing Theory in Reading

The critical role fluency plays in efficient and successful reading is based upon a theory of reading called the Automaticity Theory (LaBerge and Samuels, 1974). LaBerge and Samuels (1974) assume that reading words fluently must occur before comprehension is possible. Their theory follows the principles of the automaticity theory in the acquisition of new skills.

> It is assumed that we can only attend one thing at a time, but we may be able to
>
> process many things as long as no more than one requires attention. (1974: 295).

Attention that plays an important role in determining what and how well information is learned, as viewed by Nieuwenstien (2004), is then the first key element of LaBerge and Samuels's automaticity theory. According to Proctor and Johnson (2004: 192), the adequate performance of any skill is often dependent on how to allocate attention appropriately during the performance of the task. In order to achieve successful reading comprehension LaBerge and Samuels see that part of the reading process should be executed with a slight amount of attention. Since the performance of any skill requires attention from the learner, to get engaged in a reading task, attention is required from the reader to derive meaning from the text. As reading is a complex process where the reader has first to recognize the printed words (decoding) and then constructs the meaning form what has been decoded words (understanding). Consequently, both decoding and comprehension require a cognitive attention from the part of the reader that may exceed his limited capacity attention, mainly, if the reader is a beginner or a non-fluent reader.

To describe the state of a beginning reader, Samuels (2006r: 9) asserts that during the reading task the mental process of a beginner is focused on word recognition

process leaving little or no attention for comprehension. When the entire or a large portion of attention is focused on decoding, the construction of meaning becomes difficult. That is why beginning / non-fluent readers use the strategy of switching their attention back and forth, between decoding and comprehension, trying to make a balance between the two components of the reading process. Attention switching is not an easy task; according to Samuels (2006r) that besides being time consuming, attention switching is slow, hard, and effortful on memory and this may result in slowing down the reading process. But, with time and practice, the decoding process can be performed unconsciously, or automatically.

The term *automatic* according to LaBerge and Samuels's theory means that the words in the texts are quickly and accurately recognized by the reader which enables him to focus the unused portion of his attention on comprehension (Samuels,2006,r: 9). According to the LaBerge and Samuels's (1974) theory, when the reader can perform the decoding task with almost no attention, automatically, he becomes a fluent reader whose attention is focused on the comprehension activity. So, if the reader is fluent, then, little of his attention will be focused on decoding leaving his full attention directed to comprehension; consequently, he can perform both decoding and comprehension at once. However, if he is non-fluent this means that a great amount of his cognitive attention will be focused on decoding leaving little of it to comprehension; as a result, he relies on attention switching from decoding to meaning comprehension which will slow down the reading process.

The second key element of LaBerge and Samuels's theory is visual memory. This cognitive ability is used in word recognition (i.e. the ability to extract the printed letters from the page to form words) starting from letters that are the smallest unit, to

combination of letters the next smallest unit, and to whole words as the largest units. The size of the visual unit varies from one reader to another depending on the reader's skill, familiarity with the words. Whereas a beginner reader may focus on individual letters to form words, an experienced reader may focus on the entire word. This fact explains why the amount of time in the processing of a text differs from one reader to another because the size of the visual unit is not the same among readers of different proficiency levels.

The third key element in this theory is the phonological memory. It refers to sound units (i.e. phonemes and morphemes) that map onto the letters and words. So, it is not enough to perceive letters or words on the written page, but rather utter or pronounce the sounds that these letters represents, in other words to know what sounds go with what letters and words. Like the organization of the code in the visual memory, the phonological memory follows the same organization in that the size of the sounds unit in this memory increases in size depending on the reader's ability. Acquiring proficiency in reading means that both the visual and the phonological memory become automated. As they become automated, more space is left in working memory for understanding the meanings of words and text.

The last component of this theory is the semantic memory. Once the new visual information is recognised both orthographically and phonologically, the turn is given to the semantic processing of this information. This kind of processing involves the recall of general knowledge which concerns our general information about the words and their meanings that is stored in the semantic memory. Accordingly, the semantic representation of words is retrieved from the semantic memory to process the new

information in the working memory to facilitate the understanding of what has been read.

LaBerge and Samuels'(1974) theory assumes that since an individual has a limited capacity attention and attention can not be divided among tasks. That is why, it is the practicing of the new skill which allows it to become automatic, therefore, requiring little to no attention in performing it adequately. This, in turn, would facilitate the performance of multiple tasks simultaneously. In this context, Samuels (2006r) asserts the following:

> When the amount of effort used in performing a task drops sufficiently, that person can take on a new task at the same time." (2006r, p.8).

To reach this level of proficiency in reading, according to the LaBerge and Samuels' (1974) theory, the decoding of letters must become automatic to read words, and reading words must become automatic allowing the reader's full attention to be used for comprehension. However, if the identification of letters and words is not accurate and automatic, attention will be then spent on letter identification and not on comprehending what is being read. To conclude, the LaBerge and Samuels (1974) automatic processing theory considers that the simultaneous performance of multiple tasks such as decoding and comprehension means that the reader's decoding is becoming automatic which in turn means that the reader is becoming fluent.

6. Automatic Word Recognition in a Fluent/Skilled reading

The LaBerge and Samuels automaticity theory stresses the importance of the automatic word recognition in a successful reading. According to them, to achieve proficiency in reading, the task of readers is to move from the early phases of sounding out words to a more skilled phase in which word recognition occurs almost

automatically. This developmental change allows the word recognition process to occur fluently and automatically and in turn will facilitate the reader's task in abstracting the meaning from the text. The automatic word recognition, frees the reader's cognitive attention to be devoted to comprehension. The expression "automatic word recognition" has been mentioned a number of times in our research and needs further explanation.

According to Blevins and Lynch (2002: 7), automatic word recognition refers to the reader's ability to accurately and quickly recognize many words as a whole unit. When words are recognized as a whole unit this means that words are quickly and accurately identified by sight. "Sight word reading" (Ehri, 1998) has always been associated with automatic word recognition. According to LaBerge and Samuels's (1974) automticity .theory, by the repeated exposure to print (practice), the reader develops a sight word repertoire in his memory which would facilitate for him the quick recognition of words.

The notion of "sight word" has been first used by Ehri (1998) who states that *sight word* refers to all the words the students recognize automatically/ at sight. According to her, sight reading is a fast acting process that allows the readers to process words in text quickly without attention directed to the word itself. During the reading task, the sight of the word activates that word in the memory including information about its spelling, pronunciation, typical role in sentences, and meaning. Activating all this information about the word in memory is to have access to what has been previously mentioned by LaBerge and Samuels as visual memory, phonological memory, and semantic memory. This automatic access to all these dimensions of a printed word, according to Ehri (1998), helps readers to focus their attention on getting the meaning from what is being read without having to think about deciphering every word.

The importance of word recognition as a key element in a skilled/fluent reading is still subject to controversies between those who consider it as a prerequisite for comprehension- bottom-up and interactive theorists- and those who ignore completely its role: top-down theorists. However, recent theories on individual word recognition consider rapid and accurate word recognition as a vital ingredient in a skilled/fluent reading (Hunt and Beglar, 2005). Today most of the reading specialists agree on the fact that fluent reading always starts with the accurate, fast, and automatic visual recognition of print on which comprehension is based. (Samuels, 1979; Samuels, 2006; Day and Bamford, 1998; Rasinski, 2004)

The gradual development of the automatic processing skills is manifested through the reader's accurate and rapid recognition of words (Samuels, 1979). Because it is not enough to get the word right (word accuracy) if a great deal of cognitive effort is required to do so because it hinders rather than facilitates the comprehension processing argues Kuhn and Stahl (2003). In making the distinction between the automatic word recognition and the strategy of slow letter by letter sounding which is referred to as phonemic decoding, Day and Bamford (1998) give the example of fluent readers when encountering unfamiliar words during the reading task.

> Automatic word recognition is the basis of fluent reading; it is what allows skilled readers to read with apparent ease and lack of effort, rapidly breezing through material […] This automatic, rapid, and accurate process of word recognition should not be confused with the strategy of slow, letter-by-letter, or syllable-by-syllable sounding out of words. That strategy, termed phonemic decoding, is used by fluent readers when they encounter words that are not part of their sight vocabulary. (1998: 12-13).

According to Day and Bamford (1998), when fluent readers encounter these unfamiliar word(s), they would slow down the pace of reading in order to decode them; this will result in their inability to reconstruct the meaning of the sentence or the paragraph in which the unknown word(s) occur. So, the ability to recognize words automatically plays an important role in a fluent reading that is why reading today stresses the importance of rapid word recognition skill as a key to reading comprehension.

Although the automatic word recognition facilitates reading comprehension, as stated in the automatic processing theory in reading, it does not guarantee comprehension. Sadoski (2004: 101) argues that fluency does not automatically guarantee comprehension, though it is regarded as a necessary factor for comprehension. She argues that the presence of word recognition problems might hinder comprehension and the presence of automaticity (the skilled recognition of words with little conscious attention to decoding) frees the reader's attention to higher cognitive processing on which understanding is based. This means that the automatic word recognition is so important in learning to read because it facilitates the reader's task of comprehension by enabling him to use a large portion of his attention in the construction of meaning

7- Characteristics of Fluent / Non-Fluent Readers

Reading specialists have used a variety of terms referring to fluent / non-fluent readers. Some of them have used the term good/poor readers; others have relied on the words skilled/unskilled readers. No matter the word they use, what is important is what makes the distinction between fluent/ non-fluent readers.

Hudson et al. (2005: 702) assert that fluency is one of the defining characteristic of good readers, and the lack of fluency is a common characteristic of poor readers.

According to them, a poor reader reads in a laboured, disconnected fashion with a focus on decoding at the word level which makes comprehension difficult. The ability of comprehending what is being read is then one of the main distinguishing characteristics of fluent readers. Since, the shift from the decoding stage to the automatic word recognition, according to the LaBerge and Samuels's theory (1974), provides readers with the opportunity to focus their full attention on the comprehension of what has been decoded. The same factor that may hinder less fluent readers to achieve comprehension, as their total attention is focused on the decoding stage (Armburster et al, 2003: 22).

7.1. Fluent Reading and Reader's Eye Movement

The critical role of the automatic word recognition in fluent skilful reading raises another important aspect which concerns the reader's eye movements during the reading task. The ability to recognize words automatically, or by sight is manifested in the reader's eye movement when exposed to the print. Studies of readers' eye movements provide some insight into how eye movements during reading differs a fluent reader from a non-fluent one.

Research has also shown that good readers make fewer eye movements. According to Nuttal (1982), "good reader's makes fewer eye movements than a poor one; his (good reader) eye takes in several words at a time" (Nuttal 1982: 33). The ability to extract several words at a single fixation is due to the fact that fluent readers have developed a strong visual memory which facilitates for them the automatic recognition of words. Because they are better at seeing a word in a single eye fixation, fluent readers do not need as many regressions, argue Hudson et al. (2005: 703). And when less fixation and regressions in reading are required, this means that understanding is

accruing simultaneously. Taylor (2003: 118) finds that when there is an excess of fixations and regressions to recognize words, the result will be the expenditure of more time and energy, and this will reduce reading rate and inhibit ease and comfort in reading. More fixations, then, on visual information decrease the speed of reading which can be the case of a poor reader and also of fluent reader when encountering a difficult passage. According to Smith (2004: 88) when a fluent reader encounters an unfamiliar word, or a passage that is difficult to read; the number of fixations increase; consequently, the reading speed goes down. Fluent reader reduces the pace of reading because she/he is forced to use more visual information to try to understand what he reads. This can be said when describing the general state of a non fluent reader.

To describe the state of a poor reader, Samuels (1979: 363) points out that they are characterized by a short saccadic eye movements implying that the reader is relying on letter- by- letter processing; and fixation of a long duration which implies long central processing time. That is why, poor readers can not concentrate or focus on the comprehension of what is being read, since their full attention is focused on the decoding stage and little is left for the comprehension stage.

From what has been said so far, it is the number of the reader's eye movements during the task of reading which makes a clear distinction between fluent/ non-fluent readers. Fluent readers have been found to make fewer eye movements, less regressions and less fixation because they have developed a strong visual memory. This latter facilitates the automatic recognition of words which in turn facilitates their understanding of what is being read as their full attention is focused on comprehension. The opposite could be said about a non-fluent reader who is characterized by fixations of a long duration with more regressions; consequently this will make the

comprehension of what is being read difficult because little of his attention is left for this higher cognitive process.

Conclusion

The Laberge and Samuels (1974) theory of reading has contributed so much in enlightening the research world in the field of reading fluency. Nowadays conception of a fluent reading is the ability to read prosodically, accurately, and automatically. Accordingly, fluent readers' performance during the reading activity is that they read in an effortless and a flowing manner because they recognize words automatically by grouping them quickly into a meaningful unit (a chunk). Fluent readers read in chunks rather than word by word, this automatic process helps them gain meaning from what they are reading. That is why, fluent readers' oral reading sounds natural as if they are speaking, and furthermore, they keep this performance for a long period of no practice and can generalize this performance across texts. (Hudson et al, 2005: 702). The apposite can be said for non-fluent readers, who read word by word where the focus is on decoding individual words, as a result little attention is left for comprehending what is being read, and most importantly, their oral reading is slow, effortful and sounds disconnected. Fluency is so important because not only it makes a radical change on the oral reading performance; moreover, it provides a strong link between word recognition and comprehension (Pikulski, 2006). Developing this skill needs to be one of the main objectives of any reading program; especially that a variety of instructional teaching methods are available nowadays.

Chapter Two

Repeated Reading: an Instructional Teaching Method

Introduction

Developing reading fluency has become one of the main concerns of educators and researchers. The LaBerge and Samuels's automaticity theory (1974), which provides only the theoretical foundation for developing reading fluency (no practical implication) has encouraged researchers to develop new methods that follow the teaching implications of this theory. Samuels is a pioneer in putting into practice this theory. In 1979, he established a new method which he called the Repeated Reading method.

This chapter covers two important aspects; one of them is how to teach reading fluency whereas the second aspect concerns the way to measure it. We will start with the instructional methods for teaching reading fluency where the focus is on the Repeated Reading Method. The review of the Repeated Reading method procedures is fundamental in our research, since the same procedures are to be followed in our field work. We will, then, review the literature of the Repeated Reading Method in L1 language reading and simultaneously in L2/FL reading. This review is of a great utility in the present study, because we are going to conduct this method in a new FL setting. The different strategies of the Repeated Reading Method (student-adult reading, choral reading, tape assisted reading, partner reading and reader's theatre) are variations of Samuels's original method which are highlighted in this chapter too.

To evaluate the effectiveness of any teaching instructional method, we need to employ the best tool of measurement available in the field of the study. To measure the students' oral reading fluency progress, two different types of tests are compared; the Informal Reading Inventories (IRIs) test and the Curriculum Based Measurement (CBM) test. Emphasis will be put on the CBM test for some reasons. First, it is a

commonly used tool in measuring oral reading fluency (Samuels, 2006). Second, we have relied on this test in our experimental study in order to evaluate the effects of the Repeated Reading Method on students' oral reading fluency. It is hence important, in the current study, to review the procedures to be followed while administering the CBM test in reading, as they are of a great utility in the present study.

1. Teaching Fluency

Reading fluency which has long been neglected and totally absent from the reading instructional programs (Rasinski, 2006f), is receiving more and more importance recently, because fluent reading is becoming a distinguishing feature of good readers and the lack of fluency as a main feature of poor readers (Hudson et al. 2005). Researchers in the field of fluency development conclude that instead of letting this skill develop by itself as being "a logical outcome of literacy" (Smith, 2004) where the consequence may be positive or negative, it would be better if fluency instructions are embedded in all reading instructional programs right from the beginning of learning to read (Samuels, 1979; Badrawi, 1992; Rasinski, 2004; Pikulski, 2006; Samuels, 2006t). Reading fluency, then, is going to be under a regular observation where the instructors are ensured that this skill is on a gradual progress. So, fluency instructions should be part in any reading program and this can be achieved by teaching and assessing fluency progress the same way we teach and assess vocabulary acquisition and other skills.

Developing fluent word recognition skills of readers is becoming an essential issue, since the time it has been proved that slow and effortful word recognition might impede comprehension and the presence of automaticity, *the rapid and the effortless recognition of words,* frees the reader's attention to the comprehension of what is being read (LaBerge and Samuels,1974) . Developing reading fluency is, then, a prerequisite

not only for L1 readers (NRP, 2000; Samuels, 1979; Rasinski, 2004; Rasinski, 2006) but for L2/FL readers too (Anderson, 1999; Day and Bamford, 1998). There is no difference between L1 fluent readers and L2/FL fluent readers, asserts Day and Bamford (1998: 17), as the cognitive processes involved in a fluent reading are the same for both L1 and L2/FL readers. When both L1 and L2/FL students get engaged in a reading task they start by decoding, then understanding to gain the meaning of what is being read. By developing the automatic word recognition skills of either L1 or L2/FL, students can devote the unused portion of their cognitive attention to a higher cognitive processing on which understanding is based. Consequently, achieving automaticity in reading as a foot step towards a fluent reading is equally important for L1 students and L2/FL students too.

