Teachers Perceptions of the Challenges Related to Provision of Services for Learners with Specific Learning Difficulties (Dyslexia) in Kuwaiti Government Primary Schools

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Abstract

The main purpose of this study is to investigate the importance of providing support and services for pupils with dyslexia in Kuwait, from the perspective of teachers from government run primary schools. Consequently, it addresses the central research question: 'What are the challenges facing teachers regarding the implementation of early intervention for pupils with specific learning difficulties (SpLD) (dyslexia) in primary schools in Kuwait?'

Data were collected using a mixed-method approach. A total of 471 primary school Arabic language teachers therefore completed a 55-item questionnaire. In-depth interviews and focus groups were also conducted with 26 teachers and 9 supervisors. All the interview and focus group data were thematically analysed, while a software package for the Social Sciences (SPSS) was used to analyse the questionnaire data. This took place in two phases: descriptive analysis and exploratory factor analysis (EFA), which also included principal components analysis (PCA), a data reduction method. One of the significant findings to emerge was that the teachers studied only had limited awareness of dyslexia and required specific training and further education to be able to address this SpLD. Moreover, they were for the most part insufficiently aware of early interventions that could benefit their pupils. During the interviews and focus groups, the teachers acknowledged that they used inappropriate diagnostic approaches; that the curriculum was not designed to meet the needs of pupils with dyslexia, and that policy-makers inadequately funded early intervention programmes. The overall conclusion was that the teachers were disempowered, lacked training and did not have sufficient knowledge of dyslexia, or of how to provide suitable early interventions. The study findings also show that dyslexia is conceptualised differently by teachers in Kuwait, as compared to their counterparts in the West. It concludes by discussing the potential implications of the findings for practice, with recommendations made for future research.

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Acknowledgments

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Declaration

I declare that this thesis is a presentation of original work and I am the sole author. This work has not previously been presented for an award at this, or any other, University. All sources are acknowledged as References.

Dedication

To the memory of my father (1939- 2012),

You were my first teacher; thank you for believing so much in my capabilities.

To you I was always the best.

Daddy, this is for you.

Abdulaziz

Chapter One: Introduction to the Study

1.1 General Introduction

Education is unquestionably the privilege of all children and it is therefore the resolution of all nations to nurture and produce well-educated and intellectually developed citizens. In fact, education has become a strategy on which countries depend to achieve their social development. It is considered to be the backbone for the growth and development of a society (Rabee, 2006) and can be viewed as an indicator of the development or underdevelopment of any state. Moreover, it is an important factor which will shape the success or failure of a country in global competition and in each person's achievements in life. In other words, education has become the means of providing pupils with the appropriate skills and knowledge to help them meet their own needs and fulfil their ambitions (Rabee, 2006).

Educational institutions all over the world are required to cater for the needs of all children who hail from different sections of society and include pupils from different backgrounds, with diverse interests, potential, needs and learning styles. However, there are always children among these who do not achieve as quickly as expected. These children may be labelled lazy and it is perhaps concluded by the respective establishments that it is impossible to teach them. Many of these children have difficulties processing information, or in reading and writing (Krzyżak, 2006). Pupils who belong in this category are considered to have dyslexia, which is one of a range of SpLDs.

Dyslexia impacts at least one in 10 people in the world (Dyslexia International, 2014). It affects an individual's ability to read, write, apply basic numerical concepts, and interpret or process visual information, as well as impacting on their short-term memory (Chivers, 2001). It mostly affects the male population and children with dyslexia may have strengths in other areas, such as social relations or music. Nevertheless, in their academic performance, they may not perform as well as other children their age, despite having the level of ability which may be expected and adequate intelligence (Chivers, 2001). In Kuwait, most cases of dyslexia are only identified after children start failing in their exams.

Another problem often affecting children with dyslexia is anxiety (International Dyslexia Association, 2013), as they may feel they cannot learn as well as their peers. This anxiety is specific not only to academic tasks and performance relating to fear experiences, but also to social situations, as the children show signs of nervousness when interacting

socially. Despite this, their confidence can be built up if an environment conducive to learning is created for them, where they are integrated into a mainstream classroom by teachers who make them feel comfortable and develop their self-esteem (Burden, 2008a; Terras et al., 2009; Glazzard, 2010). However, teachers can only identify learning difficulties and provide early intervention if they have knowledge of the concept of specific learning difficulties (SpLD) (dyslexia), together with an understanding of the importance of early intervention implementation and its impact on pupils' self-concept. Self-concept refers here to the mental image or belief a person with dyslexia may develop about him- or herself.

1.2 Background to the Research

This research investigates the importance of early intervention and its implementation for pupils with dyslexia in primary schools in Kuwait, from the perspective of their teachers. Teachers' perceptions are considered to be important for this research and are expected to provide information on how they view early intervention implementation at school level. It is vital to be aware of teachers' knowledge and understanding of dyslexia, as it will provide a gateway to identifying how early intervention can be implemented within schools.

