

Explicit teaching of segmenting and blending strategies to ESL Prep students will assist word reading accuracy.

ABSTRACT:

Early years schooling includes a substantial focus on reading, yet many students in the early years of primary school still present with reading difficulties. One area of literacy which has been identified as an area of interest is phonological awareness, an awareness of the sound structure of language. A problem many beginning readers encounter is a lack of ability to segment and blend sounds in language. An inability to correctly identify sounds leads to an inability to read isolated words, therefore words in prose.

The current study hypothesises that explicitly teaching blending and segmenting strategies to ESL Prep students will assist with word reading accuracy.

The participants in this study include 5 prep students from an ESL (English as a Second Language) classroom. The one male and four female participants are from an Arabic / Lebanese background and fall between the age range of 61 – 70 months old.

The participants will partake in 10 scaffolded lessons focusing on segmenting and blending words in prose. The 20 minute lessons will occur during the literacy block. The results will be comprised from a direct comparison between the pre test and post test data. The pre and post test include BM Benchmark text level, Marie Clay word reading and the Rime Units test.

The post test data showed positive movement for all participants in all three tests. The participants were also observed on their pre observable reading behaviour and post observable reading behaviour. Although not formally assessed, the current study comments on their change in observable reading behaviour.

INTRODUCTION:

Many students in the early years of primary school experience difficulties with reading. Reading is “the process of constructing meaning from written text” (Winch, Johnson, March, Ljungdahl, & Holliday, 2004, p. 3) and it is an extremely important skill which impacts all areas of life, including primary school, high school, university and into

the working world. As Lane, Pullen, Eisele and Jordan (2002) indicate, reading is crucial for life, and it is a “foundation skill for school learning and life learning” (p. 101).

Word reading accuracy is one area of reading which students in primary school show difficulties with, thus impacting their ability to further succeed at school and thrive in life skills. Manyak (2008) and Lane et al. (2002) further suggest that it is the very early, the first stages of learning to read, where many students show difficulties and experience problems with reading.

Despite the intense focus on “robust beginning instruction” (Archer, Gleason, & Vachon, 2003, p. 89) the number of students in middle to late primary school still do not read with the expected abilities in all areas of reading, including word reading accuracy and decoding skills. Students still lack literacy skills including phonological and phonemic awareness (Manyak, 2008; Runge & Watkins, 2006; Yopp & Yopp, 2000; Munro, 1998).

The lack of high achieving readers in schools means that there is a high need for early reading intervention. The long term impact on students who struggle with reading has boosted early years’ teachers to support low achieving readers. Pullen, Lane, Lloyd, & Nowak, (2005) support Archer et al. (2003) “The impact of early reading failure supports the need for early intervention for struggling readers” (Pullen et al. 2005, p. 64). Wang & Algozzine (2008) further suggest that targeted intervention will assist students to gain in all areas of literacy.

One area of literacy which should be taken into consideration to assist struggling readers is phonological awareness (Runge & Watkins 2006; Lane et al. 2002). Phonological awareness has gained considerable attention in educational research during the last 15 years (Lane et al., 2002; Runge & Watkins, 2006) and has boosted early years teachers to learn about and implement phonological awareness programs in the classroom.

For the last few decades professionals have researched and identified the importance of phonological and phonemic awareness as key influences in the development of early reading skills. (Manyak, 2008; Runge & Watkins, 2006; Yopp & Yopp, 2000; Munro, 1998). “Phonological and phonemic awareness, over the last two decades, have been identified as key influences on literacy acquisition” (Munro, 1998, p. 15). Research indicates that the underlying problem is with students’ awareness of sound; hearing sounds, rhyming

sounds, manipulating sounds and blending and segmenting sounds to successfully read words.

Runge & Watkins (2006) along with Lane et al., (2002) suggest that phonological awareness refers to the students' awareness of sound and sound structures that form language, an understanding that spoken language is comprised of individual sounds and conscious sensitivity to the sound structure of language. For teachers, understanding the elements of phonological awareness is an important construct that has implications for educational assessment and may assist with the direction of reading intervention (Runge & Watkins, 2006).

Walsh (2009) outlines the many possible definitions for phonemic/phonological awareness/knowledge and suggests the confusion and lack of final definition of meaning attributes to teachers being unsure about what exactly they need to teach. The implementation of programs to assist struggling readers focuses on many attributes of phonemic/phonological awareness/knowledge, so much that both teachers and students may not be attaining the full value of some programs.

Another area of literacy which should be taken into consideration when assisting struggling readers is phonemic awareness. Phonemic awareness falls under the phonological category and refers to the smaller speech units (Walsh, 2009). Phonemic awareness has also been identified as a key aspect of early reading (Manyak, 2008; Yopp & Yopp, 2000) although there is still some discussion as to the "role it plays in reading development and how it should be addressed in classrooms" (Yopp & Yopp, 2000, p. 130).

"When phonemic awareness is considered developmentally, the question is not whether a child has phonemic awareness, but at what stage they are along the developmental pathway of phonological awareness" (Walsh, 2009).

When learning to read, students need to grasp the difficult concepts surrounding language. Students are required to link many forms of language together, in order to successfully read words and prose. Phonemic awareness is necessary for learning to read as students need to have an awareness of the sequence of sounds in words in order to read them. They need to be able to recognise letters and recode them into sound patterns to verbally say the sounds (Manyak, 2008; Yopp & Yopp, 2000).

Pullen et. al. (2005) suggests that “decoding unknown words when reading text is a necessary tool of skilled readers” (p. 63). For students to successfully decode text they need to use all their sound knowledge and abilities. The task of reading can be difficult for many students, as the skill of putting all their knowledge and abilities together at the same time, to produce effective and efficient reading, takes time and practice.

Students who demonstrate effective phonemic awareness are readers who can successfully identify the small sounds in words and “they have the ability to notice, mentally grab hold of and manipulate these smallest chunks of speech” (Yopp & Yopp, 2000, p. 130). Lane et. al (2002) also suggests that “children with strong phonological awareness can detect, match, blend, segment and manipulate speech sounds” (p. 101).

To assist with decoding words, students are required to understand sound patterns. Plus they need the ability to blend different sound patterns together, to produce a separate sound. The ability to blend individual sounds boosts students reading ability. Manyak (2008) indicates that the understanding of sound patterns makes early phonetics instruction useful for children and facilitates children’s ability to blend letter sounds while decoding words. The ability to successfully use sound manipulation by blending and segmenting sounds in words results in higher word knowledge, thus impacting the students ability to read prose.

Furthermore, Sanacore (2010) recommends alongside the development of sound patterns and structures, the development of identifying rimes helps children to decode words. Reading words with the same rimes allows students to hear the repetition of sounds, and in turn recognise the letters which form the blend. Increasing students awareness of rimes assists with sound manipulation and furthermore, with segmenting unknown words in prose.

For students to demonstrate success as readers, they need multiple skills and knowledge about sounds. Students also need “repeated opportunities” (Pullen et al., 2005, p. 64) for development and to practice their decoding abilities. Beginning to read can prove to be difficult for struggling students and repeated practice to reinforce skills and abilities, in the area of sound blending and segmenting is a key notion for students. Repeated opportunities give students the time to consolidate their knowledge.