To gain proficiency in the target language is the aim of teaching English as Second or Foreign Language. It is then almost necessary to develop reading fluency among L2/FL students, as it is regarded as one of the promoting aspect in language proficiency (Samuels, 1979). Even though fluency alone does not guarantee successful reading comprehension, still good reading ability is virtually impossible in the absence of fast and accurate word recognition skills (reading fluency) as it has been discussed so far. In order to develop reading fluency in L2/FL setting, Eskey (1988: 97) rises an important question on how can we develop this ability within L2/FL language students who are not exposed to the same linguistic environment and who have problems with the language itself. To overcome the problem of the language, suggests Badrawi (1992), L2/FL language students have to acquire adequate language competency and experience of course this is realized by increasing their exposure to the target language. Similar to Badrawi's issue, Day and Bamford (1998) suggest the following:

[…]Second language readers need linguistic, world, and topical knowledge, and it appears as though they can acquire this knowledge through second language reading. (1998: 19)

As an answer to Eskey's question and from what has been said by Badrawi, and Day and Bamford, to develop reading fluency, L2/FL language students are required to do more practice through the wide exposure to the written language. To rise the students' opportunities to do more readings, they will soon overcome the problem of the language.

Reading fluency is becoming a vital ingredient in reading instruction, because slow and effortful reading (lack of fluency) impedes the ability to achieve comprehension effectively and efficiently for both L1 and L2/FL learners. The importance of reading fluency in the overall reading proficiency requires from L2/FL educators to regard this skill (improving reading fluency) as one of the major goals in any reading instructional program.

2. Instructional Methods for Teaching Reading Fluency

"If you want to read better you have to read more." **or** "practice makes perfect." These two quotations are almost the best advices for any one who want to improve a given skill. To develop the skill of writing, for example, the learner is required to have extensive written assignments that will develop and perfect his writing. the same principle is valid for all language skills speaking, listening and reading.

How is reading taught? Reading is always coupled with comprehension. Teachers, generally, say they are teaching reading comprehension for their students. The lesson, in this case, is mainly based on reading comprehension exercises where the students experience little in class reading. In other words, the main objective of the reading

lesson is to check the students' understanding (comprehension) via written exercises and not to test how well the student is reading, or better say how the reading skill is acquired. Therefore, to develop this skill, L1 or L2/FL readers should be given opportunities to practice reading in class as a beginning and the progress of this skill, of course, will be out of class. In this context, Nuttal (1982) suggests the following:

> […]If we want really to develop the skill of reading among our students in class first we have to give them reading assignments, because if we do not give assignments that require them to read, some students will never feel the need to read at all and thus will never acquire the habit or the skill. (1982: 168-169)

It is then apparent that becoming a better reader involves practice and more practice in and out of class. Hence, the development of reading fluency is gradual and requires practice through an extensive exposure to print. So, an instructional method is most appropriate, most necessary, in promoting adequate progress of reading fluency.

According to Samuels (2006r: 18) apparently there are two routes to fluency development. One route concerns getting the students engaged in an extensive practice of reading books that are graded to their level of reading development. His argument is that by encountering high frequency common words in a variety of contexts, students will develop the ability of recognizing words automatically. The other route for building fluency is through the different varieties of the repeated reading. Within this scope, there are two major instructional methods related to fluency (NRP, 2000). The first approach ***Repeated Oral Reading*** commonly called "Repeated Reading" (Armburster et al., 2003: 24). It encourages students to read passages out loud with systematic and explicit guidance and feedback from their teacher. This approach is known as the direct approach. The second approach, however, which is more indirect

known as ***Independent Silent Reading***. It encourages students to read silently on their own (independently) inside and outside the classroom with little guidance and feedback from their teacher. So, the direct approach involves modelling and practice with repeated reading under time pressure, and the indirect approach involves encouraging students to read voluntarily in their free time.

In this research the focus is on the first method "Repeated Reading". This method that has been proved to be more effective than any other method in improving reading fluency either in L1 setting (Samuels,1979; Dowhower,1989; NRP,2000; Blevins & Lynch,2000; Rasinski, 2004)or in L2 setting (Anderson,1999; Grabe,1991; Tagushi and Gorsuch, 2002; Taguchi, Gorsuch, and Takayasu-Maass, M. 2004). As we want to check the effectiveness of the Repeated Reading Method, in the present study, it is then important to shed light on its principles and procedures.

2.1. Repeated Reading: Methodological Principles

Repeated Reading is an instructional method used to develop automaticity in reading. This method follows the principles of the Automatic Processing Theory of LaBerge and Samuels (1974) which claims that with a multiple exposure to the same orthographic patterns, the cognitive focus of the reader is allowed to shift from decoding and encoding to meaning. In other words, the rereading of text enables the reader to become automatic in the recognition of words, and this will free his attention to comprehend what is being read. According to Samuels (2006r: 14), there is a problem with the Laberge and Samuels's automaticity theory in that it is only a theory without any practical suggestions.

The Repeated Reading method has been developed by Samuels (1979) in an attempt to apply the teaching implications of LaBerge and Samuel's automaticity

theory. Samuels has developed the Repeated Reading, a method that promotes fluency in reading. In his article *Toward a Model of Reading Fluency (2006t)*, Samuels compares learning to become a good reader with learning to become good at sports or at any other skill. For him athletes or musicians gain proficiency by practising the same task over and over until they become professional in these skills. The repetition of the same task a number of times facilitates the performance of this task in spite of its complexity at the very beginning of the skill acquisition. Similarly, in the Repeated Reading, students work on reading as they work at making music; they continue working with each text until it is fluent. Samuels's conclusion is instead of having our students encounter a new selection daily, a better method to building fluency would be to have them read the same selected passage several times until they reach a predetermined level of fluency. The level of fluency is set according to the student's grade level, where each level requires a given standards and norms that the students should achieve before moving to the next grade.

2.2 Repeated Reading Procedures

To test this method, Samuels has worked with beginning L1 readers, or as he refers to them *mentally challenged beginning readers* (Samuels, 2006t: 27). He asks his students how to become good at sports: they all say that it requires practice. Then, he explains to them that becoming a good reader is similar to becoming good at a sport or at any other skill, and that they are going to practice how to become good at reading stories. He selects a short children's story which he divides in passages of about 150 words, then each of his students would have a copy of the passages that covers the short story. Before asking the students to practise the first passage of the story, Samuels models a good oral reading for them by reading the passage for his students with a proper expression. Students, then, practise at their desks. First, each student reads the

passage to his teacher who records the word per minute reading rate for the story, as well as the word recognition errors. After that, the students reread the 150 words passage a number of times, until each one could reach the criterion of 85 WPM (word per minute). Whenever they reach this criterion, the students are given the next passage.

Samuels's first observation is that with each rereading of the passage the word recognition errors are decreasing and the reading rate getting faster. He notices that all the students are progressing but at their own pace, meaning that the progress is not the same for all the students. Samuels draws his conclusions from what has been observed during the treatment period. Then, he describes the Repeated Reading method in an article for the reading teacher in 1979. This has been the birth of the Repeated Reading method. According to Samuels (2006r: 16), the Repeated Reading Method is an offshoot of the automaticity theory which marks the beginning of numerous studies that try to investigate for variations of the repeated reading.

Another work, similar to Samuels, is done by Carol Chomsky (1976). She uses a similar method with poor readers; her aim is to find a new technique for teachers whose students fail to make an adequate progress in reading. In describing Chomsky's technique, Samuels (2006r: 16) states that what Chomsky does, that is different from my Repeated Reading method is to tape record a children's story, and the children who are having trouble learning to read listen to the tape while they look at the words in their story. When they have listened to the tape enough times; consequently, they could read the story on their own. Within several months of applying this method, Chomsky concludes that this procedure helps slow and halting readers in increasing their fluency rapidly and with apparent ease. Even though, the two techniques are different in the

application, but what is apparent is that both Chomsky and Samuels come upon methods for helping struggling readers. Whereas Samuels used a live model of reading, Chomsky used an audio taped model of reading. Chomsky's method has been used as a variation of Samuels's repeated reading method.

In Samuels's Repeated Reading method, an individual student first reads aloud to an adult a passage from a graded selection where the adult gives immediate feedback to the student's word recognition errors. Then students reread the passage silently a number of times. After that, each student reads the passage aloud to an adult who recorded the word per minute reading rate of each passage as well as the word recognition errors. On the basis of what has been recorded the teacher decides if the student can move to a new passage or continue practising the same passage.

This new technique requires the reader to read the same passage repeatedly numerous times until a particular criterion is met, or until the reader is able to read it with ease and comfort. In this context, the question that may be asked by any instructor is about the number of times the selected passage should be practised. Anderson (1999: 3) states that the more exposure a student has to language through reading, the greater the possibilities that over all language proficiency will increase. Likewise, Smith (2004: 295) argues that it is usually more effective to read a text quickly, more than once, rather than to plod through it slowly once only because, according to him, the number of rereading will automatically increase reading speed. So it is the number of the repetitions which predetermines the success of the repeated reading method.

Researchers find that seven rereading or seven repetitions of the same passage are sufficient in increasing oral reading fluency because Samuels when he, first, introduces the repeated reading method, he does not precise the number of the repetitions. But,

later the number of repetitions is reduced to only four times, since research by O'shea et al. (1985) has shown those four repetitions of the same text are usually sufficient for a reader to reach automaticity. They points out the following:

> Four readings appear to be optimal since, after four readings, 83% of fluency
>
> increase between one and the seven readings is achieved (1985: 138).

Hence, the number of repetition which is the main criterion the Repeated Reading method provides the reader with the chance to improve his reading fluency.

To evaluate the efficiency of this method, educators have embedded the repeated reading method within their teaching instructional programs, and then observed the effect of this method on some predetermined reading skills. In other words, empirical investigations have been conducted first in L1 setting and, relying on these findings, similar studies have been carried on in L2/FL setting.

2.3. Repeated Reading in First Language Reading/ L1 setting

Since the development of this method, the R.R method has been extensively studied in English as First Language contexts (L1 setting); thereupon, studies have shown that the R.R method is effective in developing reading fluency and comprehension of monolingual readers of English ((NRP, 2000; Samuels, 1979). In his description to R.R method, Lackaye (2000: 1533) states that this method which involves multiple oral readings of connected discourse; aims at making the decoding of this latter automatic, which will obviously increase fluency, and frees the reader's attention to comprehension of the passage. So, this method is useful for enhancing reading fluency; it gives students the opportunity to practice a text over and over until the text becomes more and more familiar to be decoded automatically. As a result, more cognitive capacity will be focused on comprehending what is being read.

Most of the studies undergone in this field agreed on the efficiency of the R.R method in increasing automatic word recognition, reading rate and word accuracy. (Samuels, 1979; Blevins and Lynch, 2000; Invernizzi, 2002). In addition to that, this method yields other benefits: as increasing the reader's comprehension of the selected passage and improving his oral reading expression "prosody" (Dowhower, 1989 in. Richards, 2000). Furthermore, it facilitates the reading of difficult texts, argues Blau (2003). According to Blau (2003: 44), the rereading method is one of the most powerful strategies for reading difficult texts. Dowhower (1989), a pioneer in testing the efficacy of this method within monolingual learners, points out the benefits of the Repeated Reading method:

> R.R method increases rate, word accuracy which then transfer to new texts. […]
> This method may also lead to increased comprehension of the selected text as a
> result of multiple exposures."(in. Richards, 2000: 536).

Most of the studies that have been carried in L1 setting have been gathered and analyzed by the National Reading Panel. For such reason, it is better to conclude using the NRP's summaries. According to the Reports of the NRP (2000), the researches conducted in L1 setting have demonstrated that repeated reading improves simultaneously reading rate, word accuracy, reading with expression (prosody) and reading comprehension.

2.4. Repeated Reading in Second/Foreign Language Reading

The importance of developing fluency in reading within L2/FL learners has become an important issue for pedagogy in L2 setting (Nation, 2001). Especially, that researchers in L1 setting has provided L2/FL educators with proofs on the effectiveness of the R.R method on the over all reading proficiency.

There have been few empirical studies that investigated the effect of the R.R method in L2/FL setting. Tagushi and Gorsuch conducted a study with L2/FL learners at the University of Japan in 1997 published in 2002. They examine the effects of RR on English oral and silent reading rates of 15 Japanese university students learning English as a Foreign Language. In their study, the participants complete 28 in-class R.R sessions which cover 10 weeks. In each session, they read a passage silently seven times three of which while listening to an audio taped model of the passage. Taguchi and his colleague notice that silent reading rate increases, of course within the practised texts. However, when the participants are asked to silently read or read aloud new passages, they do not transfer their gains in reading rate to the new passages. In this study, Taguchi and Gorsuch want to confirm if R.R method really promotes the transfer of new acquired reading skills to a new unpractised passage. It is not the case, but the only exception in this study is that lowest-level readers show a significant improvement in their oral reading rate of the new passages. In interpreting the results of their study, Tagushi and Gorsuch, consider that the lack of transfer effects of reading rate and comprehension of the RR group is due to the shortness of the treatment period (only ten weeks).

Three years later, as a follow-up to the study of Tagushi and Gorsuch, another experimental study is carried on at the same university by Tagushi, Gorsuch and Takayasu which is published in "the Reading in a Foreign language Journal" 2004. The main objective of their study is to explore the effects of Assisted Repeated Reading on silent reading rate and reading comprehension. This time the treatment period is longer than the previous one (from 10 to 17 weeks where the number of the RR sessions increase from 28 to 42 sessions). In their study, they compare two instructional methods, the Repeated Reading and the Extensive Reading method. Mainly the

Extensive Reading has been proved as an effective method in developing silent reading fluency and comprehension in L2/FL settings (Day and Bamford, 1998). The control group follows the extensive reading instruction and the treatment group, however, follows the R.R instruction. In this study, the focus is on whether and how assisted repeated reading with an auditory reading model enhances EFL readers' fluency. They find that the assisted repeated reading significantly increases the reading rate; and in addition to that, students transfer the gains in reading rate to new unpractised passages. As far as gains in reading comprehension, however, they do not detect any transfer of these gains.

In addition to the quantitative data obtained in this study, Tagushi, Gorsuch and Takayasu (2004) investigate on the effectiveness of the two different instructional methods used in their study through a qualitative data which is based on the participants' perceptions on the efficiency of two methods. This qualitative data is collected using a questionnaire where the participants report that both methods have increased their motivation to read and increased their opportunity to deal with unknown words. Tagushi, Gorsuch and Takayasu conclude that RR method is a promising method as Extensive Reading for enhancing second and foreign Language readers' fluency.

It would be better to end this discussion with Anderson's view on the efficacy of the R.R method. He concludes that R.R method helps empower 2nd Language readers and strengthens their metacognitive awareness of faster reading rates (Anderson, 1999: 3). This means that the RR method helps both L2 and EFL learners to move beyond word by word reading level to a more advanced level in which words are recognized almost automatically. For Anderson (1999), this method enables the reader to read in chunks rather than word by word in order to gain greater fluency in reading.

3. Strategies of Repeated Reading

As it has been said, so far, in section (2.1-2.2), Samuels's (1979) original method called for readers to reread a series of short passages orally until they were able to read it at a word per minute level that vary according to the level of proficiency of the reader. Chomsky (1976) in her turn used a similar method to that of Samuels with the only difference that instead of using a live model, she used a tape recorded model of reading. Relying on Samuels's repeated reading method, currently, there are many variations of the repeated reading method. The RR method can be presented and practiced in different ways. These variations in practising orally the repeated reading of texts includes student-adult reading, choral (or unison) reading, tape-assisted reading, partner reading, and readers' theatre.

3.1. Student-adult reading

Student-adult reading is a type of reading where the reader listens to a model of a fluent reading provided by his/her teacher or the adult reader. First, the reader reads the same passage aloud and the teacher or the adult provides help as needed, to help the reader in identifying problem words. The reader, then, rereads the passage more times until he/she can read it comfortably with ease and few errors (until the reading is quite fluent). The number of the rereading varies according to the reader's level of proficiency and to the level of difficulty of the text. This should take approximately three to four rereading because for O'shea and Sindelar (1985) four rereading are sufficient for the reader to achieve fluency.