More specifically, the study is set in Kuwait, where special education policies generally pertain to the necessary academic, social and other general skills for pupils with learning difficulties, which will qualify and enable them to live independently in the future. In addition, these skills can increase their self-confidence and enhance their relationship with the wider society. The term 'SpLD' refers to dyslexia in Kuwait, but in the wider world, it has a much broader meaning and denotes any difficulty an individual may have with particular aspects of learning.

The Ministry of Education in Kuwait is responsible for providing support for slow learners and pupils with SpLD. It has sought to find solutions for learners with dyslexia in mainstream education and to develop plans for better understanding of the learning difficulty and providing intervention. However, until 2010, there was no clear interest shown by policy-makers with respect to pupils with learning difficulties. With the establishment of the Centre for Child Evaluation and Teaching (CCET), efforts began to try and enable children to live with their learning problems, finding ways to help them do so, while integrating them into schools; helping them keep pace with their peers and become self-reliant in the learning process. The respective programmes were aimed at

promoting not only reading and writing skills, but also children's self-respect and self-confidence.

The Kuwait Dyslexia Association has been offering support to children with learning difficulties since 1999, setting up dyslexia-friendly schools in the public sector, in conjunction with the Ministry of Education. The aim of establishing these schools was to provide adequate support for children with dyslexia, to incorporate special methods for teaching children in mainstream classrooms and to provide training and professional development opportunities for teachers, as well as the use of efficient practices. In addition, the International Dyslexia Association in Kuwait which receives substantial support from the Kuwait National Commission for UNESCO, and the British Dyslexia Association has been focusing on providing information resources, support for research, professional development, advocacy and public policy (Thomson, 2010). In spite of the existence of these organisations, early intervention programmes have not yet been implemented with any rigour. This problem is further exacerbated by the lack of trained teachers to provide appropriate intervention for SpLD (UNDP, 2012). Besides, in Kuwait, large class sizes have hampered the effective implementation of intervention strategies (UNDP, 2012).

In this research, education is viewed as a process of communication and human interaction based on two main pillars, the teacher and the learner, who aim to achieve certain outcomes represented in terms of desirable changes in the learner's behaviour at the end of the process (Al-Husari & Al-Enizi, 2003). This achievement is the responsibility of the teacher, in collaboration with the learner and related to the environment in which the teaching and learning take place. Arguably, in relation to teaching pupils with learning difficulties, as part of this responsibility, it is necessary to have teachers with qualifications in special education, who can choose appropriate content, as well as teaching and assessment methods for these pupils. Moreover, it may be necessary to create a special educational environment that provides facilities for teaching and supporting those pupils. However, teacher education programmes have neither prepared teachers to identify children with dyslexia nor teach them. Therefore, teacher training particularly related to early intervention programmes is essential for applying the remedial measures.

1.3 Study Rationale

Dyslexia is a specific learning difficulty which is persistent and affects the ability of pupils to read and spell words. It occurs in all cultures and across a range of abilities and socio-economic backgrounds. Early identification of dyslexic difficulties will benefit those

affected, as appropriate intervention strategies and effective teaching methods can support people with dyslexia to cultivate a positive attitude towards learning and become effective contributors, as well as self-reliant and responsible individuals (Thomson, 2013).

It is particularly important for individuals with dyslexia to receive support in Kuwait, because 2.5% of the population are affected by this disability (UNDP, 2009) as compared to 10% of the people in the UK (British Dyslexia Association, 2016). Research on dyslexia is virtually absent and the only study conduced was in 2002 by the Kuwait Dyslexia Association. The study found that around 6.29% of those affected at primary, intermediary, and secondary schools had developmental dyslexia and were unable to read, spell, or write words properly (Al-ghizzi, 2015). It is therefore crucial that children with dyslexia are identified and recognised, with sufferers consequently being supported. A failure to recognise this disability can lead to low self-esteem, anger, behavioural problems, and other issues in individuals (Macdonald, 2009; Sutherland, 2011; Snowling, 2013). Persons with dyslexia can feel they are of no value and that they will never achieve anything in life, thus exhibiting behaviour such as anger and frustration (Macdonald, 2009; Sutherland, 2011).

There is research to suggest that individuals with reading difficulties are more at risk of low self-concept and depression (Snowling et al., 2007; Burden, 2008b; Terras et al., 2009; Glazzard, 2010). As a result, there is an urgent need to recognise the emotional impact of dyslexia, provide early intervention, and support affected individuals. This then leads to the questions: How are teachers identifying and supporting children affected by SpLD in Kuwaiti schools? To what extent are early intervention programmes for pupils with SpLD (dyslexia) being implemented?

Teachers require special training to deal with learners with dyslexia and implement appropriate intervention strategies (Wadlington & Wadlington, 2005; Rose, 2009a; Thomson, 2010). However, existing research suggests that in Kuwait, teachers lack the necessary training and skills to teach pupils with SpLD (dyslexia). For example, Aladwani and Al-Shaye (2012) examined the challenges facing Kuwaiti teachers when teaching pupils with SpLD (dyslexia), and found that the majority lacked the necessary training, knowledge, and skills to diagnose dyslexia amongst their pupils. Their lack of training and skills is due to the fact that the universities providing teacher training in Kuwait lack appropriate programmes to help special education teachers identify or understand the significance of issues relating to special needs (Alshammari, 2006).