Reading difficulties emerge when students demonstrate difficulties manipulating sounds. Advanced, more effective readers grasp the concept of sound manipulation by blending and segmenting sounds in words. These students know that by blending two or three individual sounds together, makes a new sounds. Struggling readers show a lack of understanding or lack of ability to use their phonological skills to blend sounds together for effective word reading (Lane et al., 2002).

Overall, students' awareness and knowledge of literacy is an ongoing and gradual process. As their phonological and phonemic awareness and knowledge develops, so too does their literacy. Munro (2005) supports the notion and suggests that this trend is "closely linked with learning to read words" (Munro, 2005).

For the Prep classroom, each student will bring something different to their first year of schooling. Compton-Lilly (2008) proposes that "in order to meet the unique academic needs of each student, it is important that teachers value the differences each child brings to the classroom" (p. 668). The differences students bring to the literacy classroom can be divided into two categories 1) reading processes (letter/word knowledge, strategic problem solving strategies) and 2) ways of being (personal experiences).

Especially in the first year of schooling, anxiety and stress will impact on students becoming literate and their ability to learn to read. (McTigue, E., Washburn, E. & Liew, J. (2009) further suggest that along side alphabet knowledge and phonological awareness a students self efficacy plays just as important role in their ability to learn reading.

Learning to read is such a complex task and for first year Prep students, their prior personal experiences (ways of being) will impact on reading ability. This Action Research Project takes place in an ESL classroom where all the students come from a Lebanese and Arabic speaking background. Therefore the "cultural and social dimensions that affect literacy learning" (Compton-Lilly 2008, p. 668) must be noted.

The current study will explore that by explicitly teaching blending and segmenting skills to ESL Prep students it will improve their word reading accuracy.

METHOD:

Design:

This case study will be completed in a naturalistic setting. The participants will complete a pre test, participate in the current study, and complete a post test. There is no control group, rather the results are determined from a direct comparison between the teaching groups' pre and post tests.

The pre tests include the BM Benchmark Kit 1 to determine a text level, clay word reading list C and the rime units test. The students' observable reading behaviour will also be recorded on a teacher made record sheet (see appendix 1). The observable reading behaviour will not be recorded as a formal assessment, rather informally via teacher anecdotal notes and the record sheet.

The intervention will explicitly teach and scaffold the learning of the skills segmenting and blending words in isolation and in prose. The students will read the text and practicing the skill of segmenting and blending unknown words. The focus words come directly from the text, they will not have the same onset and rime. The students will discuss possible places for segmenting the words, either at the vowel, or known onset, or known rime, or other possible places.

The teacher will take the teaching group during the literacy block, for 20 minutes a lesson over a 2 week period. The teacher will record each lesson on a teacher made record sheet (see appendix 2), outlining the focus words, how each student attempts the words, their reading behaviour and what their thoughts are about segmenting and blending.

The post tests include the BM Benchmark Kit 2 to determine a text level. It was decided to use the BM Benchmark Kit 2, due to the different texts in the kit, yet it was possible to determine a comparative pre and post text level. Plus the clay word reading list C and the rime units test. The clay word reading used the same list as the rime units test used the same words.

To determine the effectiveness of the intervention, the post test results will be measured against the pre test results. To assist with determining the effectiveness of the intervention, although not measurable on a standardised scale, the students' observable reading behaviour will also be noted.

Participants:

The participants were chosen from an ESL Prep classroom. The participants come from a background where they speak Arabic at home either with their Parents or Grandparents. The participants have either a Mother or Father or both parents who are Lebanese and speak either Arabic or broken English at home.

The five participants were chosen based on their low text levels and their low individual word reading scores during class testing which occurred in August, 2010. Plus their observable behaviour when reading noted via teacher anecdotal notes.

Table 1: Participant Data.

Student	Control = 0 Teaching=1	Age in MONTHS	Gender 0=Male 1=Female	Years of Schooling	ESL No=0 Yes=1	LNSLN funding 0=SLD 1=ID 2=Asp	Earlier Intervention No=0 RR=1 Bridges=2 ERIK=3...	Text Level	Burt Word Reading	Clay Word Reading List A
A	1	67	0	1	1	N/A	0	0	1	2
B	1	61	1	1	1	N/A	0	0	1	1
C	1	61	1	1	1	N/A	0	0	0	0
D	1	65	1	1	1	N/A	0	2	0	1
E	1	70	1	1	1	N/A	0	2	0	0

Table 1 shows participant data, including the tests which were used to determine their entry into the current study. The table indicates that the study consists of 1 male and 4 female students aged between 61 and 70 months old. The test scores are all low, with reading level and word recognition both difficulties for the participants.

The participants' general classroom observable reading behaviour is outlined below. These observations are taken from teacher observations and discussions with the teacher aid and literacy coordinator.

Student A: Male, 67 months old.

In the classroom Student A displays a lack of confidence with reading, by commenting *"I can't read, this is tricky"*. He often demonstrates a possible dislike for reading by displaying disinterested behaviour during the literacy block. Student A rarely offers answers to questions, yet when is asked directly to answer to question will often answer correctly. He shows misbehaving behaviour during the literacy block and he never asks to do extra reading.

During Pre Tests: Student A appeared to read the words in the rime units test silently and then say the word out loud. He displayed very hesitant reading behaviour and appeared to be reluctant when saying words he was unsure about. During the text level reading his behaviour showed slow and stilted reading behaviour.

Student B: Female, 61 months old.

In the classroom Student B displays a lack of confidence with reading, hesitating to read out loud and answer questions in front of the class. She does not display shy or introvert behaviour in any other learning areas. Student B often demonstrates a dislike for reading by, unlike her close peer friends, never asking to 'read for fun' and rarely choosing to do reading activities in her free time.

During Pre Tests: Student B appeared to read the words in the clay word and rime units test slowly when attempting to read the words. She displayed hesitant behaviour and repeated the onset several times before attempting the rime. She did not show knowledge of blending the word back together.

Student C: Female, 61 months old.

In the classroom Student C displays a limited knowledge of the English language, talking in broken sentences and words. She entered Prep displaying very limited vocabulary. Her behaviour suggests she is shy and quiet, as she does not raise her hand to answer questions or offer answers in front of the class. Student C does display behaviour to suggest she likes reading, by often choosing to read to herself when given the opportunity.

During Pre Tests: Student C demonstrated behaviour of reading out loud and appeared to show pride when reading during all the tests, by smiling throughout the one on one reading. She attempted every word for the clay reading and rime units tests and showed a willingness to read by asking "*is there any more?*"

Student D: Female, 65 months old.

In the classroom Student D displays quiet and very shy behaviour, by answering questions with a quiet unsure tone. She appears to lack confidence when reading and appears very hesitant to have a go, by not putting her hand up to answer questions. She displays behaviour to suggest liking reading, by often choosing to read to herself when given the opportunity.

During Pre Tests: Student D demonstrated knowledge of analogy by commenting during the rime units test that "*this word looks this that one*". She showed a willingness to

share her knowledge by stopping to discuss how the words were similar. She appeared to enjoy demonstrating her knowledge of the words.

Student E:

In the classroom Student E demonstrates very outspoken and confident behaviour by often attempting to read words around the classroom. She speaks with a slight lisp and demonstrates difficulties with pronunciation, although her August 2010 sound ID test showed she knows what letters match what sounds she is attempting to pronounce.

During Pre Tests: Student E demonstrated behaviour of reading out loud during all the tests and appeared to show pride when reading by smiling when given the chance to read. She attempted every word for the clay reading and rime units and showed a willingness to read by playfully asking “*is it my turn to read again?*” and continuing to go and wait at the teachers testing table.