3.2. Choral reading

In choral, or unison reading, students read along as a group with their teacher the same text saying each word together. To do so, students must be able to see the same

text that their teacher is reading. So, the teacher has to provide the students with the same text that he is reading. Either the students follow along as their teacher read from a big book, or they read from their own copy of the book. Moreover, it is required to choose a book which is at the independent reading level of most students. In choral reading the teacher begins by reading the book aloud as he/she models a fluent reading. Then he/she rereads the book this time he invites students to join in as they recognize the words he/she is reading. The rereading practice should continue to more than three times, until the students become able to read the book independently. In choral reading the re-reading practice can take more than one session depending on the length of the book. Rasinski (2003) points out the benefits of choral reading:

> Choral reading is also a wonderful way to build community in the classroom. For example, each morning as students read and recite the same book, they are declaring their unity as a community of learners. This routine also provides support for those who are not yet fluent. (2003 :58)

Choral reading is used in many contexts such as rehearsing poetry, practising roles in plays….

3.3. Tape-assisted reading

The tape-assisted reading or reading while listening method (Chomsky, 1976) allows students to read continuous texts along with a taped version of the text. It involves reading while listening to fluent audio taped reading model. According to Armbuster et al. (2003: 28), this strategy requires reading aloud simultaneously or as an echo with an audio-taped model. To use this strategy the teacher is required to select a book at a student's independent reading level and a tape recording of the book read by a fluent reader at about 80-100 words per minute. In practising tape-assisted reading, for

the first reading, the student should follow along with the tape, pointing to each word in her or his book as the reader reads it. Next, the student should try to read aloud along with the tape. Reading along with the tape should continue until the student is able to read the book independently, without the support of the tape.

3.4. Partner reading

Partner reading, or paired reading is a type of reading where pairs of students take turns reading and rereading aloud the same passage to each other. For partner reading, more fluent readers can be paired with less fluent readers. In other words, the stronger reader reads the passage first, providing a model of fluent reading; then, the less fluent reader reads the same passage aloud. The stronger student gives help with word recognition and provides feedback and encouragement to the less fluent partner. The less fluent partner rereads the passage, until s/he can read it independently. According to Koshinen (1986) this technique of repeated reading requires the student to read a short passage to a partner who's in turn gives feedback when needed. Then, the partners switch roles to avoid frustration. For more appropriateness of this technique the pairs should be selected as follows: the above-level readers with on-level readers, and on-level readers with below level readers.

The purpose of this strategy is to provide the opportunity for all the students to read orally, so that less fluent readers can gain self confidence. Moreover, this strategy of repeated reading lessens the burden from the teacher; and thus, gives him the opportunity to guide and observe the performance of the pairs; and at the same time, provide guidance and feedback when needed.

3.5. Readers' theatre

Readers' theatre or script reading is another type of reading in which students rehearse and perform a play for peers or others. In describing this strategy, Rasinski (2003) points the following:

> In reader's theatre, students stand in front of an audience, usually made up
>
> of their classmates and reads from script. (Rasinski, 2003: 104)

Students read from scripts that have been derived from books rich in dialogues. They play characters who speak lines or a narrator who shares necessary background information. The fact that students have to stand in front of the audience, student are provided with a legitimate reason to reread text and to practice fluency.

According to Shanahan (2006: 31) the different R.R strategies (paired R.R, Assisted R.R, Choral reading…) share in between some common point, in that all of them require oral reading that start with a model of a fluent reader, feedback (teacher's assistance), and most importantly they require repetition of the reading until the text can be read well by the students: read accurately with an appropriate speed, and with a proper expression. In other words, what it is common with this variety of strategies of repeated reading is that all of them require: modelling, rereading from the student, and immediate feedback.

4. Characteristics of Texts Used for Fluency Practice

Fluency develops as a result of increasing students' opportunities to practice reading with high degree of success. One aspect of oral reading fluency that has not been addressed in the previous researches is the type of texts most beneficial for developing fluency. According to Invernizzi (2002), the kind of texts used for Repeated reading instruction has not received much attention in the literature; instead, the

emphasis has been based on using texts graded to the level of students. Adding to that, asserts Armburster et al. (2003), the text should be relatively short depending on the age of students. Until now researchers are still investigating on the type of text that is more efficient in improving reading fluency (Chrisman, 2005). But until we reach concrete evidence from many studies similar to that of Chrisman (2005), in selecting the reading material for reading fluency practice, researchers advise the reading teacher to respect the following characteristics (Samuels, 1979; Invernizzi, 2002; Mc Ewan, 2002; Armburster et al,. 2003; Sousa, 2004; Shanahan, 2006).

4.1. Level of Difficulty of the Text

The level of difficulty is the first element to be regarded in selecting the reading material. Using texts that are neither difficult nor easy is one of the requirements in the selection of texts. Students should practice rereading aloud texts that are reasonably easy for them. In other words, texts which mostly words are known or can be decoded by the students. It is then required to use texts that are at the students' independent level. According to Sousa (2004: 86), a text which is at students' independent reading level can be read with about 95%accuracy, that is to say, students can decode and understand 95% of its words. Because if the text is more difficult, argues Sousa (2004), students will focus on word recognition. Hence, they will not have an opportunity to develop fluency, since more difficult text will hinder the development of fluency rather than enhance it, as students will spend so much effort on decoding (Sousa, 2004: 86).

4.2. Length of the Text

Whenever the level of difficulty is set, the second point in the selection of the reading material for fluency practice is the length of the text. Researchers has agreed on using texts that are relatively short, probably 50 to 200 words, depending on the age of

the students (Samuels,1979; Armburster et al.,2003; Sousa,2004). Why short texts rather than long ones? The text should be restricted, simply because, it should be read a certain number of time. Accordingly, only short texts that provide this opportunity (the rereading activity).

4.3. Variation in Selecting the Reading Material

As far as the kind of the reading material to be used in practising oral reading fluency, researchers have not agreed on which kind is more appropriate to improve learners' reading fluency (Invernizzi, 2002).In practicing reading fluency, argues Sousa (2004: 86), it is preferable to use a variety of reading materials including stories, non fiction, and poetry to maintain the student's interest. However, Shanahan (2006: 33) suggests the use of prose rather than poetry. For him prose is a prerequisite in fluency practice, because poetry first is read occasionally and second it is not enough that one became fluent with poetry, but must be able to read prose with its different rhythms. He concludes that to practice fluency, it is preferable to use the same material used for reading comprehension. On the other hand, Mc Ewan (2002) advises the reading teacher if he decides to use texts from the curriculum materials, he should select those passages that have minimal dialogue and no unusual names or words.

5. Measurement of Reading Fluency

Measurement or assessment is an important step in evaluating the effectiveness of any instructional program in use. This can be done through the evaluation of the students' performance prior, or during, or at the end of the program. Since the R.R method has been proved by researchers either in L1 or in L2/FL setting to be an effective method in enhancing learners' reading fluency, it is almost necessary to check the effectiveness of this method in the new FL setting which is provided in the present

study. The aim is to show if the RR method has a positive effect on student's reading fluency. That is to say, can the RR method simultaneously increase the components of reading fluency- reading speed, word accuracy and prosody?

The ability to measure students' level of achievement in fluency and monitor their progress, according to Rasinski (2004) is the key to successful fluency teaching. In other words, when the teacher checks regularly his students' fluency achievement by monitoring their progress helps him to evaluate and determine the effectiveness of the current fluency instruction. Furthermore, Armburster et al.(2003) sees that this step will help the teacher to set or modify the instructional goals that has been set before getting engaged in this new instructional program.

5.1. Informal Reading Inventories/ IRIs Test

How do we assess oral reading fluency? To establish any system of measurement is mainly dependent on how the construct to be measured has been defined by the researcher. According to Samuels (2006r: 18) though the routes to fluency development are clear, the routes to the measurement of this latter are in the state of flux. This means that researchers have succeeded to establish different instructional programs which objective is to develop reading fluency, but the system of measurement is still in a state of a continuous change. Various ways have been employed to measure reading fluency. This includes Informal Reading Inventories (IRIs) which has long been used as a fluency measurement tool where the decoding word accuracy is the main indicators of reading achievement. Studies have shown that the administration of complete IRIs examination can take one or two hours (Rasinski, 2004). This kind of examination is time consuming which requires from the reader to read multiple word list and passages orally and to be checked on comprehension for each passage. Besides being time

consuming, the IRIs does not measure fluency; it measures only word accuracy. Thus, it was almost necessary to put into practice a new tool of measurement capable of measuring reading fluency as represented by reading rate and word accuracy during the same test. Moreover, this new tool of measurement should be easy to administer and not time consuming. For Sousa (2000) and Armburster (2003), the easiest way to assess fluency is to take timed samples of students' reading and to compare their performance (number of words read correctly in one minute) with published norms or standards.

5.2. Curriculum Based Measurement / CBM Test

The need for a reading assessment that measures the students' reading performance continuously during instruction and at the same time easy to administer has led researchers to think for a new tool of measurement. In 1985, Deno has developed a new tool of measurement that includes all these characteristics previously mentioned. The Curriculum Based Measurement test or the CBM test directly measures oral reading fluency that is why it has also been called Oral Reading Fluency assessment (ORF). What makes the CBM test different from the other assessment tools is that it can be given frequently, or even daily if desired, because of its easiness. How does the CBM function and how is fluency measured through this test? In his description to the CBM test, Shinn (1989) points out the following:

> In CBM, assessment focuses on measurement of observable pupil skills […]
>
> students must actually perform the behaviour of concern[…]For example in reading, rather than ask students to read passages silently and then to write answers, the examiner listens to the examinee read aloud and conducts the assessment on this sample of behaviour. (1989: 31)

The particularity of the CBM test in reading is that the examiner has to collect a sample of the examinee's reading performance. On the basis of this sample of behaviour, the assessment is built. So, the focus during a CBM test is on the direct measurement of observable behaviour. The direct measurement, according to Shapiro (1987), represents the behaviour to be assessed by noting its occurrence. This will enable the examiner to empirically verify the data and not to infer from the observation of other behaviours (Shapiro, 1987 in. Shinn, 1989: 31).

Similar to the IRIs, the CBM test requires from the reader to read texts that are graded to their level of proficiency, orally. However, the CBM test is done in one minute only. During this period, the examiner records the number of errors made by the examinee and at the same time marks the total number of words read in one minute. The collected data can be graphed to demonstrate student progress. The graphing or the charting of the collected data is so important because it keeps the student motivated to do better. Charting is effective, argue Blevins et al (2000), in that students become focused on their own mastery of the task and competing with their own past performance. In addition to that, when they consult their graphs regularly (before the beginning of the RR session), they have concrete evidence that they are making progress.

Through the regular examination of the students' graphs the instructor is given the opportunity to predict, in a short time, whether the instructional method is effective or not; he checks whether it is working or needs to be changed or modified. The CBM test enables the teacher to check if the student is making progress in the skill under observation. If the student's performance is unchangeable, immediate measures should be taken. As it is explained by Mc Ewan (2002: 53-54), if the teacher finds that the

student improves by at least one to two words weekly in the number of CWPM, this confirms that the student is making a progress in fluency. On the other hand, if the student's oral reading remains unchangeable, even after several weeks of intense instruction and practice, the teacher has to determine what kind of additional instruction may be needed.

The CBM test, then, facilitates the teacher's task in following the track of his students' progress, by providing him with necessary data about the effect of the current instruction on the skill being observed. Thus, important decisions would be taken, either to follow these instructions or just modify them if they are not working. Although the CBM test is the only method available for measuring reading fluency, the CBM test, however, measures only one aspect of fluency that is the ability to read words rapidly and accurately. Other fluency aspects are not included in this test such as: the measurement of prosody and of comprehension. That is why, Samuels (2006) considers the CBM test as a test of reading speed, even though it is the commonly used method for assessing reading fluency.

6. How to Administer a CBM Test

The CBM test requires from the teacher to follow some particular steps which include where the test takes place, the required materials and the directions given while administering the CBM test. In administering a CBM test, the following materials should be present before hand; the examinee's copy of the oral reading passage, the examiner's copy of the same oral reading passage different from the examinee's copy in that each line ends with the number of the words included in that line, a pen for scoring, a timer or a stop watch, the administration script, and tape recorder (Deno et al., 2002: p6).

The examiner has to sit down individually with the examinee in a quiet location which can be a corner of the room. The examiner has then to give some directions to the examinee before starting the examination. These directions that are typically used in CBM should be explained and clarified for the examinee prior the oral reading. In table 1, Deno and his colleagues (2002) point out the directions that should be followed during the CBM test.

Say to student: When I say please begin" start reading aloud at the top of this page. Read across the page. **[demonstrate by pointing]** Try to read each word. If you don't know, I'll tell you. If you get to the end of the page, start over. Be sure to do your best reading. Are there any questions?

[Pause] Please begin.

Start your timer.

If the student reaches the end of the pages and does not continue, point to the first word and ask the student to start over. At the end of 1 minute place a bracket or a double slash after the last word read and say: Please stop

Table1: The Administration Script

From "Progress Monitoring: A Study Group, Content Module"(Deno et al., 2002: 6)

The examinee has to follow the instructions given by the examiner prior the beginning of the test. Then, he has to read aloud three consecutive passages where he is free to start with any passage. The examinee should know that each passage requires one minute oral reading. Meaning that, he has to read aloud for one (1) minute the first reading passage, followed by one minute reading the second passage, and then another one minute reading for the third one. Concerning the length of the reading passage, Deno et al. (2002) assert that it should be short with a minimum of 150 words.

During the student's reading, the examiner takes notes of any decoding errors made by the examinee in each passage (the errors should be marked immediately on the

examiner's copy). After that the examiner computes the number of words read correctly in each passage. According to McEwan (2002: 54), to get the total number of the Correct Word per Minute (CWPM), the examiner has to subtract the number of errors from the total number of words read in one minute. In other words, the examiner calculates the number of the Correct Word per Minute (CWPM) for the three passages. He, next, chooses the middle score which is referred to as the median. Why choosing the middle score? Deno et al. (2002: 7) consider that the median is the best indicators of the student's true reading. Like the average, it provides a more precise and stable estimate of a student's current level of reading performance. For example, the following is the median score of one of my participant in this study.

One of the participant scores on the three passages of the pre test are:

Passage one: 96 words read correctly

Passage two: 106 words read correctly

Passage three: 118 words read correctly

The participant median score for the number of words read correctly is: **106** CWPM

To administer a CBM test the question that may arise among the examiners is what to score as correct or as incorrect reading words. In other terms, we have to determine the quality of correct and incorrect words in order to establish the reading scores. According to McEwan (2002: 54), what is generally counted as errors are substitutions, or incorrectly identified words, whereas insertion and self- correction are not counted as errors? Deno et al (2002) provide the examiners with some hints and guidelines on what to consider as correct, or incorrect concerning the examinees' mistakes in a CBM test. These scoring guidelines are explained in the following table.

Scored as correct	Scored as errors
Correct pronunciation: the word must be pronounced Correctly	**Mispronunciation/Word-substitution:**
	eg: the dog ate the bone WRC=5
	Read as:"the dig ate the bone" WRC=4
Repetitions: repeated words are counted as correct	WRE=1
Eg Ted reads a letter WRC=4	**Omission**:each word omitted is an error
Read as:" Ted reads…Ted reads a letter " WRC=4	eg: Ted climbed the oak tree WRC=5
	Read as:" Ted climbed the tree" WRC=4 WRE=1
Self-corrected words: words misread initially but corrected within 3s(seconds) are counted as correct	**Hesitations**: when the students hesitates fails to read the word within 3 seconds
eg the river was cold WRC=4	eg: Mario saw an elephant WRC=4
Read as:"the river was could…(2s)… cold " WRC=4	*Read as:"*Mario saw an ell…" WRC=3 WRE=1
nsertions: when a word is added it isn't counted as correct word not as reading errors.	**Reversals:** when two or more words are transposed, those words not read in the correct order are errors.
eg Sue was happy WRC=3	eg Charlie ran quickly WRC=3
Read as:" Sue was very happy" WRC=3	*Read as*:" Charlie quickly ran" WRC=1 WRE= 2
Dialect/Articulation: variations in pronunciation that are explained by local language norms are not errors.	

Table 2: Scoring Guidelines

From "Progress Monitoring: A Study Group, Content Module"(Deno et al.,2002: 7-8)

In addition to that, Deno et al extend the scoring guidelines presented above with a list of some special scoring, in order to shed light on all kinds of words that the reader may encounter in a reading passage. Deno et al (2002) also determine how to score numerals, hyphened words and abbreviations. For them, numerals/numbers are counted

as words and must be read correctly within the context of the passage. In the case of hyphened words, each morpheme separated by a hyphen is counted as an individual word if it can stand alone.

