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# Effectiveness of Sub-Lexic Instruction in Enhancing of Reading Ability: Analysis of Age Differences among Learners in Mpumalanga

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***Abstract***

*This study examined the influence of age on the effectiveness of the sub-lexical reinforcement technique in enhancing reading abilities among grade three learners with dyslexia (LWD) in two public primary schools in Mpumalanga, South Africa. The Skinner's reinforcement theory was employed. A quasi-experimental design with one control group and one experimental group was used. A sample size of 43 learners was obtained in two selected schools using purposive sampling technique. 23 parents participated in the questionnaires while only 6 parents were interviewed in the qualitative survey. The tools used were the Bangor Dyslexia Test, pre- and post- tests, and a reading comprehension test. The results revealed that there were mixed findings and exploring reading alone as a component of reading ability, the improvement score of older learners (M=56.9; SD=12.3) was significantly higher than that of younger learners (M=21.9; SD=9.9), t (21) = 7.383, p = .000 < 0.001. The study recommends that foundation phase teachers should begin teaching reading using grapheme-phoneme correspondence and that all Foundation phase level teachers should be trained on how to use sub-lexical instruction to learners.*

***Keywords****: Sub-Lexical Instruction, Reading Ability, Learners, Age, Dyslexia, Primary Schools.*

## Introduction

Research from previous writers indicates that the sub-lexic reinforcement technique has been used in the school set-up but mostly for learners between 5 and 15 years. When using sub-lexic reinforcement technique, grapheme –phoneme version is used, and the implication is that the sub-lexical approach surpasses the lexical system. Lopes and Barrera

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(2019) define sub-lexic technique as the syllabic highlight technique. Furthermore, Lopes and Barrera (2019, p.2) postulate that: 'Learning to read in alphabetic systems is based on the understanding that writing represents the sounds of speech and that for one to be able to read, it is necessary to relate the orthographic patterns of the written words to the phonological and semantic representations associated with them.'

An emergent reader in danger of difficulty reading finds it hard to recognize that the language expressed in speech like "fat", is made up of three separate units of sound (f/a/t) and therefore finds it more challenging than his peers to portray those units of sound onto the written symbol that represents a sound, 'f', 'a' and 't respectively (Wright, et al., 2011). Wright et al., (2011) concurs with Muller, et al., (2020) who maintain that transition from letter-by-letter phonological recoding requires one to learn how to spell words from sounds, for example 'str- ee- t' for street. Instead of the child relying on an adult or on picture-word matching, as held by Wright et al., (2011), grade three teachers of LWD must, therefore, try sub-lexic reinforcement/ syllable highlight technique/phonological awareness/ synthetic phonics, for them to be on top of the situation (being able to teach LWD successfully). In South Africa, Leseyane, et al.'s (2018) study reported that there are several difficult situations faced by LWD in mainstream schools and therefore recommended training of teachers so that they do not seek help from outside on how to teach reading. In terms of the inclusive policy, the article by the same author which explored what LWD experience in mainstream schools, no solution has yet been found to assist LWD. It is of concern to bear in mind that Leseyane et al., (2018) believe that the establishment of diverse, equity and inclusion policy in South Africa, several groups, including children with disorders remain vulnerable. The same authors echo that most learners who have learning conditions or physical disabilities are stigmatized, labeled, and excluded by their peers as well as in the school.

Therefore, the current research sought to add to literature by focusing on the influences of age on the effectiveness of sub-lexic reinforcement techniques on enhancing the ability to decode written letters and words into their associated phonetic code among grade three learners with learning difficulties that affect skills involved in accurate and fluent word reading and spelling in two public primary schools in Bohlabela District, Mpumalanga Province, South Africa.