Materials:

Pre and Post Tests:

- PM Benchmark Kit 1 and 2.
- Clay: An Observational Survey: Word Reading Score Sheet (2002). List C.
- Dalheim: Rime Units Test record sheet (2004).

Intervention:

- Teacher Made Record Sheet - observable reading behaviour (see appendix 1).
- Teacher Made Record Sheet - lessons (see appendix 2).
- Sentence strips, paper, coloured pencils, playdoh, sand and rice, magnetic letters.
- Phonics Fun: Reading Program: Clifford the big red dog:

- 1) Hello, Clifford!
- 2) I See My Dad
- 3) Happy Birthday, Clifford!
- 4) T-Bone on Top.
- 5) Who hid It?

Blevins, W. (2002). Clifford the big red dog. Scholastic Entertainment Inc. China.

Procedure:

LESSON FORMAT: Two lessons go together, using the same text and following on together.

** Lesson 5 onwards requires the students to determine where they should segment the focus words.

** Lesson 8 onwards requires the students to determine the focus words based on the words they have difficulties reading in the text, plus determine where they should segment the words.

Lessons 1, 3, 5, 7 and 9

ENGAGE: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the difficult/new words. Use these difficult/new words as the focus words.

- Review the previous lessons words. **Except lesson 1.
- Read the text noting what words the students show difficulties reading.
- Write the new words on a piece of sentence strip and cut into appropriate segments.
- Segment the words again and blend back together to read.
- Re read the text focusing on reading the new words in prose.
- Use a kinaesthetic tool to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- ** playdoh, rainbow writing, sand and rice, magnetic letters.
- Students re read own writing.
- Re read the text focusing on reading the new words in prose.

Lessons 2, 4, 6, 8 and 10:

ENGAGE: Review the previous lesson and discuss what the students remember about segmenting and blending.

Focus: where to segment the word for easier reading.

- Review the previous lessons words.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the text focusing on reading the new words in prose.
- Use a different kinaesthetic tool to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- **playdoh, rainbow writing, sand and rice, magnetic letters.

Students re read own writing.

REFLECTION: Explicitly tell the students they have learnt how to segment words, making them easier to read. Discuss how they are blending and segmenting sounds. Have the students re read the individual focus words, then re read the text and share what they have learnt.

Focus Words:

Lessons 1 and 2) 8 words: Clifford, Emily, Elizabeth, Cleo, T-Bone, hello, friends, name.

Lessons 3 and 4) 4 words: see, dad, like, Charley.

Lessons 5 and 6) 5 words: window, dock, park, happy, birthday.

Lessons 7 and 8) 8 words: mum, tot, likes, balloons, pats, stop, spots, pats.

Lessons 9 and 10) 4 words: who, hid, mitt, funny.

Analysis of data:

The results are determined from a direct comparison between the pre and post scores. The results will demonstrate any positive or negative movement of the test scores and the discussion will explore possible reasons for the movement and state whether the movement was due to the blending and segmenting intervention or other extraneous variables.

The data from the pre and post tests will be displayed and discussed in light of quantitative and qualitative data. The quantitative data will explore the test scores, word reading and reading levels. The qualitative data will explore the students' observable reading behaviour and changes in noticeable classroom behaviour in terms of word reading.

The data will show group scores and trends from the 3 tests, text level, clay word reading and the rime units test. The results will show the individual students score and the groups' average.

The data will also show individual student trends. Each data set will show the results for each student and will display pre and post scores. The rime units test will be further analysed into 3 letter words, 4 letter words and 5 letter words. Learning trends for each student and differences between students will also be discussed.

RESULTS:

The results will show that the explicit teaching of segmenting and blending words showed a positive impact on the participants test scores. All students showed positive movement and increased their words reading and their text level.

Trends for the group:

Table 2: Pre and Post Test Scores.

Attendance No. of sessions	Text Level PRE	Text Level POST	Clay Word Reading List C PRE	Clay Word Reading List C POST	Rime Units PRE	Rime Units POST
Student A 8	0	1	7	10	60	85
Student B 7	1	3	7	8	50	74
Student C 7	0	2	5	7	75	93
Student D 10	2	7	10	10	63	115
Student E 10	1	6	9	14	63	102

Table 2 shows the groups pre and post test results for test level, clay word reading and the rime units test. The Table shows that all the students in all the tests showed positive movement, except Student D in the clay word reading test.

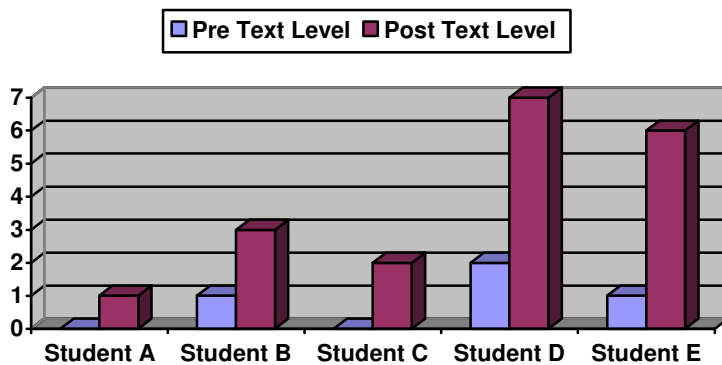


Figure 1

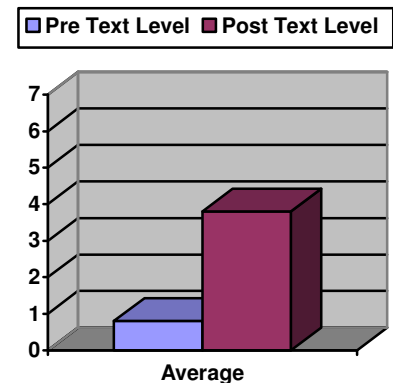


Figure 2

Figure 1 shows the groups pre and post text levels. All students showed positive movement.

Figure 2 shows the groups pre average text level is 0.8. The groups post average text level is 3.8. The groups average text level showed movement of plus 3 levels. Student D made the most improvement while student A made the least. It is interesting to note that Student D and Student E both increased their text level by 5 levels.

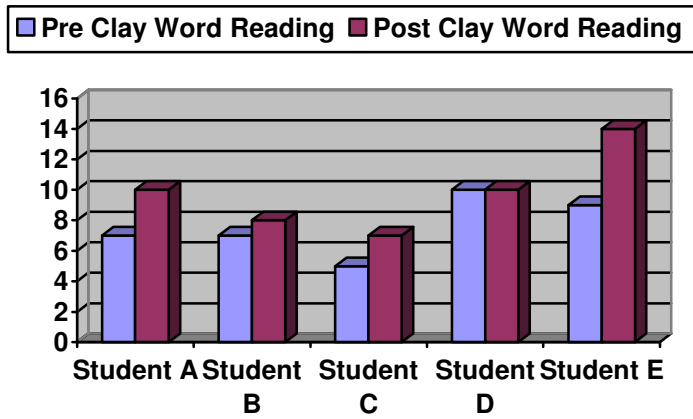


Figure 3

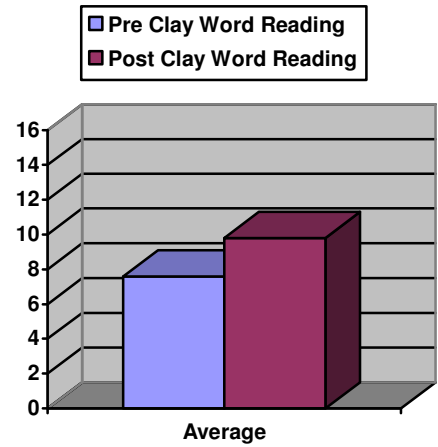


Figure 4

Figure 3 shows the groups pre and post clay word reading scores. All students showed positive movement, except Student D who showed no movement. Student E made the most improvement while student D made the least.