For example: fifty-seven   WRC= 2

                " Daughter-in-law "   WRC= 3

Abbreviations are counted as words and must be read correctly within the context of the sentence.

For example: Dr.James said, "Hello"

Should be read as: ' Doctor James said, "Hello"   WRC= 4

Not as: ' D.R James said, "Hello"   WRC= 3

To sum-up, when measuring the oral reading fluency of our students the teacher/the examiner has to record the total number of words read correctly in one minute. Of course, this number is obtained by subtracting the number of words read incorrectly from the total number of words read.

The following is a scoring example of a student's Oral Reading passage

Summer Guests	**2**
One summer we had guests in our <u>shed</u>. The only problem	**13**
was that we didn't know who they were. All we could see of them	**27**
were signs or <u>clues</u>. We could see two very large <u>holes </u>dug under	**40**
the shed. We could see some animal <u>footprints</u> around the holes.	**51**
When we were very quiet, we could hear some <u>rustling</u> noises	**62**
inside, but we never saw them. Who were our summer guests?	**73**
I decided it was time to find out who these guests were. I **]** had	**87**

Table 3: A Scoring Example

In the previous example the participant reads a total of **86** words per minute and makes **5** word recognition errors (the underlined words in the passage), so the number of words read correctly is **81** (CWPM)**.**

The last step of the CBM test mainly concerns how the examiner would interpret the collected data. Of course, the obtained data will be compared with the established norms and standards set for each grade level, which will help the examiner to take the necessary measures on the basis of the CBM established interpretations. This is how fluency is measured and how it is interpreted in L1 setting.

Since we are going to measure this construct in a FL setting where there are no established norms or standards and since we can not use the norms or the standards of L1 learners because these norms are established for English Language Learners and can never be applied for Second or Foreign Language Learners. Albeit, in the current study we are going to observe the effect of the R.R method on our learners' oral reading fluency by comparing the scores of CWPM obtained in the pre-test with those obtained in the post-test, and then we can draw our own interpretation. So, in the body of this research we have adapted our tool of measurement from the CBM test where we have followed all the steps and the principles of this test, as established by Deno et al. (2002). However, the only difference is that the collected data of the pre-test is going to be compared with that of the post test to confirm or disconfirm our hypothesis. This comparison would help us to evaluate the effectiveness of the R.R method on the participants' reading fluency in the present study.

Conclusion

The importance of developing oral reading fluency has urged researchers to test the instructional teaching methods that would improve this skill. The Independent Silent reading as a teaching instructional method has been just mentioned and not tested in the present study because we are limited with the description and the investigation on Samuels' (1979) RR method.

Developing oral reading fluency via the RR method has to receive more light in FL setting. Not only this method has proved to be efficient in English language setting, but the simplicity in practising it and in evaluating its effects on the reading fluency are the aspects that favour FL teachers to adopt it within their teaching courses. The different strategies of repeated reading offer the possibility for teachers to manipulate this method in different forms depending on what suits their classrooms. However, the

CBM test would facilitate the quick evaluation of the effectiveness of this method on reading fluency skill by measuring repeatedly and with ease reading speed and word reading accuracy.

Chapter Three

The Experimental Study

Introduction

The present study is designed to investigate if the R.R method facilitates fluency development as signalled by reading speed and word accuracy. This research examine several questions: Does the RR method improve students' reading fluency? Does the RR method facilitate rate and word accuracy as being the main components of reading fluency in the current study?

To test if this method would have a significant effect in increasing both reading speed and word accuracy; an experimental study has been established. Our population has been selected from 2nd year English students at the ENS. Sixteen participants are randomly selected and randomly assigned either to experimental group who receives the treatment, or to control group who does not. The first step in this experiment is the pre-test. All the participants of both groups are pre-tested via the CBM test. After the pre-test, the treatment period begins. During six weeks, and within twelve sessions, the experimental group follows the RR method. The control group, however, does not follow the same instructions. At the end of the treatment period, the participants have been post tested through the same tool of measurement as in the pre-test.

To address the research questions previously mentioned, we have analyzed the differences between the scores of the experimental group and the scores of the control group. The unit of the analysis is the gain score in correct word per minute (CWPM) from the pre-test to post-test. Our analysis has been divided into two parts, first we have compared the means, and second we have used a *t* test analysis. The *t* test, however, would confirm if the difference between the means is statistically significant, so one could accept the established hypothesis. If it is not the hypothesis will be rejected.

1. Research Questions and Purpose of this Rsearch

Based on previous researches (see chapter II, section 2.4), the present study investigates if the R.R method facilitates fluency development as signalled by reading speed and word accuracy. Our purpose, then, is to know if it is true that the application of the "Repeated Reading Method" as it has been designed by Samuels (1979) would have a significant effect in increasing both reading speed and word accuracy.

For such interest, the following questions are to be answered:

1- Does the Repeated Reading Method improve reading fluency of second year EFL students at Teacher Training School of Constantine (ENS)?

2- Does the Repeated Reading Method facilitate rate in reading performance as an aspect of reading fluency?

3- Does the Repeated Reading Method facilitate word accuracy in reading performance as an aspect of reading fluency?

To provide an answer for these questions, we have used the CBM test as a tool for measuring reading fluency as represented by the number of words read correctly per minute. Curriculum Based Measurement is a technique that provides reliable and valid measures of reading ability in a short period of time (Deno et al, 2002). This test requires from an individual student to read for one minute during which the dependent variable is measured by the number of words read correctly per minute.

2. Population: Participants

In the current study, an experimental design is carried out at the ENS on a sample of population selected from 2nd year students. At the ENS, 54 students have been invited to participate in this study. Of the 54 students, sixteen are randomly selected, and then these students are randomly assigned either to the experimental condition or to the control condition. Eight (08) students have been transferred the experimental group (the RR group), and eight (08) students have been transferred the control group.

The majority of the participants are girls. From the sixteen students who have participated in the experiment, two of them are boys. In this study, sex is not taken into account as a factor that may have an influence on the collected data because the majority of the participants are of the same sex. Their age is between twenty (20) and twenty four (24). All the participants have studied English as a Foreign Language for six (06) years: two (02) years at the Elementary school, three (03) years at the Secondary school, and one (01) year at the university. The ENS or the Teacher Training School enrols students who want to become teachers in the future (either at the elementary school, or at the secondary school). The participants in this experiment are students in the English department. Carrying the experiment with future English teachers would increase our chances to collect more concrete data; especially, that this method is going to be presented as a part of their Reading Technique module. This would help us to apply the RR method with more ease.

The sample of the population has been restricted to 16 participants because of the requirement of the method. The RR method requires from the investigator or the teacher modelling, providing assistance to his students in the form of regular guidance and immediate feedback during the RR sessions (see chapter II, section 2.2). To enlarge

the sample, it would be impossible for the teacher to apply adequately this method because it may negatively affect the students' fluency progress. Since we have been performing a multiple tasks (teaching and examining) at the same time, it has been almost difficult for us to provide guidance for a large sample of participants. So, eight participants in each group seemed to be an appropriate choice for us.

This sample corresponds to the students who have taken the pre-test, have been under observation during the treatment period, and finally have been post tested.

3. Materials Used for Practice

In the present study the following materials have been used:

1- Six reading passages are selected for the CBM test. Three of them are read in the pre-test (see appendix I), the remaining three others are read by the participants in the post-test (see appendix II). All the passages have been selected from Deno et al (1987) "The Standard Reading Passages"

2- Twelve short passages of about 200 words at the student's level of reading that are used during the treatment period (see appendix III). We have used short texts, so that to facilitate the repetition of the same text four (04) times (see chapter II, section 4.2). These short texts have been selected from different sources to be used in 2nd year reading technique syllabus and contain a limited number of unfamiliar words. The longer texts such as: "Lies and CVs", "Be Water. Be Water.", and "Swallows and their Ways" had been divided into short passages, so that they could be practised well by learners (see appendix III).

In practising this method, we have not relied on connected texts that are in the form of a set of passages from the same short story. Our choice is done by purpose; first as it has been already mentioned in the literature review that the investigator can rely on

both connected texts or on selected texts from the curriculum (see: chapter II, section 4.3). Second, we do not use connected texts that are graded to the level of second year university students because we lack this kind of materials at the Teacher Training School of Constantine. Our choice of using selected texts from the curriculum is due to the fact that it is easy to grade the level of a text to that of the students rather than to grade the level of a short story which needs the intervention of an expert.

3- A simple graph on which students' daily performance is recorded (reported) during the treatment period. The scale of the x-axis reflects the anticipated number of sessions. The y-axis reflects the criterion number of correct word per minute (see appendix IV).

4- A tape recorder: where the students' daily one minute reading is recorded, in addition to a stop watch or a timer to keep track of the students' performance.

4. Content and Procedures

4.1. Pre-test: Description and Results

The sixteen (16) participants are pre-tested via Curriculum Based Measurement test (CBM). Students read three passages orally (their length is of 200 words) and consecutively where the regular procedure of the CBM test is used (see chapter II, section 6).

As it is explained in the previous chapter, to determine the students' growth in reading fluency as signalled by reading rate and word accuracy, we use the CBM test, the commonly used test to measure reading fluency. Following the examiner's instructions, each participant is asked to read orally three passages successively where he is free to start with any passage. Each passage is read for one minute. For more appropriateness, during the reading time, the number of words read in one minute (WPM) and the number of word recognition errors (WRE) are marked. Moreover, their

one minute reading is recorded at the same time. After comparing what has been recorded with what has been collected by hand, the CWPM of each passage is calculated by subtracting the WRE from WPM. The last step is to pick up the median score of the CWPM of all the participants from the results of the pre-test. The performance of the CG and the EG in the pre-test is summarized in the following table. For more details see table (6, 8).

Table 4: the Results of the Pre-test

	WPM	N° of errors	CWPM
Control group	109,75	5,88	103,87
Experimental group	112,62	5	107,62

On the total number of the words read in one minute, the control group has scored 109, 75 word per minute; whereas the experimental group has scored 112, 62 word per minute. These results indicate the reading speed of both groups prior the beginning of the study. As far as the number of errors, we can see that the control group has marked 5, 88 word recognition errors; the experimental group, however, has marked 5 word recognition errors. By subtracting the number of errors from the total number of words read in one minute, we get the number of words read correctly in one minute (CWPM) which is the fluency score of both groups in the pre-test. The control group gains 103, 87 CWPM, and the experimental group gains 107, 62 CWPM.

In collecting these results, we have relied on the median score. The median score is like the average, it the best indicator of the student's true reading (see chapter II, section 6).The collected data of the CWPM which is represented by the median score of both groups not only set a baseline to which the results that are obtained in the post-test are compared, but it helps us to set a goal to be reached after the treatment period.

4.2. Treatment Period: Description

4.2.1. Overview of the Repeated Reading Method

Among the recommendations of the RR method, as established by Samuels (1979), is to decide what will be the fluency criteria according to the students' grade level. As the present research has been carried in a Foreign Language (FL) context, the task is not easy. First there is no agreed on fluency benchmark for EFL students. Second we can not generalize FL level with the equivalent level of ELL. To set the fluency base line, we have relied on the pre-test results. The collected data of the pre-test has been studied to know how the fluency level of the participants is. These results are used both as the starting point for the treatment group, and second as a level of comparison with the post test scores.

To avoid any bias that would affect the results not only in the pre-test but of he whole study, the students have been told that we, teachers of the reading technique module, are studying a new method that will be integrated within the 2nd year curriculum program.

Next a period of time is determined for practice. Thirty (30) minutes of continuous repeated reading is recommended. For a successful application of the R-R method, the following stages have been followed during each R-R session.

4.2.2. Practice Session of Repeated Reading

At the beginning of each session during the treatment period the following steps are followed. First, the passage to be practised during this session is assigned where the participants are provided with copies of the same passage. Before starting the practice, students listen to a live model of a fluent reading.

We model the first reading by following the features of a fluent reading (appropriate speed, accurate word recognition, and with proper expression). Then, each participant is required to read the same passage out loud. During their first reading our role, as a teacher and examiner at the same time, is to assist and guide the students by providing them with an immediate feedback when they find difficulty in identifying unfamiliar words. As it has already been explained in the theoretical part, among the requirements of the RR method is to grade the reading passage to the level of the students by limiting the number of unknown unfamiliar words (see chapter II, section 4.1). Whereas for the unfamiliar words that are vital in completing the meaning of the passage, as set by Samuels (1979), has to be explained prior the practice.

Before starting the rereading activity, a couple of recall questions may be asked to check the students understanding. Until this step, both experimental group and control group follow the same instruction. Meaning that the coming steps do not concern the control group.

As a next step, time is set for practice. When time has been set, the students in the experimental group begin reading repeatedly continuing until each student can read it comfortably: with an appropriate speed, less errors, and a proper expression. Four repetitions seemed to be appropriate for students to achieve fluency (see O'shea and

Sindlar, 1985). During their rereading practice, students are assisted and guided by being provided with an immediate feedback when necessary.

At the end of each RR session, the students' one minute reading of the EG is recorded. Moreover, the reading performance of each student as represented by number of words read correctly in one minute (CWPM) is reported on his/her graph. Each student, then, has to read the passage again loudly for one minute timing while we keep track of both the total number of words read in one minute and the number of errors in the reading. To get the number of words read correctly in one minute the number of errors is subtracted from the total number of words read in one minute (see chapter II, section 6).

Why results of each session are reported on the students' graph? At the beginning of each session, each student in the experimental group consults his/her graph to see how he is progressing. This step keeps the participants always motivated during the treatment period, and at the same time helps us to observe and monitor their progress during the treatment period. Monitoring the fluency progress of the participants in the experimental group would later help us to provide the EFL teachers with some teaching implication concerning the use of this method in EFL setting.

4.2.3. Description of the Treatment phase

The treatment phase of this study lasts six weeks, beginning in April 2006 and ending in May 2006. The students in the experimental group have followed R-R method for thirty (30) minutes during each session, knowing that all sessions of the treatment period are considered as make sessions. Normally, the sessions are within the bloc of the regularly scheduled sessions of the reading technique module; but since the

number of students in each group would negatively influence the application of the method on the experimental group; for such reason, we find that it is better to apply this method in extra hours. Such decision has been based on an agreement with the participants prior the beginning of the experiment.

The reason why the treatment period has been restricted to only six weeks divided into twelve sessions. Six hours has been the duration of the treatment period. We want to avoid the participants' burden of the extra hours, and to avoid the participants' regular absences because the treatment period starts by the end of the year. To keep them motivated during the treatment period, at the beginning of each session, each student in the experimental group consults his/her graph to see how s/he is progressing.

The participants in the control condition spend the same time practising reading as do the participants in the experimental condition. The only difference is that the control group does not follow the rereading activity. The participants in the control group read the passages orally but not repeatedly (see section 4.2.2 of this chapter).

In all the sessions during the treatment period, our role with both groups is to model the first reading, explain the unfamiliar words if there are, and provide an immediate feedback when necessary during the students' oral reading. What is added for the experimental group is the practising of the rereading activity and the one minute reading which is recorded at the end of each session.

4.3. Post test: Description and Results

 After six weeks (the duration of the treatment period), to determine growth on reading fluency as represented by the CWPM; the participants are post tested. The same tool of measurement (CBM test) used for the pre-test is also used in the post-test. This test has been administered to both groups (experimental and control group) to establish the students' reading fluency scores at the end of the experiment. Following the instruction of the CBM test, each participant read consecutively three passages where the same steps followed in the pre-test are respected both by the examiner and the examinee. Marking the total number of the WPM, and the number of WRE of the three passages, the total number of the CWPM of the three passages is calculated. To know the fluency scores of both groups, the median score is collected from the post-test results. The students' reading fluency performance in the post test is summarized in table 5. (For more details see table 7, 9)

Table 5: the Results of the Post-test

	WPM	N° of errors	CWPM
Control group	114,87	5,62	109,25
Experimental group	133,87	3,5	130,37

On the total number of the WPM the control group has scored 114, 87 word per minute, whereas the experimental group has scored 133, 87 word per minute. These results indicate the reading speed of both groups after the treatment period (at the end of the experiment). As far as the number of errors, we can see from table 5 that the control group has marked 5, 62 word recognition error; the experimental group, however, has marked 3, 5 word recognition error. By subtracting the number of errors

from the total number of words read in one minute, we get the number of words read correctly in one minute (CWPM) which is the fluency score of both groups in the post-test. The control group gains 109, 25 CWPM, and the experimental group gains 130, 37 CWPM.

5. Data Analysis: Comparison of Results and Means

All the students have been pre and post tested through the CBM test that measures reading rate and word accuracy. The study has lasted six weeks. The unit of the analysis is the gain score in correct word per minute (CWPM) from the pre-test to post-test.