**Theoretical Framework**

This study was guided by the Skinner's Operant Conditioning Theory and the Information Processing Theory (IPT). The Operant conditioning theory was advanced by BF Skinner and the key element in it is reinforcement (Rafi, et al., 2020). Overskeid (2018) reiterates that reinforcer, then, is at the same time a behaviour, and again something that cannot be said to exist outside of behaviour. In the present study, grade three LWD who were able to read a stipulated number of words, were allowed to choose any short- story books of their choice from the library and take them home to read for a week. Gentilin and Greer (2021) assert that children who read in their leisure time perform better on measures of reading achievement when controlling for cognitive abilities, with reading amount outside of school as the best predictor of reading achievement in elementary school. When Skinner

applied operant conditioning to school learning and discipline (Schunk 2012), the learners were required to make a response for every frame and receive immediate feedback. In this case, positive behaviour would reoccur since intermittent reinforcement is particularly effective. Reinforcement is responsible for response strengthening- increasing the rate of responding or making responses more likely to occur (Schunk 2012). Skinner believed that a desirable learning outcome is possible if we can change the learner's behaviour. Based on this argument, reinforcement can be positive or negative, but both types aim to strengthen behaviour. According to Schunk (2012), positive reinforcement refers to the process of adding a pleasant stimulus to strengthen behaviour and increase the likelihood of it occurring again. Reinforcers are situationally specific because they apply to individuals at given times under given conditions (Skinner, 1957; Critchfield & Miller (2017). Skinner (1953) further highlighted that stimuli or events that reinforce behaviour can, to some extent, be predicted. Positive reinforcement involves presenting a stimulus, or adding something to a situation, following a response, which increases the future likelihood of that response occurring in that situation. To apply Skinner's reinforcement theory in the classroom, the researcher created a system of positive incentives for individual, group and class behaviour as well as ensure that positive reinforcement is immediate so that it can be associated with positive behaviour.

**Literature Review**

When it comes to narrowing the reading success gap, studies with younger children typically report more encouraging results than those with older readers (Metsala & David 2017). According to Vlachos and Papadimitriou's (2015) study, which found a substantial age effect on reading performance, it was discovered that in terms of all components of reading, older participants performed better than younger ones. Vlachos & Papadimitriou (2015) further point out that it was important to train learners in reading starting from 3 years and above through to higher learning. Therefore, Vlachos and Papadimitriou (2015) advise teachers to place a high priority on reading instruction during the first school years to prevent reading difficulties in later academic years as well as possible performance differences caused by age. In keeping with the previously reviewed study, the current study implemented the recommendation to give reading instruction special priority, especially for the grade three participants in the study.

The youngest group of participants in Metsala and David's (2017) study performed better on tests of word and words that have no meaning. As a result, different components of reading across the board improved significantly and meaningfully. Beyond pre-intervention fluency scores, participants' mastery of accelerated, sub-lexical sound-spelling reading provided variation to fluency outcomes. Rashotte, et al. (2001) looked at students in a program for group reading instruction and found that age-related impacts on reading outcomes are not always obvious when direct age comparisons are performed. The study recruited all the participants in a consistent manner and compared the results on reading and direct and systematic instruction in core learning areas, such as reading, writing, math, and social emotional behaviour (Spell-Read-PAT) across grades 1-6. After 31–35 hours of teaching, all students made considerable gains, although for accuracy, fluency, and comprehension, main and interaction that may arise when considering the relationship among three or more

variables of grade were mostly absent. Rashotte et al.'s (2001) study included students in grades one through six, but no students with dyslexia were among the participants. As a result, the present study would reduce the difference between two people or things in the literature by concentrating on LWD.