1.4 Assumptions and Predictions of the Study

Prior to data collection and analysis, it was assumed in the present study that teachers in primary schools in Kuwait are not fully aware of SpLD (dyslexia). It was also assumed that teachers would not be familiar with screening children with SpLD, or be able to diagnose it. Moreover, it was thought to be highly unlikely they would understand the definition of dyslexia, or be familiar with any treatment for children with SpLD. Likewise, it was presumed that schools would not be prepared for identifying and diagnosing learners with SpLD, and that supervisors would not have adequate knowledge of the learning difficulty, or experience in providing support through early intervention programmes.

Finally, it was also predicted that dyslexia teachers would not have undertaken adequate preparation programmes prior to teaching pupils with SpLD. Besides the above, it was assumed that teachers would not have received appropriate training nor had sufficient experience to assess children with SpLD; for example in identifying a learner showing signs of a phonological processing problem.

Alternatively, the researcher in this study expected that Kuwait, an oil rich nation and eighth richest nation in the world would have allocated adequate resources for the provision of support for children with dyslexia and set aside reasonable budgets and resources for schools. However, it was also anticipated that the educational programmes and curricula would be out-dated. This was based on the assumption that schools and policy-makers were using a definition of dyslexia based on the medical model or discrepancy, rather than other research-based early intervention procedures, which refer to the use of current best evidence from researchers and practitioners when making decisions to support individuals with dyslexia (Thomson, 2010; Nielsen, et al., 2016). It was envisaged that schools would not be using innovative teaching methods, such as multi-sensory approaches, or teaching Phonological Awareness (PA) for the development of phonological skills.

Conversely, it was predicted that teachers in Kuwait would have the support of other specialist teachers, enabling them to manage their workload and effectively implement early intervention programmes, but that the teaching strategies were teacher-centred.

1.5 Research Objectives

The objectives of this study are:

1. To assess whether teachers and the schools they represent are implementing early intervention programmes for learners with SpLD (dyslexia).
2. To scrutinise the SpLD/dyslexic pupil's self-concept/self-esteem from the teacher's point of view.
3. To assess knowledge of the impact of dyslexia on the self-concept of learners with SpLD (dyslexia) from the teacher's point of view.
4. To examine teachers' perceptions of the impact of early intervention implementation on the self-concept/self-esteem of pupils with SpLD (dyslexia).
5. To gain insights into teachers' experiences and the challenges facing them in the implementation of early intervention programmes for pupils with SpLD (dyslexia).
6. To explore the perspectives of Arabic language teachers, instructors, and the major decision-makers on how to overcome the challenges facing the implementation of early intervention for pupils with SpLD (dyslexia) in primary schools.

1.6 Research Questions

The main research question is as follows: *What are the challenges facing teachers regarding the implementation of early intervention for pupils with SpLD (dyslexia) in primary schools in Kuwait?*

Research sub-questions:

1. What knowledge and understanding do Arabic language teachers in Kuwait currently possess of the concept of SpLD (dyslexia)?

2. What are Arabic language teachers' perceptions of the effect of dyslexia on the self-concept/self-esteem of pupils with a SpLD (dyslexia)?

3. What are Arabic language teachers' perceptions of the impact of early intervention on the self-concept/self-esteem of pupils with SpLD (dyslexia)?

4. What are Arabic language teachers' perspectives with regard to the implementation of early intervention?

5. What are the perspectives of Arabic language teachers and educators of how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

6. What are the strategies adopted by supervisors and decision-makers, as ways of overcoming any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

1.7 Methodology

In order to investigate the challenges facing teachers regarding the implementation of early intervention for pupils with SpLD (dyslexia) in Kuwaiti schools, a mixed-method research design was used; combining qualitative and quantitative research methods. The paradigm adopted was interpretivism. Interpretivists believe that reality is multiple and relative. The interpretivist philosophical position will therefore allow the researcher in this study to employ multiple methods, in order to gain a clearer overview of the difficulties teachers face (Williams, 2007). Therefore, the assumptions of the present researcher are based on constructing reality intersubjectively, either socially or as a result of experience. The researcher's role is to obtain a priori insights into the research context and develop this knowledge with the help of informants.