After collecting the data of the pre and post-test, the next step in this study is the analysis of this data. Our analysis of the data is going to be divided into two parts: first we calculate the means of the CWPM of both groups (experimental group and control group) in the pre/post test, and then we compare the results. Second, a quantitative analysis is followed where we have used a *t* test analysis. The *t* test is going to determine the validity of these results. This analysis would confirm, or disconfirm our hypothesis.

5.1. Results
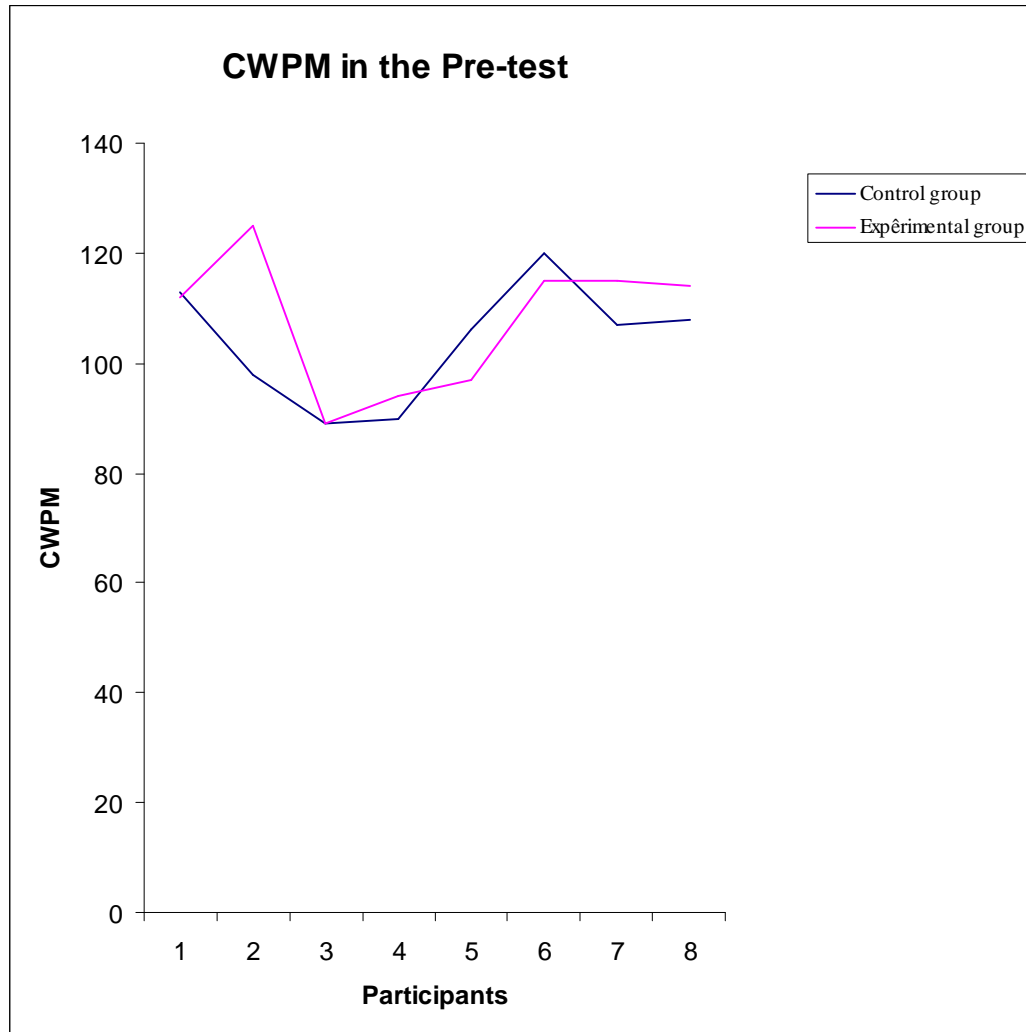
CWPM in the Pre-test

Figure: 1

The previous figure shows how the performance of both groups is prior the beginning of the experiment. By observing these graphs, one can say that the performance of the control group and the experimental group in the pre-test is some how similar. This means that at the beginning of this experiment, the participants have been some how at same level in their reading fluency performance

At the end of the experiment, both groups (experimental and control group) have been tested again. When all the data is looked at, there is a significant difference between the experimental group and the control group on the number of words read correctly in one minute. These differences in reading rate favour the students who follow the RR instruction as it is shown in figure 2.
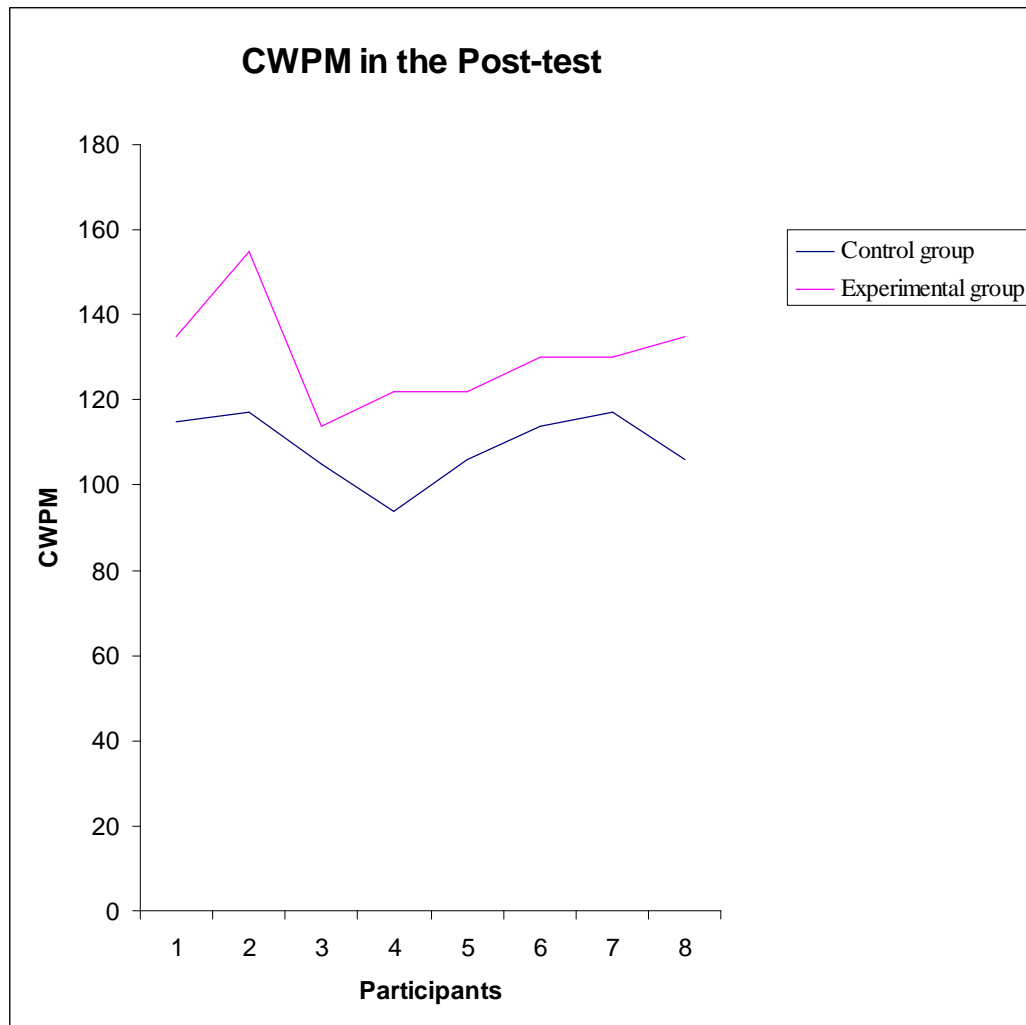
Figure: 2

To give more validity for these differences, we have first compared the means of the gain scores in CWPM for both control and experimental groups prior the beginning of the study (in the pre-test) and at the end of the study (in the post-test).

5.2. Comparing the Means

5.2.1 Calculating the Means

To calculate the mean score of the CWPM, the sum of the scores have to be divided on the number of the participants. The following tables (6, 7, 8, 9) sum up the median score of CWPM of the two groups in the pre and post-test, as well as their mean scores.

Table 6 Calculating the mean of the experimental group in the pre-test

Participants	Median Score of CWPM
1	112
2	125
3	89
4	94
5	97
6	115
7	115
8	114
The Mean	107,62

Table 7: Calculating the mean of the experimental group in the post-test

Participants	Median Score of CWPM
1	135
2	155
3	114
4	122
5	122
6	130
7	130
8	135
The Mean	130,37

Table 8: Calculating the mean of the control group in the pre-test

Participants	Median Score of CWPM
1	113
2	98
3	89
4	90
5	106
6	120
7	107
8	108
The Mean	103,87

Table 9: Calculating the mean of the control group in the post-test

Participants	Median Score of CWPM
1	115
2	117
3	105
4	94
5	106
6	114
7	117
8	106
The Mean	109,25

5.2.2. Comparing the Means of the Pre-Test

The following table, which presents a summary of the pre-test means of both groups, helps us comparing the reading fluency performance as represented by the CWPM prior the beginning of the experiment.

Table 10: The Means of the pre-test

	Experimental Group	Control Group
Mean	107,62 CWPM	103,87 CWPM

Comparing the means of the two groups, there seem to be no significant difference between the performances of the two groups in the pre-test.

5.2.3. Comparing the Means of the Post-Test

Table 11 sums up the results obtained in the post-test of both groups

Table 11: The Means of the Post-test

	Experimental Group	Control Group
Mean	130,37 CWPM	109,25 CWPM

By comparing the means, one can easily deduce that the experimental group out-performs the control group. Even though, the difference between the means of the two groups has been somehow negligible (only 3, 75 CWPM) in the pre-test; this difference, however, increases to reach 21,125 CWPM at the end of the experiment. This means that the experimental group has shown a progress in reading fluency which is not the case of the control group.

The comparison of the means is not so worthy to build on it solid interpretation which concerns the truthfulness of our hypothesis. Hence, to reinforce the conclusions drawn from this comparison, and thus give them more validity, we have used a *t* test analysis which is the only issue that one can rely on especially that the difference between the means is not so great.

6. *t* test Analysis

Numerous factors underlie our choice of the *t* test: first it is the much more commonly used statistical test in language studies; second, the *t* test does not require large samples as does the Z statistics (Brown, 1988, p165). Both factors are in favour for our study, as we are testing our hypothesis with a small sample of FL students. The *t*-test for independent samples is more appropriate for a comparison between the control group and the experimental group in terms of differences in CWPM scores in the post-test.

The *t* test is a robust test which determines the validity of an experiment base on two entities- comparison. This test assesses whether the means of the two groups involved in the present study are statistically different from each other.

Once the *t* value (or the *t* observed) is calculated, we have to look it up in a table of significance to test whether the ratio is large enough to say that the difference between the groups is not likely to have been a chance finding. On the basis of this comparison, one can accept or reject the established hypothesis. The *t* test, then, helps in confirming or disconfirming the truth of the established hypothesis.

To compute the t value, the following formula needs to be applied.

$$t_{N1+N2-2} = \frac{(\overline{X}_1 - \overline{X}_2)\sqrt{(N_1 + N_2 - 2)N_1 N_2}}{\sqrt{(N_1 S_1^2 + N_2 S_2^2)(N_1 + N_2)}}$$

$\overline{X}_1$ = Mean of the first group

$\overline{X}_2$ = Mean of the second group

N_1 = Number of the participants in the first group

N_2 = Number of the participants in the second group

S_1 = Standard Deviation (Sample Variance) of the first group

S_2 = Standard Deviation (Sample Variance) of the second group

The Sample Variance is a sort of average of the differences of all scores from the mean.

Because our study is based on one tailed test (directional hypothesis), to confirm the truth of our hypothesis: the obtained *t* value (at 0, 05 level of significance) must equal or exceeds the half of the tabulated value of the *t* (the critical value of *t*). This would confirm the positive effect of the IV (RR method) on the DV (Reading fluency), and hence accept the hypothesis.

To strengthen the conclusion drawn from the comparison of the means and then confirm the truth of the hypothesis, we have relied on a t-test analysis. This latter is the only guarantee of the validity of these results.

6.1. t test for the Difference Between the CG and the EG in the Post test

Control Group   **Experimental Group**

$$\sum X_1 = 874$$ $$\sum X_2 = 1043$$

$$\sum X_1^2 = 95932$$ $$\sum X_2^2 = 137039$$

$$\overline{X}_1 = \frac{\sum X_1}{N_1} = \frac{874}{8}$$ $$\overline{X}_2 = \frac{\sum X_2}{N_2} = \frac{1043}{8}$$

$$\overline{X}_1 = 109,25$$ $$\overline{X}_2 = 130,37$$

The Sample Variance (Standard Deviation)

Control Group

$$S_1^2 = \frac{\sum X_1^2}{N_1} - \overline{X}_1^2$$

$$S_1^2 = \frac{95932}{8} - 109,25^2$$

$$\boxed{S_1^2 = 55,94}$$

Experimental Group

$$S_2^2 = \frac{\sum X_2^2}{N_2} - \overline{X}_2^2$$

$$S_2^2 = \frac{137039}{8} - 130,37^2$$

$$\boxed{S_2^2 = 133,54}$$

Nb. The data used to calculate the t value are summarized in a table available in **appendix V**.

The t value

$$t_{N1+N2-2} = \frac{(\overline{X}_1 - \overline{X}_2)\sqrt{(N_1 + N_2 - 2)N_1 N_2}}{\sqrt{(N_1 S_1^2 + N_2 S_2^2)(N_1 + N_2)}}$$

$$t_{8+8-2} = \frac{(109,25 - 130,37)\sqrt{(8 + 8 - 2)(8x8)}}{\sqrt{(8x55,94 + 8x133,54)(8 + 8)}}$$

$\boxed{t_{14} = \text{-4, 05}}$

We do not regard the sign ($\pm$) of the t value, since it will be positive if the first mean is larger than the second mean and negative if the first mean is smaller. For such reason, the t test value is normally reported as the absolute value of the statistics rather than as the signed value of the statistics. That is, the sign of the t test is normally dropped when it is reported.

For the CWPM, the t value (the t observed) is 4, 05. The critical value of t, with 14 degrees of freedom, is 2,145, at 0, 05 level of significance. Since it is one tailed hypothesis (directional hypothesis), this value should be divided by 2 (i.e.2,145÷2=1,07). Because the value of our calculated t exceeds the value of the tabulated t 4, 05> 1, 07, this means that the results are statistically significant. Thus, confirming that the difference between means of the post-test for the control group and the experimental is highly significant.

This conclusion means that the likelihood of the experimental result to be a mere chance finding is less than 5%, thus we can have about 95% confidence that the observed results are statistically significant, and reflect the positive effect of the new condition to which the experimental group has been exposed.

7. Reporting the Results

In the present study, it is hypothesized that the students' reading fluency performance would increase if they follow Repeated Reading Method. This hypothesis has been tested by comparing the means of the CWPM of both groups (control and experimental) in the post-test. The total number of the CWPM of the control group in the post-test (M= 109, 25, SD=55, 94) is less than the total number of the CWPM of the experimental group in the post-test (M= 130, 37, SD= 133, 54), t_{14}= 4, 05, p= 2,145.

Since the results are in the direction of our hypothesis, one can say that our IV (RR method) has a positive effect on the DV (reading fluency).

8. Discussion of the Results

The purpose of this study is to determine the extent to which the method of the Repeated Reading would improve aspects of reading fluency as represented by rate and word accuracy of 2nd year EFL students at Teacher Training School of Constantine. Before discussing the results obtained in this study, it seems important to have a glance on the main findings achieved in this study.

8.1. Summary of the Findings

1. Students in the RR group (EG group) have shown an improvement in reading rate and word accuracy over the course of the study.

2. Students as a whole have made gains in fluency rate as represented by the CWPM; however, these gains differ from one group to another. The gains on the number of words read correctly in the experimental group are greater in the post-test if they are compared to that of the control group.

3. Improvement in CWPM in the RR group shows that all the students have improved regardless their level of fluency in the pretest where an average

improvement on the n° of words read correctly per minute is between 107,62 in the pre-test to 130,37 CWPM in the post-test.

4. The findings in terms of the effect of the Repeated Reading method on the overall reading performance of the students in the RR group changes over the course of the study. All the students learn gradually how to make a balance between the three components of reading fluency: rate, accuracy and prosody.

5. By consulting their graphs, students in the RR group have been motivated by the Repeated Reading Method; especially, when they see the extent to which this method has helped them in making significant progress in reading fluency.