Figure 4 shows the groups pre average clay word reading score is 7.6 words / 50%. The groups post average clay word reading score is 9.8 words / 65%. The groups average clay word reading score showed positive movement of plus 2.2 words / 15%.

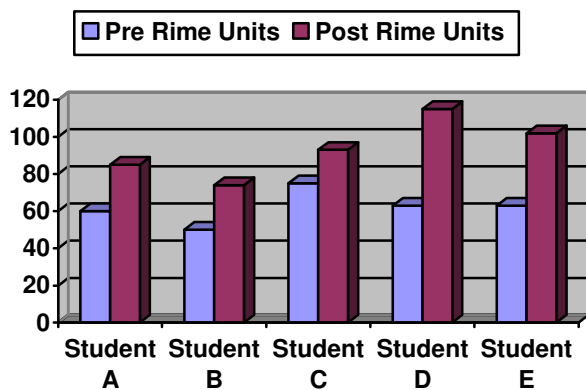


Figure 5

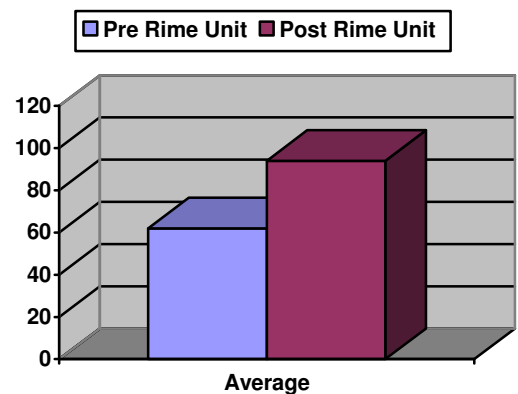


Figure 6

Figure 5 shows the group's pre and post rime units scores. All students showed positive movement. Student D made the most improvement while student C made the least. It is interesting to note that even though Student C made the least movement, the post score was still higher than both Students A and B.

Figure 6 shows the groups pre average rime units score is 62 words / 41%. The groups post average rime units score is 94 words / 63%. The groups average rime units score showed positive movement of plus 32 words, 22%.

Table 3: Rime Units Test Divided Into 3, 4 and 5 Letter Words.

Rime Units	Student A		Student B		Student C		Student D		Student E		Average		
	pre	post	pre	post	pre	post	pre	post	pre	post	pre	post	
3 letter /24	18 75%	20 83%	16 66%	16 66%	20 83%	20 83%	22 91%	22 91%	19 79%	22 91%	19 79%	20 83%	+ 1 + 4%
4 letter /74	30 40%	41 55%	19 25%	36 48%	38 51%	45 60%	24 32%	58 78%	33 44%	55 74%	30 40%	47 63%	+ 17 + 23%
5 letter /51	12 23%	24 47%	15 29%	22 43%	17 33%	28 54%	16 31%	35 68%	11 21%	25 49%	14 27%	27 52%	+13 + 25%
Total /149	60 40%	85 57%	50 33%	74 49%	75 50%	93 62%	63 42%	115 77%	63 42%	102 68%	62 41%	94 63%	+ 32 + 22%

Table 3 shows the rime units test divided into 3, 4 and 5 letter words plus the group average. The groups pre average rime units score is 62 words / 41%. The groups post average rime units score is 94 words / 63%. The groups average rime units score showed positive movement of plus 32 words / 22%.

The data showed for the rime units test there were some rime units which all the students showed difficulties pronouncing. These include /ail, /ight, /eat, /ake, /ate, /ame, /ice, /ide, /ine, /ore, /oke, /ain and /ale.

The data for the group trends supports the hypothesis. All students showed positive movement in their word reading ability while improving their text level.

Trends for individual students:

Student A:

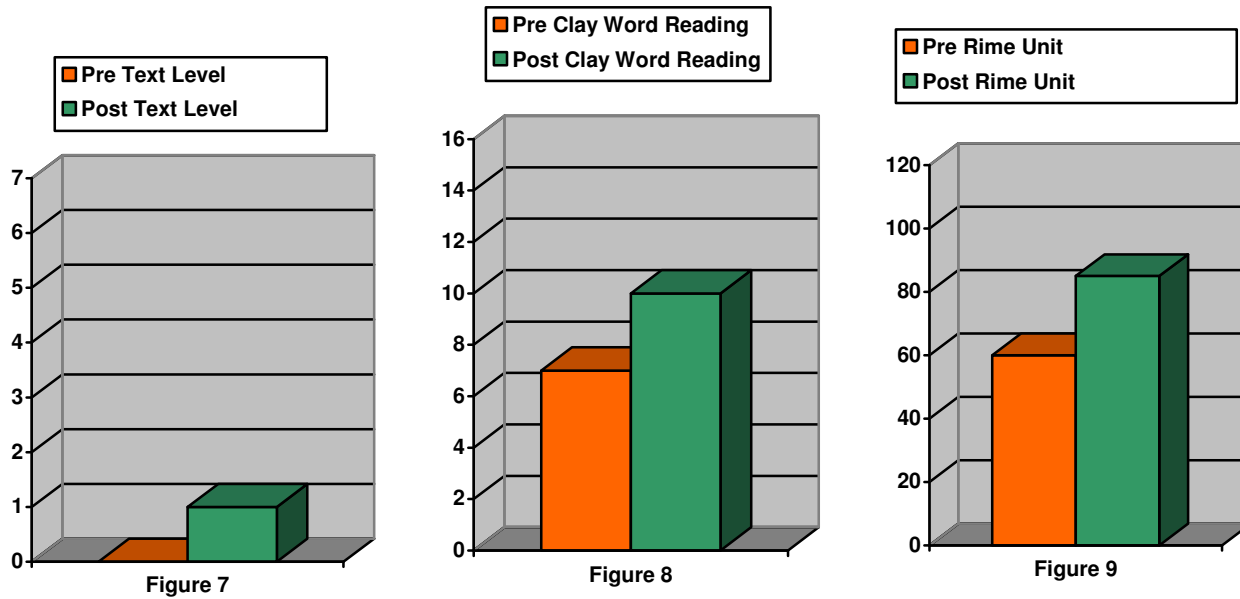


Figure 7 shows that Student A had a pre test score of 0 and post test score of 1 for text level. Student A showed positive movement of plus 1 for text level.

Figure 8 shows that Student A had a pre test score of 7 words / 46% and post test score of 10 words / 66% for clay word reading. Student A showed positive movement of plus 3 words / 20% for clay word reading.

Figure 9 shows that Student A had a pre test score of 60 words / 40% and a post test score of 85 words / 57% for the rime units test. Student A showed positive movement of plus 25 words / 17% for the rime units test.

Table 5: Student A's Rime Unit Test.