O'Brien, et al. (2011), in the USA, showed age-related effects on this set of children's sub-lexical orthographic recognition efficiency. Additionally, the findings indicated that first graders performed less quickly than second and third graders on the orthographic recognition search task and with less accuracy than third graders in correctly recognizing all the search targets. The evaluated study featured therapies with first graders, but those learners did not have dyslexia. In contrast, the current study involved LWD, so it would close this gap in the body of research. In the USA, Clark, et al. (2015) conducted a study to see if there are any age differences on a stimulus provided by comparison in time or space, of individual elements that involved associative learning and motor learning. The study revealed that older adults showed lower performance compared to young people spanning from ages 18 to 26. The present study, in contrast, focused on young LWD in grade three who were between the ages of 8 and 9. Additionally, Speece, et al.'s (2011) study in America concentrated on evaluation with the aim of creating a set of tests grouped together and administered to learners in grade one in danger for reading difficulties. While some writings emphasize that younger learners pick up language more quickly than older ones do, other writings hold the divergent belief that even older learners pick up language just as quickly as younger ones do. For instance, a 2019 study by Ozfidan and Burlbaw in Saudi Arabia found that younger learners are more successful than older learners, that their language-learning processes are less demanding and require less work, and that they are more adept at learning languages. Furthermore, Alfian's (2020) research in Indonesia discovered that age is one of the most crucial variables, with one of the suggestions being that acquirers who started their natural exposure to a second language as children typically obtained higher second language proficiency than those who started as adults.

Double, et al.'s (2019) study in England found that there has been a lot of speculation about how phonics education affects the development of early reading. According to the research by Double et al. (2019), there is factual detail to support the claims that early matching of sounds spoken English with individual letters or groups of letters done efficiently to foster reading development and that early phonemic awareness has only weak associations with later literacy. The ability to change suddenly or completely, activities or stimulus sets quickly is a key component of a mental quality that consists of the abilities to learn from experience, and it is associated to learners' academic success, cognitive ability, and creativity development (Feng et al., 2020). In contrast, Kupis et al. (2021) found that older people and children were more likely than younger adults to have brain dynamic patterns linked to lower cognitive flexibility. Another study in the USA by Wilson, et al. (2017) found that although younger adults performed better overall, both adults 18 years and above persons showed flexibility by minimizing the influence of systematic differences between reported and unreported data. Another study conducted in Saudi Arabia by Alsubaei (2022) reported direct and indirect influences on early literacy learning environments at home, as well as difficulties

in setting up such environments. Both Strauss and Bipath's (2021) and Alsubaei's (2022) investigations show that young learners have growing interest in reading or emerging literacy.

Crucial foundational literacy ability for young learners is letter-sound correspondence since it will support the development of talking, reading books, singing songs, playing with rhymes, and drawing in the future. Recognizing letter forms, naming the letters, sounding out the letters, and finally fusing the sounds to form words are fundamental reading skills that must be taught to students for them to become proficient and quick readers (Azuddin et al., 2020). Higuchi, et al. (2021), in Japan also support the idea of teaching young students about letter-sound relationships. The findings imply that well before learning to read letters, children had already started to understand implicit letter-sound correspondences. According to qualitative research conducted in Malaysia by Azuddin et al. (2020), the participants did succeed in recognizing letters and their sounds following the intervention. The current study focused on LWD in grade three, as opposed to Azuddin, et al. (2020), who focused on pre-schoolers. In a different study by Karpovich (2018) in the United States discovered that the treatment group had a slight increase in their mean score, demonstrating the intervention's beneficial effects. In addition, there is evidence of literature on young learners' growing interest in reading or their developing literacy. There is research that is pertinent to the current study regarding how age affects reading readiness. For instance, Ihezie and Akujobi's (2020) study on reading readiness in Nigeria found that indicators of high levels of reading readiness included keen interest, accurate alphabet recitation, decoding and blending, and proper handling, while indicators of low levels of reading readiness included economic factors, the educational and socioeconomic backgrounds of the parents, the knowledge and experience of the parents, a lack of phonemic awareness, and a poor reading culture.