8.2. Discussion of the Findings

In the present study, the definition of fluency includes the following characteristics: accuracy and reading speed. To determine the students' fluency, they have been pre and post tested via the CBM test. From the analysis of the data, students who have followed the RR method as a fluency instruction have marked higher gain scores on the number of words read correctly per minute (CWPM) than the students who have not followed the RR method.

After analyzing our data, both rate and word accuracy of the EG have increased not only over the treatment period; but also, from the pre-test to the post-test. These results indicate that the students in the RR group have demonstrated a statistically significant improvement in the number of words read correctly in one minute (CWPM) from the pre-to post-test; however, the control group has demonstrated minimal (negligible) improvement in the CWPM. This increase is confirmed via a quantitative analysis not to be a chance finding, but rather a real finding which is due to the new method that the experimental group has followed. These findings support the main body of evidence

presented earlier in the literature review that advances the method of the RR as an effective technique for improving aspects of reading fluency such as rate and word accuracy with the FL students (Day and Bamford, 1998; Aderson, 1999; Tagushi and Gorsuch, 2002; Tagushi, Gorsuch and Takayasu, 2004).

For the numbers of errors, the RR group has decreased the number of word recognition errors from the pre-test to the post-test. These findings suggest that the RR method has enabled students to accurately recognise words, and at the same time make a balance between rate and accuracy. This method helps them to recognise words both accurately and automatically.

These findings suggest that the RR method is an effective method in increasing reading fluency of FL students in the RR group of this study. We confirm what has already been said on this method as being the promising method for developing reading fluency of L1 or L2/FL learners.

The RR group transfers gains in reading fluency to new unpractised texts. The RR group shows its ability to transfer gains in reading fluency to new unpracticed passage during the treatment period and in the post test. Although these gains are not great in the post-test; we suppose that this is due to the shortness of the treatment period; in that, if the treatment period is extended to six months, the gains might have been greater.

The comparison of fluency growth in the EG and CG at the beginning of the study and at the end of the study shows the following. While in the pre-test both groups read the passages with the same degree of fluency, in the post-test, however, the RR participants read faster than the participants of the CG. This suggests the positive effect of the RR instructions that the EG receives during the treatment phase. (See table: 12)

Table: 12

Reading ability (CWPM)			
Group	**Time**	**Mean**	**Sd**
Control Group	**Pre**	103,87	103,9
	Post	109,25	55,94
Exprimental Group	**Pre**	107,62	140,55
	Post	130,37	133,54

Comparison of pre-post test means

These findings confirm that the improvement in reading fluency is mainly related to the fluency instructions to which the experimental group has been exposed. Even though, both groups have been at the same level of reading fluency prior the beginning of the study and have been put in the same conditions (time, same reading passages, location, teacher assistance…) with the only exception that they are not given the same reading instruction; but one of the groups (RR group) outperforms the other group in its ability to read more words correctly per minute at the end of the experiment. The conclusion we can draw is that although there is a minimal improvement in the CWPM of the CG in the post-test; the fluency improvement in the RR group is greater if it is compared to that of the control group. This means that not all techniques and not any reading instruction can help in developing reading fluency skill. So, there is a cause/effect relationship between fluency instruction and fluency improvement.

Another important observation during the treatment period concerns the use of the prosodic features during the reading performance. Students along the treatment period

have acquired the ability to vary the pace of reading; and at the same time, they use more emphasis as they read. This can be explained in light of the Automaticity Theory (LaBerge and Samuels, 1974), in that the RR method helps students to use a large portion of their attention on getting the meaning from the reading passage which is manifested through the readers' variation in the pace of reading. Moreover, the use of the prosodic cues is the best indicator of the students' interaction both with the passage and its writer, this kind of interaction indicates the student's understanding of what is being read. This observation can not be confirmed in the present study because reading comprehension has not been measured. For such reason, it remains a hypothesis that needs to be confirmed or disconfirmed in future studies.

8.3. Conclusions

The following conclusions can be drawn in a relation to the effect of the repeated reading on reading fluency.

Repeated Reading improves fluency performance of students. In this study, students in the RR group read the assigned passage four times, at the end of each RR session CWPM is recorded and then reported on their graphs. Students have shown a gradual progress on fluency rate by an increase in reading rate and a decrease on word reading errors from the first reading passage to the fourth one. This means that by reading each text four times, students are able to read more words per minute and with more accuracy. This finding confirms the body of researches saying that the Repeated Reading of texts improves reading fluency (Samuels, 1979; O'shea and Sindlar, 1985; Blau, 2003)

Moreover this method assists all readers in spite of their reading ability (good or poor readers). It has been so beneficial for some students who are not given the

opportunity to read among their peers, these students who avoid reading fearing of mistakes. This method has indeed helped them to improve their oral reading performance.

Repeated Reading enables students in the RR group to transfer the gains in rate and word accuracy to new unpractised passages. Even though, the transfer of the gains in rate and word accuracy is not so high over a six weeks period, but one could imagine how would be the degree of transfer if the practice of this method is extended over a long period of time. This evidence support all what has been said in the literature review that the lack of transfer effects of reading rate and comprehension of the RR group is due to the shortness of the treatment period (Tagushi and Gorsuch, 2002).

Conclusion

This research study has been carried out to answer the statement of the problem: wether the use of the RR as a teaching instructional method helps foreign language students improve their reading fluency. Within this scope, the collected data of the pre-test and the post test, as well as, the treatment period data reveals that the students who follow the RR method have shown progress in reading fluency. Their CWPM scores postulate these students have benefited from this method. What has helped us to be so sure when drawing this conclusion is the *t* test analysis. The t test has confirmed that these results are statistically significant and not a mere chance findings. These findings have, also, supported the previous researchers' findings and have proved that the RR is an efficient teaching instructional method whose positive effect is manifested through the students' oral reading performance.

All in all, this experiment has demonstrated the need to embed the RR method within the teaching courses, so that FL students could improve their reading fluency

performance including accurate word recognition, reading speed, and reading with expression. FL instructors, educators are invited to take into account our modest pedagogical implications that are cited in the next chapter.

Chapter Four

PEDAGOGICAL IMPLICATIONS

Introduction

Chapter four presents a summary of all the findings in this study. Some pedagogical implications are drawn from these findings for teachers who want to embed fluency instruction in their reading courses through the use of the repeated reading method in English as a Foreign Language/FL setting, and at the end recommendation for further research are described.

1. Pedagogical Implications

Based on findings from this study, the following recommendation can be made for instructional practice. These pedagogical implications need to be taken with a great awareness by FL instructors, mainly that a FL setting is completely different from an L1 setting.

As the instructional reading method "Repeated Reading " followed in this study has proved its effectiveness in making significant improvement on students' reading fluency performance, one need to consider the importance of including fluency instructions within reading curriculum programs. The problem faced in our classrooms at the Institute of Foreign Languages, English Department, is that we do not teach reading as an independent module. Reading is always secondary. Most of the time the reading activity is practised silently, and then followed by text comprehension activities which have nothing to do with how this skill "reading" is being acquired, or how it is being developed. For such reason, I have conducted my experiment at Teacher Training School of Constantine where the Reading Technique module is taught three (03) hours per week.

I recommend, then, to include Reading as an independent module as in the case of Teacher Training School of Constantine. By including this module within the body of

the modules taught at the English Department, we are offering the opportunity both for students and teachers. Students will be given the chance to improve the skill of reading by practising more and more reading either in class or at home. On the other hand, teachers could directly observe their students' reading progress or stagnation via the regular evaluation offered by the CBM test. This would help them to take immediate measures if they see that the current reading instructions are not working and need to be either modified or substituted by new reading instructions.

If reading is included as an independent module; then, time becomes appropriate for embedding fluency instructions as one of the main objectives in the reading program as it has been suggested by Badrawi (1992, p17). According to this EFL educator, any reading program should have as fundamental objectives the following: to develop the reader's ability in identifying many words at sight; understanding rapidly unknown words; and in reading orally with an appropriate speed, proper expression and with correct punctuation. She points out the fundamental objectives that should be met by a successful reading program where fluency instructions are one of them.

In this study, we have attempted to give some hints for teachers who want to embed fluency instruction in their reading program. We highlight the areas that any teacher of reading should consider while developing reading fluency such as the instructional methods that should be followed to develop this skill, and the tool of measurement that facilitate for them the task of observing the students' progress. Two types of instructional methods that help in developing fluency in reading have been mentioned in the present research where one of them has been investigated and tested which is the repeated reading method.

Even though, the RR method is an efficient method in developing reading fluency, as an EFL teacher and for the sake of making a rapid progress in teaching this skill, I recommend the necessity to support the RR method by the Independent Silent reading. This latter can provide a strong platform for promoting reading development for all students and at all levels by enhancing their general language competence (Grab, 1991). So, if these two techniques are combined within the same reading program the benefits could be greater in that, students will have the opportunity to practice more and more reading both in class and at home, guided and independent, oral and silent. As it is suggested by Mc Ewan (2002: 58), dysfluent students need other kinds of reading experiences, in addition to their twice daily dosage of Repeated Reading; they also need ten (10) to fifteen (15) minutes of daily practice reading texts silently.

EFL teachers should encourage their students to practice more and more reading in class under their guidance via the Repeated Reading and out side classrooms independently via the Independent Silent Reading. A combination of these methods which insures the rapid growth of EFL students' reading performances and abilities would be more beneficial for any EFL teacher who wants to experience the rapid fluency growth of his students.

One of the main problems which I face during my research is the collection of texts to be implemented during the experiment. The choice of texts that best facilitate fluency growth has not received much concern in previous research either in L1 or L2/FL setting. What researchers have given as requirements in the choice of texts for fluency practice are the length and the level of difficulty. For such reason, among the most important measures to be taken by EFL educators, if they want really help us

develop reading fluency of our students, is to provide the appropriate reading materials on the light of what has been suggested in the current study.

Another crucial problem that needs to be solved is the establishment of fluency norms that are adequate for FL grades. As we have previously explained that to determine the fluency level for an L1 learner the teacher has just to consult the fluency standard. Meaning that once the components pieces of fluency (rate, word accuracy) are measured and the CWPM is computed the teacher is going to compare it with the fluency norms and standards established for each grade level. It is on the basis of this comparison that important decisions are going to be taken. In a FL setting we lack such standard which is due to the novelty of this phenomenon in this setting. The task, then, of FL educators is to establish those norms that fit FL grade level that will facilitate for EFL teachers to rapidly detect the fluency level of their students. Consequently, teachers will determine if their students' fluency is at a level appropriate for their grade. So that they can maintain their student's fluency at the same level, or if not how should this skill be developed? It is only the establishment of fluency standards that would help FL teachers to make such determinations.

2. Recommendation for Further research

In our research we have tested our hypothesis that stated the efficiency and the effectiveness of Repeated Reading method in enhancing reading fluency as measured by the number of words read correctly in one minute. The results have been significant on the basis of the tested components (reading rate and word accuracy). Some crucial questions that need future investigations are left unanswered by this study:

1) To what extent do the gains in CWPM produced by the RR transfer to gains in reading comprehension:

In the current study we have confirmed that the RR method seems to help L2/FL readers develop their automatic word recognition of words, but its effects on reading comprehension remains to be demonstrated in future researches. It is, then, so important to conduct a similar study in the same setting (FL setting) in which reading comprehension is, simultaneously, measured with speed and accuracy. Because reading quickly with a poor comprehension, as viewed earlier in the literature review, is not a good indicator of fluency. Adding to that, there are many EFL students who can decode texts quickly but have a poor comprehension. That is the reason why we need to confirm that the RR method in not only efficient on the automatic recognition of words, but on comprehension as well.

This may be the subject of a future investigation in which text comprehension is observed too during the experimental study beside the other fluency pieces (rate, accuracy and prosody); so that, to confirm that the Repeated Reading, not only increases the reader's ability to automatically recognize words, but to comprehend at the same time. Future researches need to prove if the gains in CWPM produced by the RR, really, transfer to gains in reading comprehension.

2) To what extent does the type of texts best facilitate aspects of reading performance such as rate, accuracy and comprehension?

It is important to note that fluent reading depends not only on the reader's skill, but on the texts characteristics as well. Yet many of us may be fluent on some texts and reads in a very slow and laboured manner when confronted with some other texts. The type of texts that are most beneficial for developing fluency needs to receive much interest in future research, knowing that most researchers concerns in this field have

been on the text length and the level of difficulty of the passage (Invernizzi, 2002, p.462). Future researches need to focus on whether a particular type of texts best facilitates aspects of reading performance such us: rate, accuracy, prosody and comprehension. It is then essential to know how far the type of text and its level of readability influence fluency growth.

3) To what extent the length of the treatment period produce a consistency in fluency development?

During the treatment period that lasted six weeks, we have remarked that there was no consistency in the students' performance, in that the students' CWPM over the RR sessions were fluctuating. Figure 3, which summarizes the collected data over a six weeks period, shows clearly how the observed behavior of the participants in the experimental group during the treatment period (CWPM) is not moving upward, but rather moving up and down. May be this inconsistency is due to the shortness of the treatment period; especially that most of the studies done in L2/FL setting have extended the treatment period to more than twenty (20) weeks; because for them the more the RR sessions increase the more changes in the reading performance can be detected (Taguchi, Gorsuch, and Takayasu-Maass, 2004). Future research should seek to extend the RR practice over more passages for a longer period of time to observe how does fluency progress and if this progress can be consistent and not fluctuating over long term.

Figure: 3
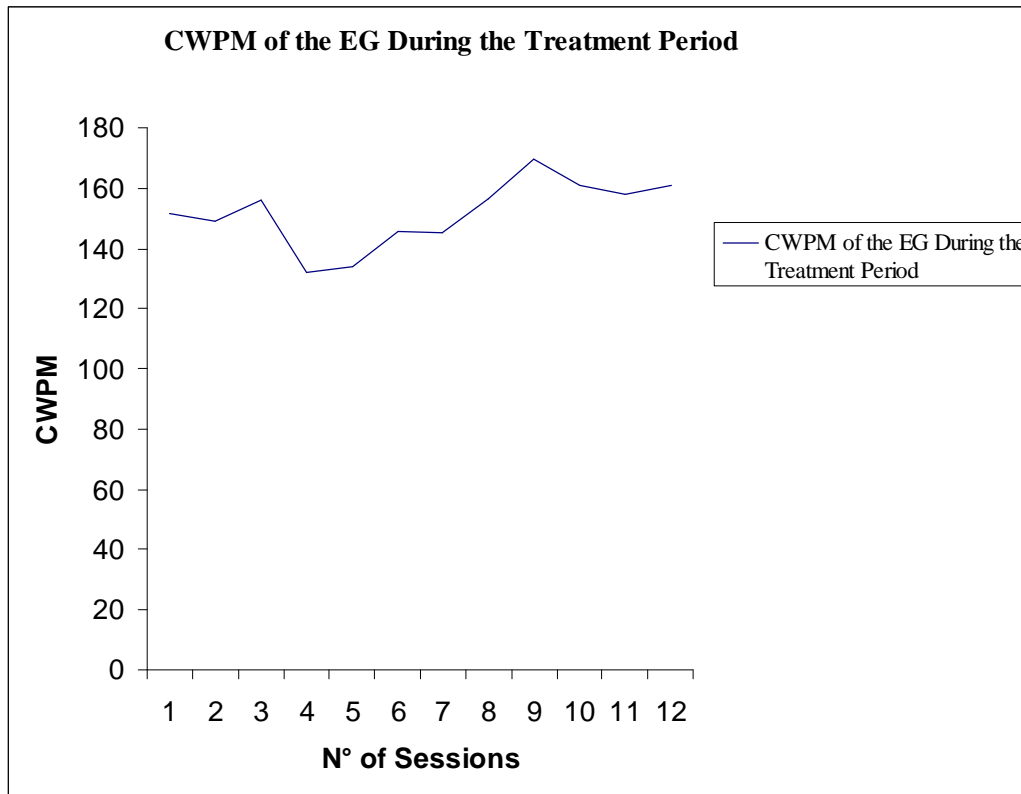
This study collected a data over a six weeks period. Future research should seek to extend the RR practice over more passages and for a longer period of time that may enable improvements in comprehension to be evaluated as well.

5. Conclusion

The Repeated Reading Method has proved to be an efficient instructional teaching method that helps FL students in improving their reading fluency. FL teachers, educators, course designers and researchers should take into account the importance of this method in improving FL learners' reading performance. They are asked to exploit this adequate method in FL setting with all learning levels, to enable the FL learners develop their reading fluency performances at an early stages of learning this foreign language.