Rime Units	Student A				
	pre		post		movement
3 letter /24	18 words	75%	20 words	83%	+ 2 words + 8%
4 letter /74	30 words	40%	41 words	55%	+ 11 words +15%
5 letter /51	12 words	23%	24 words	47%	+12 words +24%
Total /149	60 words	40%	85 words	57%	+ 25 words +17%

Table 5 shows Student A's rime units test scores divided into 3, 4 and 5 letter words.

Student A showed positive movement of plus 8% for 3 letter words, plus 15% for 4 letter words and plus 24% for 5 letter words. Student A showed the most movement for the 5 letter words and least movement for the 3 letter words. Student As overall movement was 17%.

Student B:

Pre Text Level Post Text Level

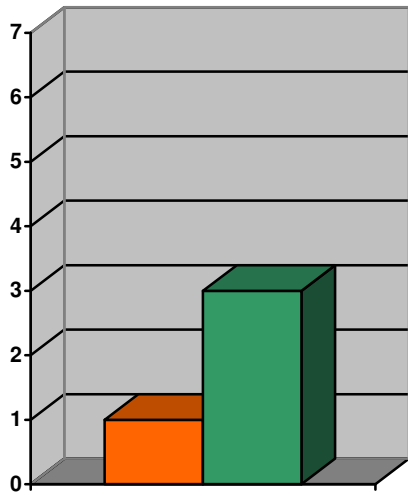


Figure 10

Pre Clay Word Reading Post Clay Word Reading

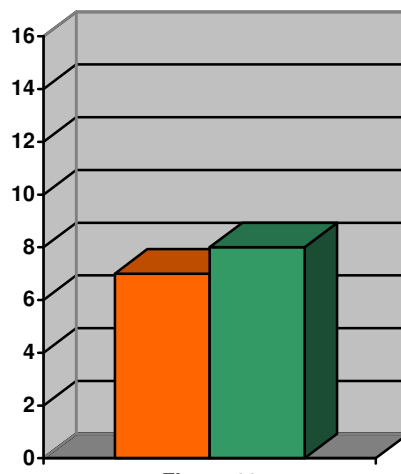


Figure 11

Pre Rime Unit Post Rime Unit

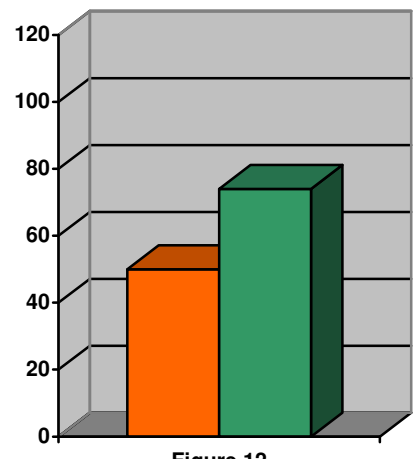


Figure 12

Figure 10 shows that Student B had a pre test score of 1 and post test score of 3 for text level. Student B showed positive movement of plus 2 for text level.

Figure 11 shows that Student B had a pre test score of 7 words / 46% and post test score of 8 words / 53% for clay word reading. Student B showed positive movement of plus 1 word / 7% for clay word reading.

Figure 12 shows that Student B had a pre test score of 50 words / 33% and a post test score of 74 words / 49% for the rime units test. Student B showed positive movement of plus 25 words / 16% for the rime units test.

Table 6: Student B's Rime Units Test.

Rime Units	Student B					
	pre		post		movement	
3 letter /24	16 words	66%	16 words	66%	+ 0 words	+ 0%
4 letter /74	19 words	25%	36 words	48%	+ 17 words	+23%
5 letter /51	15 words	29%	22 words	43%	+7 words	+14%
Total /149	50 words	33%	74 words	49%	+ 25 words	+16%

Table 6 shows Student B's rime units test scores divided into 3, 4 and 5 letter words. Student B showed positive movement of plus 0% for 3 letter words, plus 23% for 4 letter words and plus 14% for 5 letter words. Student B showed the most movement for the 4 letter words and no movement for the 3 letter words. Student B's overall movement was 16%.

Student C:

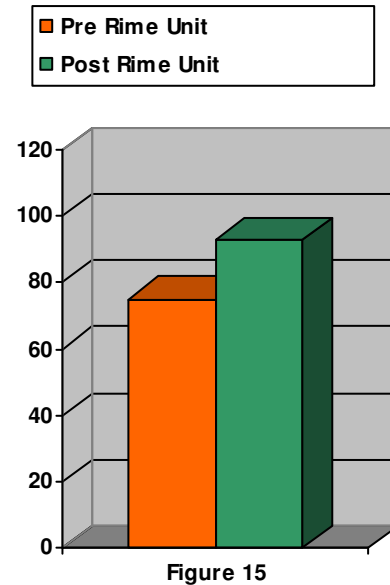
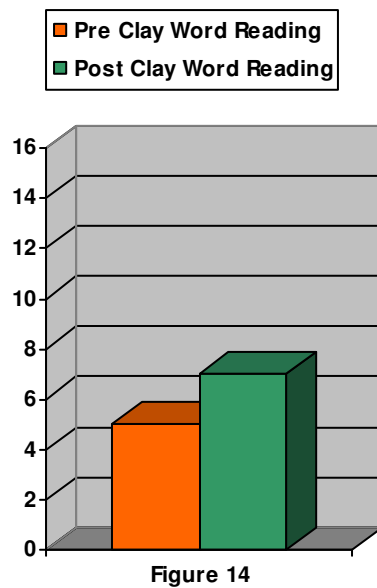
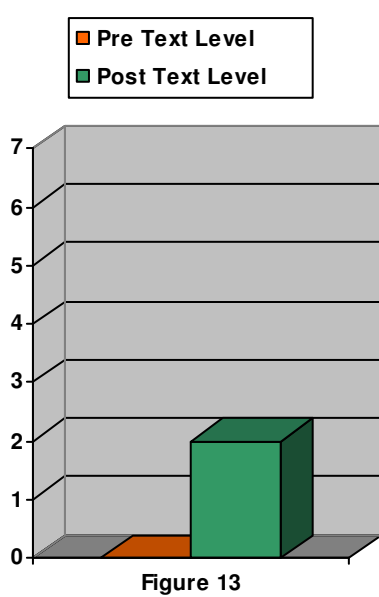


Figure 13 shows that Student C had a pre test score of 0 and post test score of 2 for text level. Student C showed positive movement of plus 2 for text level.

Figure 14 shows that Student C had a pre test score of 5 words / 33% and post test score of 7 words / 46% for clay word reading. Student C showed positive movement of plus 2 words / 13% for clay word reading.

Figure 15 shows that Student C had a pre test score of 75 words / 50% and a post test score of 93 words / 62% for the rime units test. Student C showed positive movement of plus 18 words / 12% for the rime units test.

Table 7: Student C's Rime Units Test.

Rime Units	Student C					
	pre		post		movement	
3 letter /24	20 words	83%	20 words	83%	+ 0 words	+ 0%
4 letter /74	38 words	51%	45 words	60%	+ 7 words	+ 9%
5 letter /51	17 words	33%	28 words	54%	+ 11 words	+ 21%
Total /149	75 words	50%	93 words	62%	+ 34 words	+12%

Table 7 shows Student C's rime units test scores divided into 3, 4 and 5 letter words. Student C showed positive movement of plus 0% for 3 letter words, plus 9% for 4 letter words and plus 21% for 5 letter words. Student C showed the most movement for the 5 letter words and no movement for the 3 letter words. Student Cs overall movement was 12%.