According to a quasi-experimental study by Strauss and Bipath (2021), there is no correlation between print and digital reading behaviours and children's emergent language and literacy development in the home and factors such as age, gender differences in educational outcomes such as achievement, attainment, and experiences within the education system, family size, and employment status. In South Africa, Cekiso, et al.'s study (2022) revealed that several factors, including parents' low levels of education, an unfavourable home environment, their socioeconomic status, and a lack of reading materials at home and at school, had an impact on the reading performance of students from rural areas. The current study focused on grade three LWD rather than the same age developing peers examined in the Cekiso, et al., (2022) study.

According to the idea of reading carefully to find out what the author intends, most research have concentrated on students in traditional classrooms, leaving out the context of those who have dyslexia. By focusing on LWD and instructing them in a resource room, the current study filled in gaps in the body of literature by comparing existing literature to bring out their strengths and weaknesses. Therefore, while some of the research analysed involved students older than 10 years, the current study investigated LWD in grade three (8–9 years) to bring out the perspective of those still in the period of development known as concrete operations.

## The Present Study

This study examined the effects of age on effectiveness of sub-lexic reinforcement technique on enhancing reading abilities among LWD in primary schools.

## Research Hypothesis

The following null hypothesis was tested:

*There is no significant effect of age on effectiveness of sub-lexic on enhancing reading ability among LWD in primary schools.*

## Methods

### *Research Design*

The study adopted the quasi-experimental research design which includes a wide range of non-randomized or partially randomized pre-post intervention studies (Handley, et al., 2018). Iwahori, et al., (2022) suggests that quasi-experimental methods that involve the creation of a comparison group are most often used when it is not possible to randomise individuals or groups to intervention and control groups. de Vocht, et al., (2021) concurs that quasi-experimental research designs are less susceptible to bias than other observational study designs. In the current research, a quasi- experimental design with one control group and one experimental group was used because it was difficult to conduct a randomised controlled trial (RCT) due to lack of consent from principals, both from the control and from the experimental school.

### *Research Participants*

In this study, the quantitative sample was 43 grade three learners from the two public primary schools (23 LWD in the intervention and 20 LWD in the control group), from Ximhungwe and a from Mkhuhlu Circuits, respectively, in Bohlabela district, Mpumalanga province. Both schools are situated in Bushbuckridge Municipality. The intervention school is situated in Cork village, not far from Mkhuhlu Plaza and along the Kruger National Park Highway, while the control school is situated in Huntington village, some thirty minutes' drive from Kruger National Park main gate and along the turn-off from Elephant Point (on the Kruger National Park wwwww1asZxrrt c4 highway), about ten minutes' drive (from Elephant Point). The learners were obtained using purposive sampling method, a method 'used to select respondents that are most likely to yield appropriate and useful information' and is a way of identifying and selecting cases that use limited research resources effectively (Campbell, et al., 2020). The sampling technique selected and employed by the researcher in the present study was relevant for the study because it clearly situated both the quantitative and qualitative results in terms of trustworthiness for data collection and analysis.

### *Research Instruments*

In the present study, pre-testing was administered using the Bangor Dyslexia Test (BDT) and a short reading comprehension test. First, internal validity was ascertained by presenting the research proposal and tools to academic staff and fellow students at the Wits School of Education. The feedback that was obtained during these presentation sessions was incorporated into the research tools, and this ensured that they were valid. On the other hand,

Tabachnick and Fidell (2001) hold that Bartlett's Sphericity test statistic should be less than 0.05 for an adequate internal validity. From the table, Bartlett's test for Sphericity is significant ($p<0.001$, $p=0.000$) and Kaiser-Meyer-Olkin indexes are all > 0.6 for all the subscales of the questionnaire. The Cronbach's alpha value of 0.833 was reported. The Cronbach's alpha for all the subscales reveal that the instruments had adequate reliability for the study. This is in line with the recommendation by Oso and Onen (2009) that a coefficient of at least 0.60 is of adequate reliability, implying that the instrument has acceptable inter-item consistency reliability standard.