Conclusion

In this section, I will summarise the points that have been discussed throughout the previous chapters. This research is about the effects of the instructional teaching method "the Repeated Reading" (Samuels, 1979) on reading fluency as represented by reading speed and word reading accuracy. The analysis of the obtained results has let us conclude that this method helps the students, subjects of this study, in improving their reading fluency performance by increasing their reading speed and decreasing their word recognition errors. The effects, then, of the Repeated Reading method is manifested in the increase of the total number of the words read correctly per minute.

The students who have received the Repeated Reading instructions have benefited from this method. The collected data has confirmed that these students have made a remarkable progress in their fluency performance from the pre-test to the post test. Hence, the conclusions drawn from this experiment have confirmed the truthfulness of the established hypothesis that the teaching instructional method called "the Repeated Reading" helps foreign language students in developing their reading fluency performance.

Foreign Language course designers, teachers, and educators are called to consider the importance of including fluency instructions within their reading programs; especially, that we have attempted in this study to highlight the teaching methods and the measurement tools. They should think on how to introduce the Repeated Reading Method not only at the university level but at an early level of learning English as a Foreign Language. Mainly that FL teachers and educators are provided with a set of Repeated Reading strategies from which FL learners can benefit at any level of proficiency and at any age. For the sake of the well application of this method, they

should also think about the reading materials that best facilitates fluency progress on the light of has been previously recommended in this research.

Repeated Reading is an efficient instructional teaching method that helps Foreign Language students in improving their reading fluency. This method needs to be considered by foreign language researchers who are asked to provide us with further research by directing their future studies on how to exploit this method in foreign language setting. They are asked to test the effectiveness of this method not only on reading speed and word reading accuracy; but on comprehension, prosody, and vocabulary acquisition as well.

APPENDIXES

Appendix I

Pre-test Reading Passages

Bobby Goes Fishing

Bobby and Grandpa got up early to go fishing. Bobby was tired

and thought maybe he'd rather sleep. As soon as he smelled the bacon that Grandpa

was cooking in the skillet, Bobby was up and out of bed. Grandpa cracked a few eggs

over the hot skillet, flipped some pancakes and before

Bobby knew it, they had a feast for breakfast.

While eating breakfast, Bobby asked Grandpa what kind of fish they would

catch. "Well, Bobby," said Grandpa, "if we're lucky, we might catch a rainbow trout."

"Wow, do they get really big?" asked Bobby.

"Some do," Grandpa replied, "but mostly, they're just hard to catch

because they're so smart." Grandpa then went on to tell Bobby how they

would try to fish along the river. He told Bobby there were rules he

had to remember. "First, you have to be very quiet. Second, you have to be patient.

And, third, you have to be lucky!"

Bobby said, "I feel lucky today!"

"Well, let's get going then," said Grandpa. "Remember to wear your fishing

hat. Not only will it keep the sun out of your eyes, but it might bring us luck."

Soon they were in Grandpa's old, red pickup truck and on their way to the river.

Bobby knew that today he was going to be lucky.

Bobby Goes Fishing   3 ___

     Bobby and Grandpa got up early to go fishing. Bobby was tired   15 ___

and thought maybe he'd rather sleep. As soon as he smelled the bacon that   29 ___

Grandpa was cooking in the skillet, Bobby was up and out of bed. Grandpa   43 ___

cracked a few eggs over the hot skillet, flipped some pancakes and before   56 ___

Bobby knew it, they had a feast for breakfast.   65 ___

     While eating breakfast, Bobby asked Grandpa what kind of fish they   76 ___

would catch. "Well, Bobby," said Grandpa, "if we're lucky, we might catch a   89 ___

rainbow trout."   91 ___

     "Wow, do they get really big?" asked Bobby.   99 ___

     "Some do," Grandpa replied, "but mostly, they're just hard to catch   110 ___

because they're so smart." Grandpa then went on to tell Bobby how they   123 ___

would try to fish along the river. He told Bobby there were rules he   137 ___

had to remember. "First, you have to be very quiet. Second, you have to be   152 ___

patient. And, third, you have to be lucky!"   160 ___

     Bobby said, "I feel lucky today!"   166 ___

     "Well, let's get going then," said Grandpa. "Remember to wear your   177 ___

fishing hat. Not only will it keep the sun out of your eyes, but it might bring   194 ___

us luck."   196 ___

     Soon they were in Grandpa's old, red pickup truck and on their way to   210 ___

the river. Bobby knew that today he was going to be lucky.   222 ___

Total Reading Time ____

Class Party

The sixth grade class at Forest Glenn Elementary school had been an especially close group. Most of the students had been classmates for six years. They wanted to celebrate graduation together before they moved on to different junior high schools.

Mr. Jacobs, their teacher, suggested that the idea be discussed in a formal class meeting. So Alicia Martin, the class president, called the meeting to order. "It has been suggested that we sponsor a class party for graduation," Alicia began. "We need to talk about your ideas and arrive at a decision. Some of the issues we must address include: the time and date of the party, the location, food and beverages, chaperones, and the cost per student. The floor is now open for discussion."

Susan stood up next to her desk. "I think we should use the last day of school to go to the beach for a picnic. We could swim, play volleyball and have races. It wouldn't be very expensive."

Todd volunteered his ideas next. "I agree with Susan," said Todd. "If we go to the beach we won't have to spend much money decorating a party room. Besides, the weather is so nice, who wants to stay inside? I'd rather be outside swimming and playing softball."

"But the beach is quite a few miles away," said Jenny. "It sounds like a good idea, but who's going to drive all of us there? We need to figure that out first."

Class Party   2   ___

The sixth grade class at Forest Glenn Elementary school had   12   __

been an especially close group. Most of the students had been   23   ___

classmates for six years. They wanted to celebrate graduation together   33   ___

before they moved on to different junior high schools.   42   ___

Mr. Jacobs, their teacher, suggested that the idea be discussed in   53   ___

a formal class meeting. So Alicia Martin, the class president, called the   65   ___

meeting to order. "It has been suggested that we sponsor a class party   78   ___

for graduation," Alicia began. "We need to talk about your ideas and   90   ___

arrive at a decision. Some of the issues we must address include: the   103   ___

time and date of the party, the location, food and beverages,   114   ___

chaperones, and the cost per student. The floor is now open for   126   ___

discussion."   127   ___

Susan stood up next to her desk. "I think we should use the last   141   ___

day of school to go to the beach for a picnic. We could swim, play   156   ___

volleyball and have races. It wouldn't be very expensive."   165   ___

Todd volunteered his ideas next. "I agree with Susan," said   175   ___

Todd. "If we go to the beach we won't have to spend much money   189   ___

decorating a party room. Besides, the weather is so nice, who wants to   202   ___

stay inside? I'd rather be outside swimming and playing softball."   212   ___

"But the beach is quite a few miles away," said Jenny. "It sounds   225   ___

like a good idea, but who's going to drive all of us there? We need to   241   ___

figure that out first."   245   ___

Total Reading Time _____

The Haunted House

"How do you know this house is haunted?" asked Angie.

"There's no such thing as a haunted house, Jessica assured her. "Then what just made

that noise?" Jessica peered into the corner where they

had both heard a clicking noise. "It looks like an old grandfather clock. It

must still be running." "It looks to me like this place has been abandoned

for years!" Angie commented.

Suddenly, Angie felt alone in the room. A chill went up her spine.

"Jessica!" she called, "remember you promised we'd stay together." There was no

answer. "Jessica, the five minutes are up. I'm leaving!" Still, there was no response.

She could hardly leave now without Jessica. What if she were in danger. Angie walked

cautiously toward the back of the house.

"Hey Angie," she heard, "look at this." There was Jessica coming out from behind a

built-in shelf on the wall. "It's a secret passage-way. I only followed it part of the way

and then I thought I'd better come back for you. Let's see where it goes." Angie had

lost some of her fear and was enticed by the idea of a secret passage-way.

Both of the girls entered the passage-way that led down several steps.

It was cool, damp and hard to see. However, both could see a glimmer of

light ahead. As Jessica led the way down the tunnel, they both heard a

growling noise. "Oh, no," thought Angie, "now what?"

	word count	# of errors
The Haunted House	3	___
"How do you know this house is haunted?" asked Angie.	13	___
"There's no such thing as a haunted house, Jessica assured her. "Then	25	___
what just made that noise?" Jessica peered into the corner where they	37	___
had both heard a clicking noise. "It looks like an old grandfather	49	___
clock. It must still be running." "It looks to me like this place has been	64	___
abandoned for years!" Angie commented.	69	___
Suddenly, Angie felt alone in the room. A chill went up her	81	___
spine. "Jessica!" she called, "remember you promised we'd stay	90	___
together." There was no answer. "Jessica, the five minutes are up. I'm	102	___
leaving!" Still, there was no response. She could hardly leave now	113	___
without Jessica. What if she were in danger. Angie walked cautiously	124	___
toward the back of the house.	130	___
"Hey Angie," she heard, "look at this." There was Jessica	140	___
coming out from behind a built-in shelf on the wall. "It's a secret	153	___
passage-way. I only followed it part of the way and then I thought I'd	167	___
better come back for you. Let's see where it goes." Angie had lost	180	___
some of her fear and was enticed by the idea of a secret passage-way.	194	___
Both of the girls entered the passage-way that led down several	205	___
steps. It was cool, damp and hard to see. However, both could see a	219	___
glimmer of light ahead. As Jessica led the way down the tunnel, they	232	___
both heard a growling noise. "Oh, no," thought Angie, "now what?"	243	___

Total Reading Time _____

Appendix II

Post-test Reading Passages

Camping

Joey and James were camping out alone for the first time. Joey was happy about their choice of the campground. The park had plenty of woods, hills, a lake and a trout stream. Joey planned to go fishing the next day. James, however, was looking forward to swimming in the lake. He was hoping to try out his new snorkel, mask and fins.

That night they cooked a meal over the campfire. James was in charge of the hotdogs and baked potatoes. Meanwhile, Joey made apple crisp for dessert. Both boys thought they were doing a pretty good job until James burned the hotdogs. Joey laughed so hard he knocked the apple crisp into the fire. Oh well, they thought, maybe breakfast would be better.

Soon it was time to sleep. It was getting late and the night air was cool. After putting the fire out, both boys climbed into their tent and zipped up their sleeping bags. It won't be hard to fall asleep, thought Joey, as his brother began to snore. However, a few minutes later a loud, crackling noise woke both boys. "What was that?" exclaimed James. "I don't know," said Joey cautiously, "but we'd better look." Joey found his flashlight and quickly climbed out of the tent. His brother was close behind.

Outside the tent they continued to hear the strange noise. It sounded like it came from the water. Joey turned to his brother and said, "I think it's coming this way."

	word count	# of errors
Camping	1	___

Joey and James were camping out alone for the first time. Joey 13 ___

was happy about their choice of the campground. The park had plenty 25 ___

of woods, hills, a lake and a trout stream. Joey planned to go fishing 39 ___

the next day. James, however, was looking forward to swimming in 50 ___

the lake. He was hoping to try out his new snorkel, mask and fins. 64 ___

That night they cooked a meal over the campfire. James was in 76 ___

charge of the hotdogs and baked potatoes. Meanwhile, Joey made apple 87 ___

crisp for dessert. Both boys thought they were doing a pretty good job 100 ___

until James burned the hotdogs. Joey laughed so hard he knocked the 112 ___

apple crisp into the fire. Oh well, they thought, maybe breakfast 123 ___

would be better. 126 ___

Soon it was time to sleep. It was getting late and the night air 140 ___

was cool. After putting the fire out, both boys climbed into their tent 153 ___

and zipped up their sleeping bags. It won't be hard to fall asleep, 166 ___

thought Joey, as his brother began to snore. However, a few minutes 178 ___

later a loud, crackling noise woke both boys. "What was that?" 189 ___

exclaimed James. "I don't know," said Joey cautiously, "but we'd 199 ___

better look." Joey found his flashlight and quickly climbed out of the 211 ___

tent. His brother was close behind. 217 ___

Outside the tent they continued to hear the strange noise. It 228 ___

sounded like it came from the water. Joey turned to his brother and 241 ___

said, "I think it's coming this way." 248 ___

Total Reading Time _____

Summer Guests

One summer we had guests in our shed. The only problem was that we didn't know who they were. All we could see of them were signs or clues. We could see two very large holes dug under the shed. We could see some animal footprints around the holes. When we were very quiet, we could hear some rustling noises inside, but we never saw them. Who were our summer guests?

I decided it was time to find out who these guests were. I had a plan. I got a chair and a few snacks. I placed my chair behind a bush. I moved it a little so I could see the hole. Then I sat down for a long wait. I sat very quietly, and it didn't take long. A tiny fur face peeked out of the hole. Then, two more furry faces peeked out. Oops! A furry creature got pushed out of the hole by its brother. It started to walk around. Out came another and another. They started to play with each other. It looked like they were having lots of fun. But what were they? The dark brown fur seemed to cover their shapes. Another creature came. But it was a lot bigger. A large mother Hedgehog waddled out. Now I knew who our summer guests were!

	word count	# of errors
Summer Guests	2	___
One summer we had guests in our shed. The only problem	13	___
was that we didn't know who they were. All we could see of them	27	___
were signs or clues. We could see two very large holes dug under	40	___
the shed. We could see some animal footprints around the holes.	51	___
When we were very quiet, we could hear some rustling noises	62	___
inside, but we never saw them. Who were our summer guests?	73	___
I decided it was time to find out who these guests were. I had	87	___
a plan. I got a chair and a few snacks. I placed my chair behind a	103	___
bush. I moved it a little so I could see the hole. Then I sat down for	120	___
a long wait. I sat very quietly, and it didn't take long. A tiny fur	135	___
face peeked out of the hole. Then, two more furry faces peeked	147	___
out. Oops! A furry creature got pushed out of the hole by its	160	___
brother. It started to walk around. Out came another and another.	171	___
They started to play with each other. It looked like they were	183	___
having lots of fun. But what were they? The dark brown fur	195	___
seemed to cover their shapes. Another creature came. But it was a	207	___
lot bigger. A large mother Hedgehog waddled out. Now I knew	218	___
who our summer guests were!	223	___

Total Reading Time _____

The Band

"I'm answering your ad in the school paper. I play electric guitar and I want to play in your group!" explained Michelle. Brian had never considered that a girl might apply and wasn't sure if he wanted Michelle in the group. "What can you play?" asked Brian.

"Here, listen to this," retorted Michelle, who began unpacking her guitar. She plugged the guitar into Brian's amplifier and began playing. The guys in the band were impressed. "Hey, you're really good!" shouted Nicky. "Where did you learn to play like that?"

"My sister's in a band," explained Michelle. "She's pretty good and spend a lot of time with me. Well, can I play with you guys?"

"We'd better talk it over," snapped Brian, still unsure about having Michelle in the group. The guys huddled in the corner. "What do you think?" Brian asked.

"She's great, let's invite her in," said Nicky.

"But she's a girl," complained Brian.

"So what," replied Nicky, "She plays terrific electric guitar, and better yet, she wants to be in the group with us."

And so the boys voted. Michelle won 3 to 0, and the group had a new member for their band. Now the band was ready to perform, and Michelle had the perfect idea for where they should hold their first show, the school talent show. The talent show was only three weeks away, so the band had to work fast.

	word count	# of errors
The Band	2	___
"I'm answering your ad in the school paper. I play electric	13	___
guitar and I want to play in your group!" explained Michelle. Brian	25	___
had never considered that a girl might apply and wasn't sure if he	38	___
wanted Michelle in the group. "What can you play?" asked Brian.	49	___
"Here, listen to this," retorted Michelle, who began unpacking	58	___
her guitar. She plugged the guitar into Brian's amplifier and began	69	___
playing. The guys in the band were impressed. "Hey, you're really	80	___
good!" shouted Nicky. "Where did you learn to play like that?"	91	___
"My sister's in a band," explained Michelle. "She's pretty good	101	___
and spends a lot of time with me. Well, can I play with you guys?"	116	___
"We'd better talk it over," snapped Brian, still unsure about	126	___
having Michelle in the group. The guys huddled in the corner. "What	138	___
do you think?" Brian asked.	143	___
"She's great, let's invite her in," said Nicky.	151	___
"But she's a girl," complained Brian.	157	___
"So what," replied Nicky, "She plays terrific electric guitar, and	167	___
better yet, she wants to be in the group with us."	178	___
And so the boys voted. Michelle won 3 to 0, and the group had a	193	___
new member for their band. Now the band was ready to perform, and	206	___
Michelle had the perfect idea for where they should hold their first	218	___
show, the school talent show. The talent show was only three weeks	230	___
away, so the band had to work fast.	238	___

Total Reading Time _____

Appendix III

The Reading Passages Practised in the Treatment Period

The Uses of Reading[1]

Read not only to contradict and confute, nor to believe and take for granted, nor to find talk and discourse, but to weigh and consider. Some books are to be tasted, others to be swallowed, and few of them to be chewed and digested; that is, some books are to be read only in parts; others to be read but not curiously; and some few to be read wholly, with diligence and attention. Some books also may be read by deputy, and extracts made of them by others; but that would be only in the less important arguments and the meaner sort of books; else distilled books, like common distilled water, flashy things.