The rationale for the choice of a mixed-method research design is that it allows the researcher to gain a better understanding of the research topic, by considering the strengths of qualitative and quantitative research, and simultaneously compensating for the weaknesses of the two methods (Johnson & Onwuegbuzie, 2004). A quantitative approach (for example questionnaires) was therefore initially applied, followed by a qualitative approach. In other words, interviews were used to clarify the information acquired from the quantitative study (Koh et al., 2004; Keil et al., 2007). This allowed the reliability of the conclusions made from the quantitative study to be assessed (Bhattacherjee & Premkumar, 2004). Therefore, questionnaires and interviews were used to gather data, which helped achieve the respective research objectives. These two methods were chosen because they supplement each other; the questionnaire enabled the key issues to be identified, namely teachers' awareness and understanding of the self-concept/self-esteem for learners with dyslexia, issues associated with early intervention, and the challenges and obstacles preventing the implementation of early interventions in primary schools. On the other hand, the in-depth, face-to-face interviews were then used to examine these issues

and identify the reasons behind the challenges inhibiting the implementation of early intervention.

The questionnaire was developed after reviewing literature related to the current study (for example, Wadlington & Wadlington, 2005; Fuchs & Fuchs, 2006; Burden, 2008a; Elbeheri et al., 2009; Nevills & Wolfe, 2009; Rose, 2009a; Singleton, 2009; Terras et al. 2009; Glazzard, 2010; Schulte-Körne, 2010; Reid, 2011; Saiegh-Hadded, 2005 & 2011; Stevens, 2012; Snowling, 2013; Duff et al., 2014; Elias, 2014; Kellar-Guenther et al., 2014). The questionnaire applied a four-point Likert scale and included a total of 55 items. This survey was carried out in 40 state schools in Kuwait, distributed over six educational districts. The sample selected included Arabic language teachers in primary schools and consisted of 471 Kuwait teachers. These teachers were approached and selected through school principals. The survey questionnaire was then piloted and validated with 15 teachers and head-teachers selected from schools in Kuwait, and four teachers selected from schools in the UK. Moreover, the scale's validity was measured by a number of experts (five Arabic language teachers and three Arabic language supervisors, as well as a professor specialising in Arabic from the Educational Research Department in Kuwait). This was in order to ascertain the compatibility of the test items with the content, for which the ratio of agreement was high among the abovementioned experts. In validating the questions by piloting the questionnaire, the data were critically studied and minor revisions were made to the instrument. However, the researcher faced a number of difficulties while applying the questionnaire; for instance, delay in obtaining the task facilitation letter from the Educational Research Department of the Ministry of Education; delay in obtaining final approval from the educational districts, and delay in the questionnaires being returned by some schools.

In order to increase reliability, the study was designed with the intention that the same results could be obtained from the same research participants under similar conditions. On the other hand, achieving this consistency is not easy in practice. Attempts were made to avoid the formulation and inclusion of vague or confusing questions. As the questions were translated into Arabic, opinions were sought from senior lecturers and professors from the Public Authority for Applied Education and Training (PAAET) in Kuwait, expert in Arabic. This exercise ensured that there was no deviation in the meanings of words.

The questionnaire survey was followed by the collection of qualitative data through in-depth and focus group interviews. The rationale for using focus group interviews was to study or analyse the responses to the questionnaire in more detail. The sample for the semi-

structured interviews and focus groups consisted of 35 participants: 24 Arabic language teachers and two senior Arabic language teachers taking part in the in-depth interviews, with seven Arabic language supervisors and two head Arabic language supervisors participating in the focus groups. The teachers were selected from among 14 primary schools located in different areas in Kuwait.

Ethical issues related to the administration of questionnaires and qualitative interviews were considered, such as confidentiality and anonymising data. After preparing the questions, ethical approval was therefore sought and obtained from the Department of Education's Ethical Review Policy at the University of York. Participant Information Sheets were given to the participants and the importance of the study and their participation was explained. Consent forms were handed to informants and their permission obtained before proceeding with data collection.

In Kuwait, approval was also obtained from the Ministry of Education, for conducting interviews with the teachers. The officials were duly informed of the nature and importance of the study. It was essential to obtain this approval, because this study was attempting to discover what type of educational reform would be needed for early intervention.

Quantitative data or questionnaire data were analysed using Statistics Package for the Social Sciences (SPSS) software and carried out in two phases: descriptive analysis and factor analysis. Descriptive statistics allows data to be conveyed simply and numerically. Next, all the research questions were analysed using Exploratory Factor Analysis (EFA), a multi-faceted, multi-step process, and Principal Components Analysis (PCA), a data reduction method. Through Factor Analysis, it was determined whether data were suitable for analysis, while PCA allowed the reduction of variables to a smaller number. The rationale for the use of Factor Analysis was that it is widely used in education research and is claimed to be the preferred method for drawing inferences from self-reporting questionnaires (Williams et al., 2010). The rationale for the use of PCA was that it allows for better use of the comparisons of the results obtained. The results of EFA and PCA were then combined to find answers to the research questions.

Qualitative data were analysed thematically to permit the emergence of themes by using NVivo. Thematic analysis is "a method for identifying, analysing and reporting patterns within data" (Braun & Clarke, 2006, p.79). The rationale for using thematic analysis was because it is a simple way of categorising or encoding data in qualitative research. It allows researchers to look for broader patterns in interview transcripts and then conduct a finer-

grained analysis. Thematic analysis tends to be used for analysing interviews and focus groups, as it allows important elements in considerable amounts of data to be summarised. The intention here was to identify a small number of themes which would represent actual data (Braun & Clarke, 2006).