Student D:

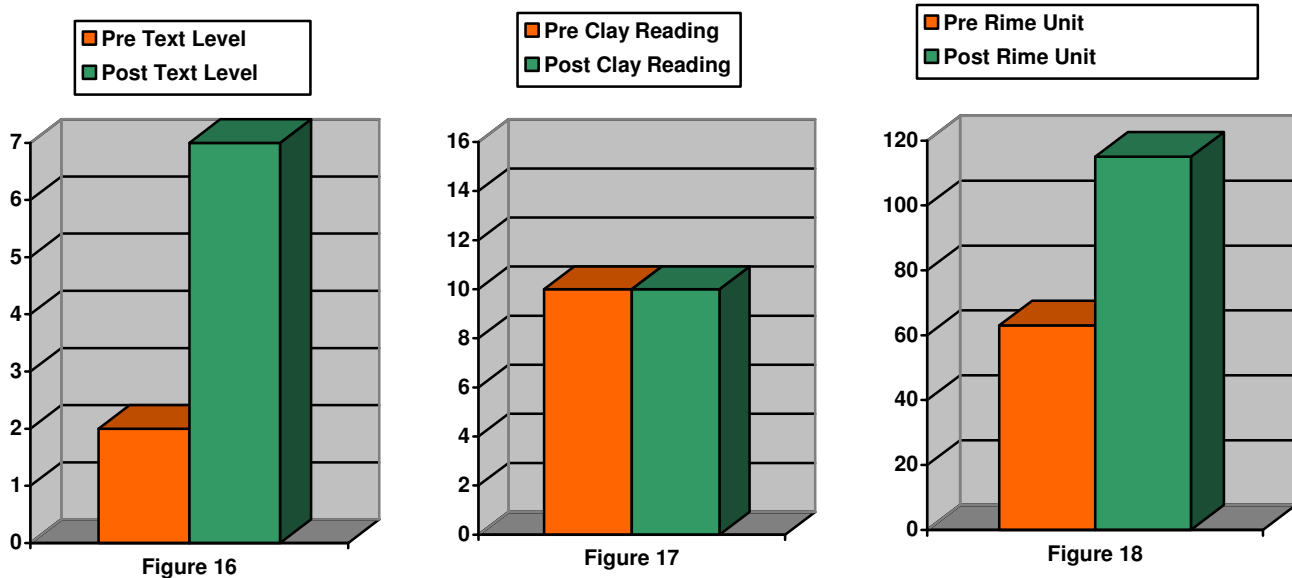


Figure 16 shows that Student D had a pre test score of 2 and post test score of 7 for text level. Student D showed positive movement of plus 5 for text level.

Figure 17 shows that Student D had a pre test score of 10 and post test score of 10 for clay word reading. Student A showed no movement for clay word reading.

Figure 18 shows that Student D had a pre test score of 63 and a post test score of 115 for the rime units test. Student D showed positive movement of plus 52 words for the rime units test.

Table 8: Student D's Rime Units Test.

Rime Units	Student D					
	pre		post		movement	
3 letter /24	22 words	91%	22 words	91%	+ 0 words	+ 0%
4 letter /74	24 words	32%	58 words	78%	+ 34 words	+ 46%
5 letter /51	16 words	31%	35 words	68%	+ 19 words	+ 37%
Total /149	63 words	42%	115 words	77%	+ 52 words	+35%

Table 8 shows Student D's rime units test scores divided into 3, 4 and 5 letter words. Student D showed positive movement of plus 0% for 3 letter words, plus 46% for 4 letter words and plus 37% for 5 letter words. Student D showed the most movement for the 4 letter words and no movement for the 3 letter words. Student Ds overall movement was 35%.

Student E:

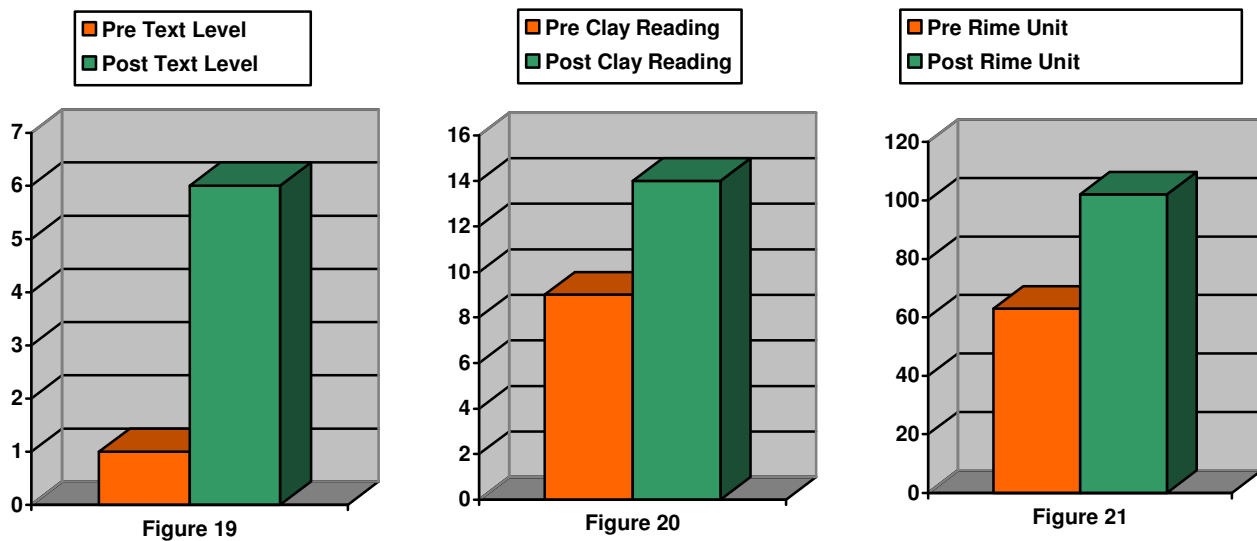


Figure 19 shows that Student E had a pre test score of 1 and post test score of 6 for text level. Student E showed positive movement of plus 5 for text level.

Figure 20 shows that Student E had a pre test score of 9 words / 60% and post test score of 14 words / 93% for clay word reading. Student E showed positive movement of plus 5 words / 33% for clay word reading.

Figure 21 shows that Student E had a pre test score of 63 words / 42% and a post test score of 102 words / 68% for the rime units test. Student E showed positive movement of plus 39 words / 26% for the rime units test.

Table 9: Student E's Rime Units Test.

Rime Units	Student E		
	pre	post	movement
3 letter /24	19 words 79%	22 words 91%	+ 3 words + 12%
4 letter /74	33 words 44%	55 words 74%	+ 22 words + 30%
5 letter /51	11 words 21%	25 words 49%	+ 14 words + 28%
Total /149	63 words 42%	102 words 68%	+ 39 words +26%

Table 9 shows Student E's rime units test scores divided into 3, 4 and 5 letter words. Student E showed positive movement of 12% for 3 letter words, plus 30% for 4 letter words and plus 28% for 5 letter words. Student E showed the most movement for the 4 letter words and least movement for the 3 letter words. Student Es overall movement was 26%.