Reading makes a full man; conference a ready man; and writing an exact man; and therefore, if a man writes a little, he has need of a great memory, if he confers little, he has need of a present wit; if he reads little, he has of much cunning, to seem to know what he does not.

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[1]Extracted from: P. Richard & W. Hall. (1965) "L'Anglais par la Littérature, Classe de Première Classique" Hachette. Paris. (182)

Smoking in Public: Live and Let Live[2]

Ours is a big world, complex and full of many diverse people. People with many varying point of view are constantly running up against others who have differing opinions. Those of us who smoke are just one group of many. Recently, the activism of non-smokers has reminded us of the need to be considerate of others when we smoke in public.

But, please! Enough is enough! We would like to remind non-smokers that the courtesy is a two-way street. If you politely request that someone not smoke you are more likely to receive a cooperative response than if you scowl fiercely and hurl insults. If you speak directly to someone, you are more likely to ge what you want than if you complain to the management.

Many of us have been smoking for so long that we sometimes forget that others are not used to the aroma of burning tobacco, we're human, and like every one else we occasionally offend unknowingly. But most of us are open to friendly suggestions and comments, and quite willing to modify our behaviour to accommodate others…

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[2] E.M, Baudoin et al. (1988) "Reader's Choice". The University of Michigan Press.(112)

Single-sex education(the Economist May 11th 2002)

Boys will be boys![3]

For nearly a century, girls were separated from boys in schools better equipped for needlework than for higher mathematics. Nowadays, the educational rights of girls have improved considerably- so much so, in fact that people are thinking about separating the sexes again this time by choice.

There are currently only 11 single sex-public schools in the country. The idea has been viewed as dangerous ever since 1972, when congress formally banned sex discrimination in schools. Although the law- known as title IX- did not ban same-sex schools have worried that they would get sued if they tied it. Single sex schools flourish in the private sector, and students who attend them do better than average in tests.

Their supporters claim that students work harder when they are free of the distractions of trying to impress, put down or seduce the opposite sex. It is also easier to abandon gender stereotypes: girls in all- girl schools are more likely to study maths and science, boys in all-boy schools become more involved in theatre…

The arguments against single-sex education come primarily from civil-rights and women's groups who appose publicly-funded segregation on principle. They fear that gender stereotyping will increase.

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[3] Extracted from: J,I. Bordon et al. (2004). "Going Places".Didier. Paris. (98)

Lies and CVs [4]

Part one

A recent survey found 71 % of firms had encountered "serious lying" on CVs. This included people disguising a spell in prison as time they had spent hitch-hiking abroad, and university students hiding the fact they had a diploma for fear it might spoil their chances of getting a temporary job. "Most applications for jobs", says Scott Willis, the spokesman for personal Manager's association, "include either complete lies or, let's say, exaggerations – generally concerning qualifications. Many people inflate their grades or claim a higher academic level than they have actually achieved."

Salary is another favourite subject for those who "impression manage" their CVs. "Candidate for jobs often add a couple of thousand pounds to the salary they got in their previous post", states Julian McGrath of the Concorde Consultancy for Recruitment. "This pretty short-sighted strategy, in fact, since you have to provide a P60 tax declaration when you join a new firm, so they find out exactly what kind of wages you've been earning."

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[4] Extracted from: J,I. Bordon et al. (2004). "Going Places".Didier. Paris. (74)

Part two

        Mr Willis considers that there is a third area in which people often comes to unstuck- their interests. "You definitely mustn't imagine that putting "abseiling" or "walking the Pennine Way" down as a hobby will necessarily make you a more successful candidate. Quite a few people claim that they have some exotic hobby, whereas what they really like to do is to put their feet up and watch television with a can of lager."

        To test the accuracy of a candidate's CV, there is no better than an interview. "A good interviewer will see how the candidate answers", adds Mr Willis, "and make judgements from there. The skill is walking the fine between lying and making the most of the truth. That's the very secret of a successful CV writing."

"Be water. Be water."[5]

(by M.Morgan)

Part one

A woman doctor from the United States finds herself involved quite unexpectedly in a journey of initiation through the Australian Outback, organised by a very ancient Aborigine tribe referred to as The Wild People or The Ancient Ones

We did several tests that afternoon. A young woman came to me holding a plate full of rocks. "Choose a rock. Choose it wisely. It has the power to save your life." I looked at the rocks. They all looked alike. There was nothing outstanding about any of them. They were simply grey-red pebbles about the size of a nickel or quarter. I wished something would glow or look special. No luck. So I faked it: I looked intently, and hen I selected one from the top and held it up triumphantly. The faces surround ding me beamed in approval, and in mental silence I rejoiced, "I got the right rock!"

We carried several bladder water vessels. I know that the humans are approximately 70 percent water and require a minimum of one gallon per day under ideal condition. Observing the Aborigines, I saw that they required much less, and drank less than I.

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[5] Extracted from: J,I. Bordon et al. (2004). "Going Places".Didier. Paris. (132)

<center>**"Be water. Be water."**</center>

<u>Part two</u>

… In fact, they rarely drank from the water containers. Their bodies seemed to use the moisture in food to a maximum. They believe Mutants* have many addictions and water is included.

So we began to walk, with me assuming the lead position. It was a very hot day. The temperature seemed higher than 105 degrees. No plants or animals appeared along our route to be honoured as our meal. We found no water. My tongue was so dry it was almost stiff, and it felt swollen several times the original size, a dry sponge between my teeth. At one point, I shouted. Cool water lay in a wet pool mirages before my eyes, but when I arrived at the place in the sand, it was only sand.

Then I remembered the rock I had chosen and still held in the cleavage of my chest. It had been there for months. I had forgotten it. I took it out and put it into my mouth, wallowed it around, and miraculously, moisture begun to form. I could feel the ability to swallow being restored. There was a hope. Perhaps I was not meant to die today.

* People who do not belong to the tribe

Part three

"Thank you, thank you, thank you," I said in silence. I would have cried, but my body did not have enough moisture left for tears. So I continued mentally to ask for help: "I can learn. I will do whatever is needed. Just help me to find water."

The thought came to me: "Be water. Be water. When you can be water, you will find water." I didn't know what it meant. It didn't make sense. Be water! That isn't possible. But again I concentrated on forgetting my left brain society programming. I shut out reason. I opened myself up to intuition and, closing my eyes, I began being water. As I walked, I used my senses. I could smell water, taste it, hear it, and see it. I was cold, blue, clear, muddy, still, rippling, ice, melting, vapour, steam, rain, snow, wet, nourishing, splashing, expanding, unlimited. I was every possible image of water that came to mind.

DR. Martin Luther King, JR.[6]

Martin Luther King, JR. was born to Reverend and Mrs. Martin Luther King, SR. on January 15, 1929 in Atlanta, Georgia. He was a very intelligent child and entered the Yong Street Elementary School before the age of six. He later attended Booker T. Washington High School. Dr.King was able to enter Morehouse College without graduating from high school because of his high scores on the college entrance examination. Dr.King graduated from Morehouse in 1948 and attended Crozier Theological Seminary where he studied to become a minister like his father. He received a doctorate degree in 1955 from Boston University. Dr.King married Coretta Scott in 1953 and they were parents of four children.

Dr.King became involved with the Civil Rights Movement in America and encouraged African Americans to stand up for their civil rights. He organised marches and gave speeches making America aware of the discrimination African Americans received in America.

Dr.King wrote speeches and six books about the civil rights of African Americans. He preached non-violence and helped African Americans to be treated with respect. Many Americans did not like his teachings and Dr.King was killed on April, 1968. He was buried in Atlanta at the King Center. Dr.King will be remembered as the leader of the Civil Rights in America.

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[6] retrieved from: http//www.abcteach.com2001

San Diego Family Press, August 1987

Why Children Need Folk Tales [7]

(By Peter F. Neumeyer)

Folk tales are the stories that people have told for thousands of years. They were heard, rather than read, because general literacy is relatively a recent phenomenon. The tale had to capture the listeners' attention and their fancy. To do that, the stories had to start fast, have clearly defined characters (hero/villain…) and address common concerns conscious or unconscious of the audience.

Interestingly, these folk tales were not originally directed at children. Matters we seldom think about- the absence of central heating, for instance, and the consequent lack of separate bedrooms to which the little ones could be sent when the tales became ribald resulted in a listening audience of both sexes and all ages.

The fact that folk tales were not written for children helps explain the disturbing presence of violent and frightening situations that can be found in collections such as the brothers Grimm.

However, even their violence can serve a purpose for children today, argues child psychologist Bruno Bettlheim in his book, "The Uses of Enchantment". Symbolically, folk tales translate the concerns, fears and fantasies of a child. In experiencing these feeling through a substitute such as a fairy tale**,** a child may, in a detached and harmless way, come to rehearse and manage his fears and concerns. That, maintains Bettelheim, is how fairy or folk tales can be of "use" in bringing up children. Interestingly, Bettelheim opposes illustrations, arguing that they limit a child's creative imagination.

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[7] Extracted from: J,I. Bordon et al. (2004). "Going Places".Didier. Paris. (154)

Swallows and Their Ways [8]

(by E. Hosking and C. Newberry)

Part one:

When they first arrive, the swallows are hungry after their flight across the sea to this island. The birds are restless, however, and seem never still for more than a moment or two at a stretch. From time to time a few perch on branches, on telegraph wires, or on the roofs of house or farm, but few minutes later they will be again on the wing, hunting and chasing such small flies as are to be found at this early season. At times they wheel about high above us, mere dots against a blue sky, and at other times, with what seem almost lightening speed, and they streak around our houses to and fro, over and between the roofs, turning and darting and twittering as they go. They skim low over ponds and streams, diving under the arches of bridges, and often in flight they touch the water to drink or to pick up small flies or other insects floating on the surface.

Swallows usually nest in a shed or out-house to which there is easy access through a large permanent opening as a doorway without a door, or a widow from which the glass is missing; and in which there are suitable beams and rafters close under he roof to serve as a support for the nests. A typical place, and perhaps the one the bird favours most, is a cow-shed or some out-building adjoining a farm usually affords plentiful supplies of flying insects.

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[8] Extracted from: P. Richard & W. Hall. (1965) "L'Anglais par la Littérature, Classe de Première Classique" Hachette. Paris. (124-125)

Swallows and Their Ways

<u>Part two:</u>

The material for the formation of the nest consists of mud which is collected from the mud banks or nearby pod or stream. It is carried, a small piece at a time, in the swallow's bill. The pellets of mud are laid much in the same manner as bricks, each pellet bridging two pellets of the previous layer. Hair and small pieces of straw are worked in to help bind the mud together. When the mud shell is completed it is usually lined with feathers, and sometimes with a little hair again.

If you want to see the young swallows leave the nest for their first flight, we must keep fairly close watch on them from the nineteenth day after hatching. On the nineteenth and twentieth days, we see the swallow chicks very active on and around the nest. Wing flapping is, at this stage, a favourite pastime.

On the twenty-first day, the parents normally begin to encourage the chicks to fly. They themselves fly into the barn and, with their beaks full of food; hover with rapidly beating wings a foot or so in front of the nest. After a moment, they fly out again without having given any of the food. The chicks lean eagerly forward, tempted, yet not daring to take the plunge. At the last moment arrives when the first chicks plucks up his courage and embarks on his first flight. His brothers and sisters soon follow.

Appendix IV

Fluency Graph:

Graphing the student's progress during the treatment period

Student's name: ....

# of words read correctly in one minute

160
150
140
130
120
110
100
90
80
70
60
50
40
30
20
10

0   1   2   3   4   5   6   7   8   9   10   11   12

Number of sessions (duration of the treatment)
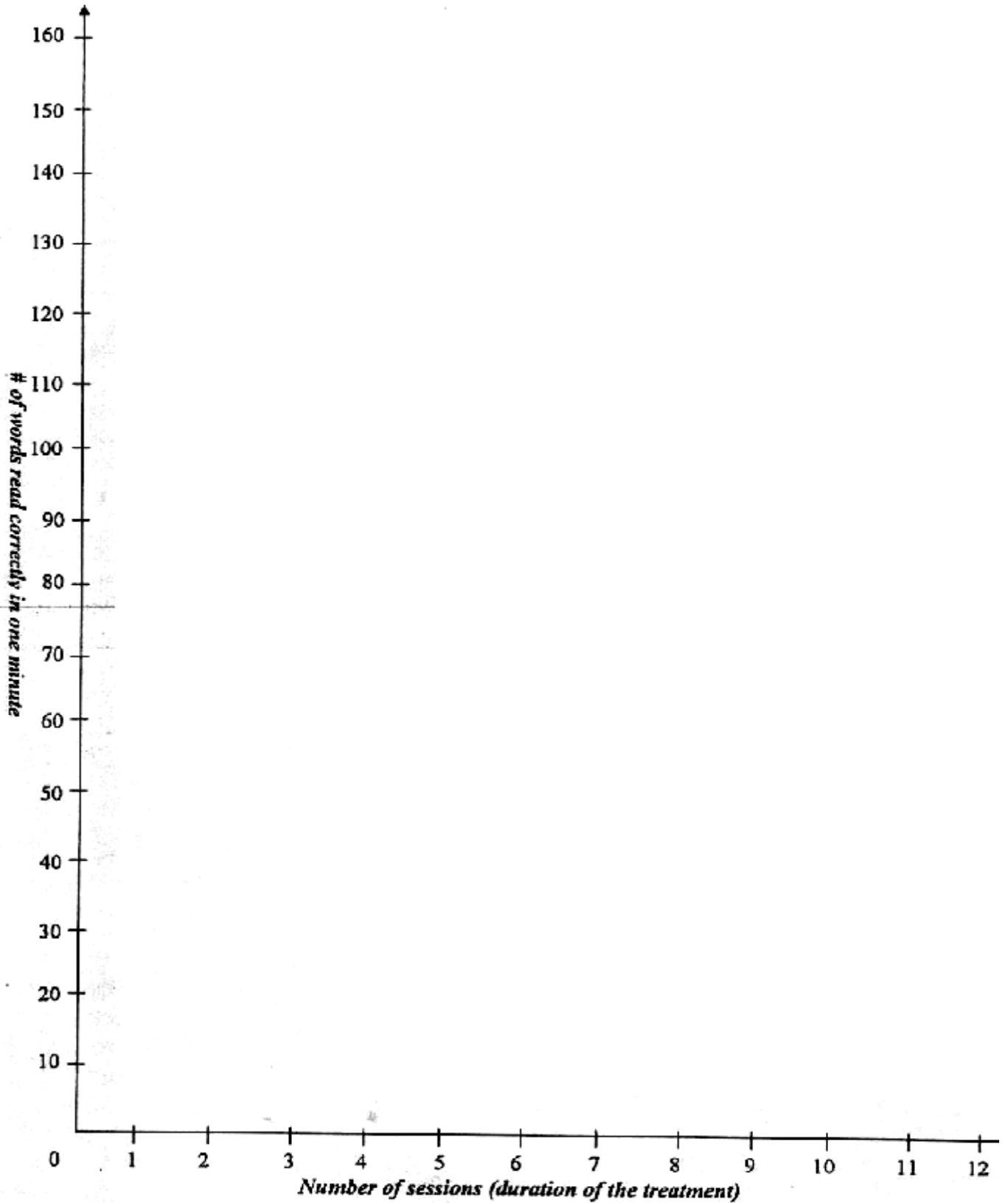
Appendix V

The Needed Data to calculate the *t* test for Difference in CWPM between the

Control group and the Experimental group (post test)…………………**145**

The Needed Data to calculate the *t* test for Difference in CWPM between the

Control group and the Experimental group (post test)

N°	x1	$(x_1)2$	x_2	(x2)2	(x1-x2)d	(x1-x2)2
1	115	13225	135	18225	-20	400
2	117	13689	155	24025	-38	1444
3	105	11025	114	12996	-9	81
4	94	8836	122	14884	-28	784
4	106	11236	122	14884	-16	256
6	114	12996	130	16900	-16	256
7	117	13689	130	16900	-13	169
8	106	11236	135	18225	-29	841
The Sum	$\Sigma x_1=$ 874	$\Sigma(x_1)2=$ 95932	$\Sigma x_2=$ 1043	$\Sigma(x_2)2=$ 137039	-169	4231

x1: CWPM of the Control Group

x2: CWPM of the Experimental Group

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