1.8 Terminology Used in the Study

a) **Dyslexia:** Dyslexia is not an intellectual disability but a specific learning difficulty (SpLD) characterised by a phonological deficit that causes problems with reading and spelling written words For the purpose of this thesis and in the context of Kuwait, dyslexia is a specific learning difficulty which hinders learners from fully and effectively participating in society equally with others.

b) **Specific learning difficulties (SpLD)**: SpLD is used to describe all learning disabilities and difficulties related to dyslexia, because it is the actual language used in the US Individuals with Disabilities Education Act (Individuals with Disabilities Education Act, 2004).

c) **Teachers' expectations:** The term 'teachers' expectations' refers to biased interpretations from teachers with respect to the potential of pupils to achieve and maintain academic success (Riley & Ungerleider, 2012). Teachers have expectations which are based on the perception that all children are capable of learning and that learning is contingent on the quality of teaching (Roll-Pettersson, 2008).

d) **Early Interventions**: Effective interventions can be applied at any point in an individual's life. However, early intervention refers to the process of diagnosing and tackling problems that young children may have developed or are at risk of developing.

e) **Self-concept**: Self-concept refers to the mental image or belief of a person with dyslexia about him- or herself. In other words, it is and individual's self-knowledge.

1.9 Brief Description of the Thesis

This thesis consists of seven chapters. Chapter One provides an overview of SpLD (dyslexia) in the context of education and the rationale for examining the challenges facing

teachers, regarding the implementation of early intervention for pupils with SpLD (dyslexia) in primary schools in Kuwait. It outlines the statement of the problem and research questions, research objectives and research significance. It also provides the rationale for the adoption of a mixed-method research design, defines the terminology used in the study, and gives a brief description of the thesis as a whole. The Chapter concludes by outlining the theory underpinning the study, its contributions to knowledge, and culminates with the structure of the thesis.

Chapter Two sets the context for this study by providing some background on education policy and practice in Kuwait, beginning with a brief history of the State of Kuwait. It sheds light on the education system in that context, discussing the history of education in the State, especially with regard to the services and facilities provided for pupils with learning difficulties. Finally, it discusses the current education situation in Kuwait. In short, it provides some general background on Kuwait's education system, related to the key issues addressed in this study.

Chapter Three then reviews the literature on areas related to the research topic, including an overview of dyslexia and SpLD. It introduces relevant theories of dyslexia, enabling teachers to understand the nature of the difficulties faced by pupils with dyslexia and how these problems can affect teaching and learning. The primary and secondary characteristics of dyslexia are discussed, along with its diagnosis and treatment, the effect of dyslexia on self-esteem/self-concept, and the impact of teachers' perceptions of early intervention on pupils with SpLD (dyslexia). The review also includes an overview of the Arabic language, Arabic script and orthography, Arabic phonemes and morphology, similarities between Arabic and English, and developmental dyslexia in the Arabic context. Literature on studies in early intervention, the effects of delayed intervention, the obstacles and barriers which prevent the implementation of early intervention in primary schools, and studies on early intervention both in Arab and Western cultures are also reviewed.

Chapter Four presents the theoretical framework and the methodological choices that are important to the researcher's philosophical stance. This research uses a mixed-method research design and an interpretive paradigm. Chapter Four also explains the different data collection methods used here and addresses the respective ethical considerations.

Chapter Five then explains how the quantitative data were analysed, with the results of the study subsequently being presented. The Chapter is divided into two sections: using descriptive statistics to analyse basic features of the study, such as the means and

frequencies, number of variables, and the number of valid cases for each variable; using Factor Analysis for identifying variables and the underlying factor structure of the variables, and PCA, a reduction technique to reduce variables to a smaller number of principal components, and finally, a discussion of the findings and results.

Chapter Six is divided into three sections; the first explains how the qualitative data were analysed, including the translation, transcription, identification, coding and conceptualisation of themes. It then presents the study findings. Subsequently, the second section discusses whether the conclusions and outcomes are consistent with or differ from existing views. Finally, the findings from the quantitative and qualitative phases were integrated, so that they provide complementary conclusions or interpretations.

Chapter Seven presents a summary of the entire thesis. This Chapter provides an overview of the research motivation, the role of the researcher and a summary of the key findings. It outlines the limitations of the study and the research implications in the context of Kuwait. It concludes by providing practical suggestions for further research, with final comments from the researcher.

1.10 Underpinning Theories

The theoretical framework guiding this study is based around the claim that teachers' expectations affect pupils' academic progress. This was developed from a review of the relevant literature and draws heavily from the work of Riley and Ungerleider (2012) and Kaplan and Owings (2013). A theoretical model of early intervention for pupils with SpLD (dyslexia) in schools is currently necessary, due to the lack of existing research. In Arab countries, especially Kuwait, such a model is important for teachers. An examination of teachers' perceptions and their expectations of pupils with SpLD (dyslexia), as well as being aware of the challenges facing teachers in their implementation of early intervention can lead to the development of improved implementation for early intervention in schools.