State the learning trends for individual students:

A comparison of student movement in all 3 tests, text level, clay word reading and the rime units, simply indicates that all students showed positive movement in the post tests, except Student D who showed no movement in the clay word reading. These results support the hypothesis.

State difference between students:

The participants showed similar results in that they all showed positive movement in all the tests. The students differed in which test they showed more improvement in, yet still showed movement. The students observable reading behaviour gives a better understanding of the gains made by the students. In the classroom Student A is showing the biggest sign regarding an increased confidence to reading. He is more willing to read out loud and has begun to demonstrate his confidence by raising his hand and asking questions.

DISCUSSION:

Discuss and summarise the extent of support for your prediction:

The data shows a link between students A and B and shows that they made similar movements. They showed movement of 1 and 2 for text level (refer to figure 1), 3 words and 1 word for clay word reading (refer to figure 3) and 25 words and 24 words for the rime units test (refer to figure 5). A possible reason for this outcome could be due to the learning styles of these students. In class they have continually been placed into the same reading groups and their observable reading behaviour suggests they are comparatively similar students.

A breakdown of the clay word reading test shows that none of the students read 'father' in either the pre or post test. A possible reason for this could be due the way the students segmented the word, for example fa/th/er or f/at/her. The students showed knowledge of segmenting but could not use the strategy correctly by blending the words back together.

Furthermore, none of the student read 'school' in the pre test and students C and D demonstrated knowledge of segmenting when attempting the post test with a response of s/ch/oo/l, although neither student blended the word to 'school' Student E was the only student to read 'school' correctly in the post test.

Another link the data shows similar movement between students D and E. They both showed movement of 5 for text level (see figure 1) and 52 words and 39 words for the rime units test (see figure 5). It would appear that a bigger movement in word and rime units equates to a bigger movement in text level.

Following on with the similarities between students D and E, they were the only students to correctly read 'for' and 'they' in the clay word reading pre test. These words are also on the take home word reading lists, and further analysis of these students shows they have both recently passed the word list.

They were also the only students to correctly read 'please' in the post test. When prompted "*how did you know that word?*" They separately answered "*because it was on the (take home) word list*". This analysis might suggest that the positive movement on the clay

word reading test may not be due to the current study, but rather it could be due to the regular classroom teaching and learning.

Although showing no movement for the rime units 3 letter words, Student D made the most movement for 4 and 5 letter words (refer to table 8). This may be due to the already high score (22/24) for the 3 letter words. Student D also showed the most overall movement of 35% for the rime units test (refer to table 8). Student D also showed no movement for the clay word reading (refer to figure 3) yet showed movement of plus 5 for text level (refer to figure 1). The student was not able to increase the post test scores for the clay reading, but was for the rime units test, both individual word reading tests.

It is interesting to note that for the rime units 3 letter words, all students showed no or the least amount of movement (refer to table 3). Students B, C and D showed no movement, while Students A and E showed the least movement for 3 letter words compared to the 4 and 5 letter words.

Further analysis of the rime units test showed none of the students in either the pre or post test pronounced the /ail words correctly. A possible reason for this might be due to the pronunciation of the vowel 'a' sound.

The data shows another interesting link regarding 'sneaky e' rimes. When pronouncing the /ake, /ate, /ame, /ice, /ide, /ine, /ore, /oke and /ale rimes, all the students demonstrated difficulties with pronunciation. After analysis the groups observable reading behaviour, it is interesting to note that the group pronounced the words in two different ways. Either with the sound of the vowel and the e, for example cáké. Or the sound of the vowel and no e, for example cák.

It is also interesting to note that none of the students in either the pre or post test pronounced the /ice words correctly. Further analysis of the groups observable reading behaviour outlines two different ways the group pronounced the words. Either with the c making the s sound, for example ris (rice) and mis (mice). Or with the sound of the vowel i, for example slic (slice) and pric (price).

These results show the group demonstrated knowledge of 'sneaky e' which has previously been taught in class, but did not demonstrate the correct ability to use the skill.

The students dropped the 'e' sound but did not change the vowel from the sound to the name.

Discuss any results that do not fit predicted trends:

The data shows that Student D showed no movement for the clay word reading test (refer to figure 17). This is the only score from all the students and all 3 tests where the result showed no positive movement. The errors Student D made include the word 'father', which none of the students read correctly. Plus 'school', which was segmented out into s/ch/oo/l, but not blended back correctly. Also 'ready' was pronounced 'rádie', 'boys' was read as 'body'. The word 'they' proved to be an anomaly, being read correctly in the pre test, yet misread in the post test as 'there'.

Discuss how the findings match/fit with others:

Earlier research supports the Hypothesis that by explicitly teaching blending and segmenting skills to ESL Prep students it will improve their word reading accuracy.

The students from the current study have explicitly been taught the strategy of segmenting and blending words. Via direct teaching and practice, the students have begun to form a deeper phonological understanding of the sound patterns in words. Although for the students to become advanced, efficient readers, they will need to be supported in their practice of sound manipulation. Lane et. al (2002) proposes that struggling readers demonstrate a lack of understanding, really, a lack of ability to use their phonological knowledge for effective word reading. For the students in the current intervention, Pullen et. al (2005) suggests, students need "repeated opportunities" (p. 64) for further development to practice their new skills, strategies and abilities.

The students in the current study began to demonstrate knowledge of blending and segmenting, through the way they pronounced the words when reading the prose and completing the tests. Some students demonstrated their knowledge via their actions, for example, the way they moved their mouth when reading and where they paused in the word, showing that they were beginning to manipulate the smallest chunks of speech (Yopp & Yopp, 2000).

The students began to understand sound patterns and that they need to manipulate sound patterns so that they can successfully read words. Blending sounds is a vital skill of

decoding words and Manyak (2008) indicates that understanding the sound patterns allows the students to blend letter sounds while decoding words.

Observations of reading behaviour showed that Student B, when completing the post rime units test, did not use the strategy of segmenting and blending. Rather, the student sounded out each sound when attempting to read the words. To assist Student B along the developmental pathway of phonological awareness, knowledge and skill (Walsh, 2009) the student will need further scaffolding and practice of the strategy of segmenting and blending.

As Compton-Lilly (2008) suggests, the students 'ways of being', their self efficacy did seem to increase. Although no formal test was given to calculate self efficacy scores, the teacher observed improvement in the students reading behaviour. Student A demonstrated a big increase in his reading behaviour, in the post test and furthermore, everyday in the classroom. Before the intervention he commented "*I cant read... its too hard*". After focused teaching and learning, Student A now comments "*reading this is easy*" and the student demonstrates a willingness to have a go and try to read unknown words.

Discuss any implications for teaching practice suggested by the study:

Due to the current studies reliance on the rime units test, the high amount of 'sneaky e' words in the test may have hindered the students test scores. Although the theory of 'sneaky e' had previously been taught, the learning and practice did not take place as previously thought. This lack of effective learning became apparent after the post test results were analysed and compared.

The students in the current study all began to demonstrate knowledge of segmenting and blending words. They also began to use the strategy in their reading. The teacher needed to use prompts and give reminders to the students to blend the sounds. The study could have allowed for more practice time, thus giving the student ample opportunity to consolidate and become confident with their new skill. For the rest of the school year the students in the current study, along with the rest of the class will continue to receive direct teaching in the phonological area of segmenting and blending sounds.