***Procedure***

Ethical clearance was first obtained from the University of the Witwatersrand Human Research Ethics Committee. Thereafter, permission to carry out the research was obtained from Mpumalanga Department of Education and the school principals. The BDT or battery was administered to all grade three learners (275 learners) from both the control and the experimental schools, where finally a total of 43 learners (23 learners for the intervention school and 20 learners for the control school) were randomly selected but taking into consideration how many wrong answers one got. It had 19 items, and the rule was that a grade three learner who attained seven or more wrong answers was dyslexic. After the pre-test, LWD from the intervention school received intervention lessons on mnemonic reinforcement techniques for one hour per day, five times a week for 6 months while those from the control school continued receiving their usual reading lessons without any intervention. Post-tests were administered to the LWD both at the control and at the intervention school after 6 months.

**Data Analysis**

Quantitative data was analyzed using both descriptive and inferential statistics. Descriptive statistics were used to describe the views of the respondents on each sub-scale, while the inferential statistics aided to make inferences. Statistical tests and t-test analysis were used to investigate the differences between the variables, given gender and age. All tests of significance were computed at $\alpha = 0.05$. The Statistical Package for Social Sciences (SPSS) version 26.0 was used to analyze the data.

**Results**

The study sought to investigate the demographic characteristics of the learners and parents who took part in the study. The background information was considered necessary in determining whether they were adequately representative in terms of their demographic characteristics to allow generalization of the results of the study. The demographic information of the considered included respondents' gender and age.

**Findings**

This study sought to establish the influence of age on effectiveness of the sub-lexical instruction reinforcement in enhancing of reading ability among the grade three learners with dyslexia. Twenty-three learners with dyslexia in the intervention group were divided into two age subgroups (the younger, below 9 years and the older, 9 years and above). Hence, the

study investigated whether there was a significant difference in reading, comprehension and overall reading ability scores for younger and older learners who received sub-lexical instruction reinforcement.

The null hypothesis that, "*there is no statistically significant age influence on effectiveness of the sub-lexical instruction reinforcement on enhancing of reading ability among the grade three learners with dyslexia*" was tested. An independent-samples t-test was used to compare the mean score in reading, comprehension and overall reading ability between younger and older learners who were taken through sub-lexical interventions. Effectiveness of sub-lexical instruction reinforcement was conceived as the rise in reading, comprehension and overall reading ability scores acquired after receiving mnemonic treatment. Table 1 gives the summary of findings on effectiveness of the mnemonic instruction reinforcement in enhancing of reading, comprehension and overall reading ability among the grade three learners with dyslexia given age.

Table 1: Age differences on effectiveness of sub-lexical interventions

| | Age | N | Mean | Std. Deviation | Df | t | p-value | Effect size |
|---|---|---|---|---|---|---|---|---|
| Reading | Younger | 15 | 21.9 | 9.98 | 21 | 7.383 | .000 | 0.722 |
| | Older | 8 | 56.9 | 12.30 | | | | |
| Comprehension | Younger | 15 | 3.3 | 1.09 | 21 | .561 | .581 | 0.014 |
| | Older | 8 | 3.5 | 0.53 | | | | |
| Overall Reading Skills | Younger | 15 | 25.2 | 10.46 | 21 | 7.223 | .000 | 0.713 |
| | Older | 8 | 60.4 | 12.34 | | | | |

Key: Younger – Below 9 Years; Older-9 Years and Above

The results in Table 1 reveal that, after receiving sub-lexical interventions, older learners largely had comparatively higher improvement in performance in overall reading ability and its component (reading and comprehension), than the younger learners. For instance, while learners aged 9 years and above improved by a mean of 60.4 with a standard deviation of 12.3 in overall reading ability scores after going through sub-lexical intervention, learners aged below 9 years only improved by mean of 25.2 (SD=10.5) in overall reading ability after receiving the same treatment.