1.11 Contributions of the Thesis

Despite growth in research into early interventions for dyslexia in the West, no one has clearly established how such mediation can be implemented in schools in Kuwait. There is very little research and even this is largely descriptive. Nevertheless, research in this area is important, in order to gain an extensive theoretical understanding of teachers' expectations of pupils with SpLD (dyslexia). This research may therefore assist schools in

Kuwait to better understand the importance of early intervention and how to overcome the obstacles that prevent its implementation.

The findings of this study will contribute to the development, updating and strengthening of learning support provided for pupils with SpLD (dyslexia), as well as teacher training, by catering for teachers' authentic professional needs on the frontline. Moreover, the study contributes to the literature on teachers' concerns about learning support for pupils with SpLD, especially with regard to the local context of educational reform. Furthermore, this study gives some critical insights for policy-makers into the monitoring and reviewing of educational reforms in Kuwait.

1.12 Summary

This chapter has presented some context for the research topic, the research problem and the research questions. It has defined the key terms used and outlined the research objectives, research significance, methodology adopted, underpinning theories and contribution to knowledge.

Chapter Two: Background to Education Policy and Practice in Kuwait

2.1 Introduction

This chapter provides some background on education policy and practice in Kuwait, beginning with the brief history of the State of Kuwait. This will be followed by an outline of the history of education in Kuwait, especially with regard to the services and facilities provided for pupils with learning difficulties. Finally, the current education situation in Kuwait will be discussed. The aim is to provide the reader with some general background on the education system in Kuwait, which will enable them to put the issues surrounding SpLD in context.

2.2 A Brief History of the State of Kuwait

Kuwait is an Arab Muslim country, situated to the north-east of Saudi Arabia and to the south of Iraq. The total area of the State of Kuwait is 17,819 km^2 and the population in 2011 totalled 4,005,760 (Kuwait News Agency, 2016). Kuwait was established over three centuries ago and through the ages, the prevailing way of life there has gradually moved from the desert to a very different modern cultural environment. At the beginning of the 20th century, there were few pupils in Kuwait, because there were no schools as such at that time. Education was traditional and religious, and as such, took place in the mosques. The Al-Mubarakiyyah School was the first formal school established. It was set up at the request of rulers and merchants in 1912. In 1936 the Kuwaiti government established the first formal Department of Education (Kuwait History, 2000). After the discovery of oil in Kuwait, the government started spending considerable sums of money on educating its citizens. In 1961, Kuwait became independent from the UK, with the culmination of the British Protectorate. In the same year, the Department of Education became the Ministry of Education and it started to redevelop the education system. The Ministry enacted *'Law No. 11'* in 1965 and applied obligatory education for all pupils, including pupils with learning difficulties.

2.3 The History of Education in Kuwait

In order to facilitate the discussion surrounding the educational context of this study, the history of education in Kuwait may be divided into three parts. In the first, the focus is on how education began in Kuwait, while the second describes education after the discovery

of oil and the third discusses education since the establishment of the Kuwaiti Constitution and the Ministry of Education, right up to the present situation.

2.3.1 The Beginnings of Kuwaiti Education

Formal education in Kuwait has a long history. It began in 1745 in the mosques, where Imams (religious preachers) and devout members of the community taught the principles and rules of Islam and the Arabic language. In 1887, Kattabs (schools) were established, introducing the teaching of reading, writing and mathematics. Although the Kattabs taught only these few subjects, this marked the beginning of formal education for children of both sexes (Alabdulghfoor, 1983).

In 1912, the first formal modern primary school was set up, namely Al-Mubarakieyyah School, at the request of merchants and through the support of the ruler of Kuwait at that time. This accepted boys aged nine or ten who had successfully completed the Kattab School. The school offered five years of study in Arabic, Islamic studies, history, the geography of Kuwait and some of the other surrounding countries, and mathematics, although there was no set curriculum. The teachers themselves chose subject matter that they considered suitable for the children (Kuwaiti Research and Studying Centre, 2002c).

At the end of each school year, the pupils sat oral examinations in all subjects, organised by their teachers. The teachers taught every subject to their class, but in the fourth and fifth years, there were specialist teachers for each subject. Pupils sat on the floor with a box in front of them for a desk (Alabdulghfoor, 1983). Finally, the number of pupils increased, which led to overcrowding. In 1921, the Emir of Kuwait sought to change the curriculum and attempted to promote a better standard of education in the school. He also wanted to introduce the teaching of English, but this was rejected by the teachers. Up until this time, the teaching of English had been associated with Christian priests and missionaries and was therefore rejected by the Kuwaiti people (Alabdulghfoor, 1983). However, it was felt by Kuwait's ruler at the time that the inhabitants needed to improve in various areas of knowledge and it was for this reason that he wanted to introduce English language teaching (Alabdulghfoor, 1983).