Discuss possible directions for future research that are suggested by the results:

Based on the participants and results of the current study, future research could include a study with more male participants. Due to the tests given in class to determine the participants, the study only included one male. Future studies could include an all male study or a study with 50% males and 50% females. Changing the male / female ratio could influence the results to show the same or more positive movement or the test results could change and show negative movement.

Another possible direction for future research could include a study tailored for ESL students. This study took place in an ESL setting, thus the teacher conducted the study accordingly. Although, teaching more beginning blends and ending first or during the lessons may influence the results to show more positive movement. ESL students who are struggling readers often struggle with individual sounds and their manipulation. Pre study teaching could include dependable rime units to assist with the strategy of blending and segmenting.

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APPENDICIES:

Appendix 1) Teacher Made Record Sheet - observable reading behaviour. Sample.
Student ____

Is the student showing signs of:

- segmenting when reading?
- blending when reading?
- remembering new words?

Does the student:

- attempt to segment or blend? or still sound out one letter at a time?
- show signs of segmenting or blending when attempting new words?
- comment while reading new words? about segmenting or blending?

Can the student:

- demonstrate the skill of segmenting?
- demonstrate the skill of blending?
- Explain what to do to blend or segment when reading?

Notes:

Appendix 2) Teacher Made Record Sheet - lessons. Sample.

Lesson 1: Text:

Focus words:

Student attempts and reading behaviour:

Student A

Student B

Student C

Student D

Student E

Thought and comments on blending, segmenting and reading:

Student A

Student B

Student C

Student D

Student E

Appendix 3) 10 Lessons.

Lesson one: 20 minutes **Text:** Clifford the big red dog: Hello Clifford.

Explicitly tell the students they are going to learn something new that will help them to read new words.

ENGAGE: Tune in: get the students ready to read: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the difficult/new words. Use these difficult/new words as the focus words for lesson one and two.

LESSON FORMAT:

- Write the new words on a piece of sentence strip and cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use rainbow writing to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Students re read own writing.
- Re read the pages focusing on reading the new words in prose.

Reflect on the lesson: Explicitly tell them they have learnt how to segment words, making them easier to read. Have the students re read the page and share what they have learnt.

Lesson two: 15 Minutes **Text:** Follow on: use the same text and words.

ENGAGE: Tune in: get the students ready to read: Review the previous lesson and discuss what the students remember about segmenting and blending. Focus: where to segment the word for easier reading.

LESSON FORMAT:

- Use the previous lessons word cards. Explain that by blending the sounds in unknown words, it makes them easier to read.
- Visually demonstrate the segmenting to the students.

- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the text focusing on reading the new words in prose.
- Use Playdoh to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the sentences in prose.

Reflect on the lesson: Explicitly tell them they have learnt how to segment words, making them easier to read. Have the students share what they have learnt.

Lesson three: 20 minutes **Text:** Clifford the big red dog: Who hid it?

ENGAGE: Tune in: get the students ready to read: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the difficult/new words. Use these difficult/new words as the focus words for lesson three and four.

LESSON FORMAT:

- Write the new words on a piece of sentence strip and cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use sand / rice to form the letters in the new words. Use sand to show the first segment and rice to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the text focusing on reading the new words in prose.

Reflect on the lesson: Explicitly tell them they have learnt how to segment words, making them easier to read. Have the students share what they have practiced.

Lesson four: 15 Minutes **Text:** Follow on: use the same text and words.

ENGAGE: Tune in: get the students ready to read: Review the previous lesson and discuss what the students remember about segmenting and blending. Focus: where to segment the word for easier reading.

LESSON FORMAT:

- Use the previous lessons word cards. Discuss that by blending the sounds in unknown words, it makes them easier to read.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use rainbow writing to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the sentences in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson five: 20 minutes **Text:** Clifford the big red dog: T-Bone on Top.

ENGAGE: Tune in: get the students ready to read: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the difficult/new words. Use these difficult/new words as the focus words for lesson five and six.

LESSON FORMAT:

- Ask the students where they think they should segment the focus words. Discuss possible segmenting places in the focus words.
- Have the students write the new words on a piece of sentence strip and ask them to cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.

- Re read the pages focusing on reading the new words in prose.
- Use playdoh to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the pages focusing on reading the new words in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson six: 20 Minutes **Text:** Follow on: use the same text and words.

ENGAGE: Tune in: get the students ready to read: Review the previous lesson and discuss what the students remember about segmenting and blending. Focus: where to segment the word for easier reading.

LESSON FORMAT:

- Use the previous lessons word cards. Are the students finding it easier to read new words when they blend? Discuss together.
- Visually demonstrate the segmenting to the students.
- Blend and Re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use Playdoh to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the sentences in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson seven: 20 minutes **Text:** Clifford the big red dog: Happy Birthday, Clifford!

ENGAGE: Tune in: get the students ready to read: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the

difficult/new words. Use these difficult/new words as the focus words for lesson seven and eight.

LESSON FORMAT:

- Ask the students where they think they should segment the focus words. Discuss possible segmenting places in words.
- Have the students write the new words on a piece of sentence strip and ask them to cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use sand / rice to form the letters in the new words. Use sand to show the first segment and rice to show the second segment.
- Students re read own writing. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the pages focusing on reading the new words in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson eight: 20 Minutes **Text:** Follow on: use the same text and words.

ENGAGE: Tune in: get the students ready to read: Review the previous lesson and discuss what the students remember about segmenting and blending. Focus: where to segment the word for easier reading.

LESSON FORMAT:

- Use the previous lessons word cards Ask the students where they think they should segment the focus words. Discuss possible segmenting places in words.
- Have the students write the new words on a piece of sentence strip and ask them to cut into appropriate segments.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.

- Use rainbow writing to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the sentences in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson nine: 20 minutes **Text:** Clifford the big red dog: I See My Dad.

ENGAGE: Tune in: get the students ready to read: Orientate the students to the text, looking the title and the front cover to predict what might happen and what the text might be about. Assist the students to read the text, word by word, taking note of the difficult/new words. Use these difficult/new words as the focus words for lesson nine and ten.

LESSON FORMAT:

- Ask the students where they think they should segment the focus words. Discuss possible segmenting places in words.
- Have the students write the new words on a piece of sentence strip and ask them to cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use sand / rice to form the letters in the new words. Use sand to show the first segment and rice to show the second segment.
- Students re read own writing. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the pages focusing on reading the new words in prose.

Reflect on the lesson: Discuss how they are blending and segmenting sounds. Have the students share what they have learnt.

Lesson ten: 20 Minutes **Text:** Follow on: use the same text and words.

ENGAGE: Tune in: get the students ready to read: Review the previous lesson and discuss what the students remember about segmenting and blending. Focus: where to segment the word for easier reading.

LESSON FORMAT:

- Use the previous lessons word cards. Ask the students where they think they should segment the focus words. Discuss possible segmenting places in words.
- Have the students write the new words on a piece of sentence strip and ask them to cut into appropriate segments.
- Visually demonstrate the segmenting to the students.
- Blend and re read the individual words.
- Segment the words again and blend back together to read.
- Re read the pages focusing on reading the new words in prose.
- Use Playdoh to form the letters in the new words. Use one colour to show the first segment and another colour to show the second segment.
- Re read the individual words. **Depending on time, have the students make all of the new words or each student make a different one.
- Re read the sentences in prose.

Reflect on the lesson: Explicitly tell them they have learnt how to segment words, making them easier to read. Have the students re read the page and share what they have learnt.