Likewise, when the reading ability was disintegrated into individual components (reading and comprehension) older learners had higher improvement scores than their younger counterparts in each component. For example, in reading, older learners had an improvement mean of 56.9 (SD=12.3) while younger learners only improved by a mean of 21.9 (SD=9.9). Similarly, while older learners had a mean improvement of 3.5 with a standard deviation of 0.53 in comprehension, after being taken through the sub-lexical intervention, their younger counterparts recorded an improvement of 3.3 (SD=1.1) only upon receipt of the same treatment.

However, the study sought to establish whether the means in scores between the age groups are statistically different. This was done by use of independent samples t-test under the hypothesis that there is no significant difference in age on effectiveness of the sub-lexical instruction reinforcement on enhancing of reading ability and its components among the grade three learners with dyslexia. In this regard, the finding of the study indicates that when the two components of reading ability were disintegrated, there were mixed findings. Exploring reading alone as a component of reading ability, the improvement score of older learners (*M*=56.9; *SD*=12.3) was significantly higher than that of younger learners (*M*=21.9; *SD*=9.9), $t$ (21) = 7.383, $p$ = .000 < 0.001. The magnitude of the differences in the means very large (eta squared=.722), representing a very large difference in means given age, signifies existence of a significant effect of age on reading performance. This means that there is statistically significant difference in reading scores between younger and older children among grade three learners with dyslexia who received sub-lexical treatment, with older learners having higher scores than younger learners. This means that sub-lexical instruction reinforcement more effectively enhances reading in older children than in younger children among the grade three learners with dyslexia.

On the contrary, there was no significant difference in the comprehension scores for younger learners (*M*= 3.3, *SD*= 1.1) and older learners (*M*=3.5; *SD*=0.53); $t$ (21) = .561, $p$ = .581. This result was further corroborated by a very low magnitude of the differences in the means as signified by eta squared of .014. This result suggests that age have no significant effect on the use of sub-lexical intervention in enhancing of comprehension ability among the grade three learners with dyslexia. This finding reveals that although there is difference in degree of influence of sub-lexical intervention in enhancing comprehension between older (9 years and above) and younger (below 9 years) learners, the difference was not statistically significant. This means that influence of sub-lexical instruction on enhancing comprehension among learners with dyslexia in grade three is almost the same between the two age groups.

On the other hand, with regard to improvement in overall reading ability, the results of the study indicate that there was statistically significant difference between younger and older improvement in overall reading scores. The overall reading ability scores of older dyslexic learners (M = 60.4, SD = 12.3) who received the sub-lexical instruction compared to scores of the younger learners (M = 25.2; SD = 10.5) who received similar treatment indicate that older learners had significantly higher scores than younger learners in overall reading ability, t (21) = 7.223, p = .000 < .001. The magnitude of the differences in the means was quite large (eta squared=.703), representing a considerable of difference in means given age. This suggests that there is a statistically significant difference in overall reading ability between younger and older learners who received the intervention, implying that age of a learner influences effectiveness of the sub-lexical instruction in enhancing overall reading ability among the grade three learners with dyslexia. Subsequently, the null hypothesis was therefore rejected, and it was concluded that there is significant age influence on effectiveness of the sub-lexical instruction on enhancing of overall reading ability among the grade three learners with dyslexia. The result has shown that when learners with dyslexia are taken through sub-lexical, older learners' overall reading ability improves more than their younger counterparts.

Overall, age was found to influence effectiveness of the sub-lexical instruction reinforcement on enhancing of reading alone and overall reading ability but not comprehension among the grade three learners with dyslexia. Sub-lexical instruction is more effective in influencing enhancement of reading alone and overall reading ability in older learners with dyslexia than their younger counterparts.

**Discussion**

The quantitative findings revealed that after receiving sub-lexical interventions, older (9 years and above) grade three LWD largely had comparatively higher improvement in performance in overall reading ability, in reading and in comprehension, than the younger 8 to 9 years) learners and that sub-lexical instruction more effectively enhances reading in older children than in younger children among the grade three LWD. This suggests that age influences on the effectiveness of the sub-lexic techniques on the enhancement of reading abilities of grade three LWD is dependent on maturity of a learner, with those who are 9 years and above having comparatively higher improvement in performance than those who are below 9 years. In agreement, O'Brien, et al., (2011) study indicated that orthographic recognition performance for first graders was slower compared to second graders and that for second graders was slower than that of third graders. This research also supports previous findings that studies with younger learners report more positive outcomes in terms of closing the reading-achievement gap than do studies with older readers (Metsala & David 2017), that language learning processes of younger learners are less stressful, that younger learners are more skilful in language learning and that younger learners have increasing interest or emergent literacy in reading (Clark,et al, 2015; Metsala & David, 2017; Ozfidan & Burlbaw, 2019; Alfian, 2020; Azudin,et al, 2020; Alsubaei, 2022) (Rashotte, et al, 2001; Vlachos and Papadimitriou, 2015). In addition, Higuchi,et al, 2021also revealed that they support the notion of introducing letter-sound knowledge to young learners. However, some literature has opposing views that even older learners develop language just as the younger ones, that older children had better scores than younger ones for reading fluency, reading comprehension, the total reading performance (Rashotte, et al, 2001; Vlachos and Papadimitriou, 2015) and that there was no significant relationship between age, gender, education, or family size (Strauss & Bipath 2021). This suggests that language develops not only among the young children but as a child grows into adulthood out of repeated exposure to new words where children form orthographic representations that allow them to read the words faster and more fluently (Alvarez-Canizo, et al., 2018).

The qualitative data further revealed that younger learners have faster language development and have flexible brain compared to older learners or adults. The qualitative results also indicated that generally learners aged 6 to 12 find memory strategies and sounds very helpful and that learners aged 6 to 12 may develop more than one language at the same time compared to older people. This may be due to the elasticity of young people's brains. This study finding is consistent with Eslick, et al., (2020) and Hasenacker and Scroeder (2022) which point out that reading a word requires processing of visual, orthographic, phonological, and semantic information and that phonemic awareness skills should develop during grade R (age 6) and grade 1 (age 7) for language development to be successful. This study finding is

also supported by Odo (2021) who asserted that phonics instruction supports the development of word decoding ability of English learners.

The findings of the study that young learners grasp concepts and develop language faster than their older counterparts supports previous findings that early phonics interventions effectively promote reading development and that phonemic awareness at early ages has moderate correlations with later literacy. This is because reading is one of the most significant language skills that must be mastered by grade three and it is a skill that permits learners to understand the meaning of written and printed material as well as a means of communication and language acquisition, sharing ideas and information (Phala & Hugo 2022). Therefore, since reading is the most important pointer of achievement in life and school, learners must acquire reading proficiency and as such, reading tests must start as soon as children enter formal schooling to enable them to be phonemically aware, understand the alphabetic principle, apply these skills in a rapid and fluent manner, possess strong vocabulary and grammatical skills, and relate reading to their own experiences, to ensure sufficient levels of fluency, automaticity and understanding. The implication of this finding is that first and second years of schooling should be devoted to teaching and testing of reading and, therefore, less tests related to the learners' academic achievement, cognitive ability, and creativity development. Therefore, the DBE should develop a policy that testing of reading starts at grade one from term two, and not to wait until learners are in grade three, where the workload becomes even more.

**Limitations of the Study**

In any study of this nature, it is inevitable to encounter limitations. Below, follows a discussion of the limitation experienced during the data collection of this study. One of the limitations was language barrier since effective communication was limited. The parent participants who took part in interviews as well as those who responded to questionnaires, could not also communicate using English used by the researcher. To curb this limitation, the researcher resorted to using the local language, XiTsonga since she at least was able to use it for communication purposes.

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