In 1921, Al-Ahmadieyyah School was opened to cater for the growing number of pupils seeking an education, but unable to attend Al-Mubarakieyyah, due to a lack of room for them. The curriculum of the new school was the same as that of Al-Mubarakieyyah, but with the inclusion of the English language (Alabdulghfoor, 1983). This was due to the fact

that the Kuwaiti people, particularly the merchants who trading abroad, realised that English was becoming an international language and that Kuwaitis who wished to conduct business with people in India and Africa would find the ability to speak English very useful indeed.

As noted, no attention was paid to teaching pupils with learning difficulties when the State of Kuwait began to establish educational facilities. The two schools mentioned above had no such provision, possibly due to a lack of awareness of educational needs and the deficits in Kuwaiti culture at that time, which still largely consisted of Bedouin society. However, considerable changes were made to the running of Al-Mubarakieyyah and Al-Ahmaddieyyah Schools over the years. In 1925, a new Director from Egypt doubled the duration of the lessons and added a ten minute break between them. Moreover, instead of using boxes to work on, pupils now had desks and chairs. In 1936, the then Emir of Kuwait agreed to take over responsibility for education. These events marked the creation of a formal Department of Education in the Kuwaiti government (Alabdulghfoor, 1983). This Department fulfilled the role of the present Kuwaiti Ministry of Education, which did not exist at that time. The first task carried out by the Department was to evaluate the two schools, Al-Ahmadiyah and Al-Mubarakiyah. Additionally, the curriculum was developed in accordance with current needs with the addition of subjects such as geometry, drawing, handicrafts, and principles of health and science (Kuwaiti Research and Studying Centre, 2002a).

Despite the increased attention given to education by the Kuwaiti government, following the establishment of the Department of Education, educational policy during this period still did not attempt to accommodate the needs of children with learning difficulties, even regarding the teaching of key subjects, such as Arabic, mathematics and science. These are therefore the focus in the present study, given the importance of these subjects in children's lives.

Before 1938, there were no national secondary schools in existence in Kuwait. Some pupils were sent to Baghdad, Victoria College in Egypt, or the American College of Beirut in the Lebanon (Kuwaiti Research and Studying Centre, 2002a). This system of sending Kuwaiti pupils to Cairo and Beirut continued until 1953, when Kuwait built its first secondary school for children aged between 12 and 16 (Alabdulghfoor, 1983). However, if there was any concern about taking care of children with learning difficulties during that period, it was not a priority. The main aims of the mission plan lay with the completion of education

for students on scholarships, as well as teaching some children with special educational needs, but mainly those with Down syndrome, blind or deaf children.

2.3.2 Kuwaiti Education after the Discovery of Oil in 1938

In the 1940s, Kuwait experienced an oil boom; the subsequent increase in income meant that more money became available for education (Alabdulghfoor, 1983). Unfortunately, however, income was not invested in the education of children with learning difficulties, although Kuwait's population was small and its oil revenue very large. The reason for this was a lack of educational awareness about how best to provide education for these children, despite the progress being made in many countries; for example, the UK issued its Education Act as early as 1921, thus ensuring education for disabled pupils (Armstrong, 2007).

Kuwait had sought to develop its educational system by benefiting from the Egyptian education system, which had been in place a lot longer. Large numbers of students were sent to Egypt and Egyptian teachers were given the opportunity to work in Kuwaiti schools in 1943 (Kuwaiti Research and Studying Centre, 2002a). Teachers from Egypt applied educational plans and curricula that were prevalent in their native country to schools in Kuwait, making some necessary modifications to cope with the nature of Kuwaiti society (Kuwaiti Research and Studying Centre, 2002a). One of the reasons for neglecting pupils with learning difficulties in Kuwait at that time was the fact that Egyptian educational planning dominated the Kuwaiti education system and the education of pupils with learning difficulties did not start to develop in Egypt until 1956, after the Egyptian Ministry of Education had sent teachers to England to qualify them in the field of special education (Ministry of Education, 2009). Educational development in Kuwait was supported by the Declaration of Human Rights, proclaimed by the General Assembly of the United Nations (UN) on 10th December, 1948 (UN, 2009). The declaration, "Everyone has a right to education" was presented in a conference held by the United Nations Educational, Scientific and Cultural Organization (UNESCO) (Spring, 2014). It may be noted that this declaration was general and included all members of society, without an explicit script for pupils with learning difficulties. Moreover, there was nothing added to this declaration until 1971, regarding children with learning difficulties. 1971 was when the Declaration on the Rights of Mentally Retarded Persons (UN, 2003) was adopted by the Assembly, stipulating that the same rights were granted to persons with learning difficulties as were assured for any other human being. Moreover, there were to be awarded rights specifically

in relation to their special educational and social needs (UN, 2003). In 1994, this decision had expanded to include pupils with learning difficulties in mainstream schools:

> …every child has a fundamental right to education', 'every child has unique characteristics, interests, abilities, and learning needs' and 'Those with special needs must have access to regular schools' (UNESCO 1994, quoted in Armstrong and Barton 1999, p.109). Accordingly, the Special Educational Needs and Disability Act (2001) adopted a change of emphasis in creating a duty to teach pupils with special educational needs in mainstream schools in United Kingdom. (Armstrong, 2007, p.556)

Kuwait then tried to form relationships with Arabic and international educational institutions. This relationship started to grow when the Education Department agreed to the UN's desire for an improved Kuwaiti education system. In 1952, Kuwait participated in the Arabic Cultural Conference in Egypt. This contributed to Kuwait being accepted into UNESCO as a participating member in 1958 (Kuwaiti Research and Studying Centre, 2002a). In November 1960, Kuwait became a full member of UNESCO. The purpose of this membership was to raise the standards of education and culture in Kuwait and improve communication with the rest of the world (Kuwaiti Research and Studying Centre, 2002a).

One of the clear indicators that Kuwait benefited from the educational relations established with international educational organisations is that it sought to achieve the democratic principle in its educational policy. It did this by trying to create an appropriate education according to children's learning difficulties. In 1955, the State opened the first school for the blind and then in 1958, the first school for blind girls was established. Moreover, in 1959, the first school for the deaf and mute was launched. Finally, in 1960, the first school for pupils with learning difficulties was opened, with particular provision for children with mental retardation (Alabdulghfoor, 1983).

2.3.3 Education under the First Kuwaiti Constitution

In 1961, Kuwait gained its independence from Britain and in the same year, the Department of Education became the Ministry of Education. In order to develop the education system, it opened new departments, including a Special Education Department responsible for children with learning difficulties (Kuwaiti Research and Studying Centre, 2002a). The most critical event in that period was the creation of the Constitution of the State of Kuwait, which was influenced by the Constitutions of countries like Egypt, Iraq, Syria, the Lebanon and France. This contained Articles relating to education and special education. (Kuwaiti Research and Studying Centre, 2002b), which include:

Article 13: Education is a fundamental requirement for the progress of society, assured and promoted by the State.

Article 14: The State shall promote science, letters, and the arts and encourage scientific research therein.

Article 40: Education is a right for Kuwaitis, guaranteed by the State in accordance with the law and within the limits of public policy and morals. Education in its preliminary stages is compulsory and free in accordance with the law. The law lays down the necessary plan to eliminate illiteracy. The State devotes particular care to the physical, moral, and mental development of the youth. (National Assembly, 2004)

It is clear from the above that the Kuwaiti Constitution did not contain an explicit Article related to children with learning difficulties.

When the President of Kuwait signed the Constitution, he asked the Minister of Education to create the aims, strategies, plans and policies of education for both public and special education, including pupils with learning difficulties. The educational aims in Kuwait were supported by the Arab Culture Unit. The Charter of the Arab Culture Unit, established in Baghdad in 1964, states that all Arab countries should have the same educational aims (Daun & Arjmand, 2002), but these aims were general and did not specify the aims of teaching pupils with learning difficulties.

In 1966, Kuwait participated in an Arabic educational conference in Libya, organised by UNESCO. The decisions at that conference led to the establishment of an integrated form of Arab educational policy, which was adopted by Kuwait (Kuwaiti Research and Studying Centre, 2002d). One of the important aspects of this policy was the necessity to plan for education in the light of the general aims of education in Arabic society, as well as seeking to achieve the furthest limit of social development for individuals (Kuwaiti Research and Studying Centre, 2002d). Again, however, this was a general policy and it did not contain an explicit Article about educational planning for pupils with learning difficulties.

The adoption of this policy does not mean there were no previously existing educational policies in Kuwait; rather, it supported the previous policy and illuminated the way forward for Kuwait. The role played by educational policy in the education system will be discussed later and an outline of education policy in Kuwait, designed to accommodate all categories of Kuwaiti society - including those with learning difficulties - will be presented.

2.3.4 Educational Policies

Educational policy plays a significant role in any state, since the development of a state is measured by its attention to the development of its educational policy, considering that educated generations are the foundation of the development of any nation (Abdullah, 2006). A clearer understanding of educational policy can be gained from understanding the purpose of policy in general. Al-Sarraf describes policy as a:

> …general working plan or a style for organized and aware thinking adopted by a person or an institution. Moreover, Policy is an essential aspect for each organization to direct its members towards practicing their work as well as making decisions towards achieving the desired aims for the organization. Additionally, policy is related closely to the aims, plans, programmes, procedures and working methods as it announces the intended work to reach the aims. Furthermore, polices determine the tools that may help us in executing the intended work. (Abdullah, 2006, p.27)

In 1965, Kuwaiti Educational Management was the agency that formulated educational plans and then transformed them into educational policies, such as decisions, judgments, regulations and legislation (Kuwaiti Research and Studying Centre, 2002d), under the Kuwaiti Aims of Education. This agency was concerned with all children, with or without learning difficulties.

Good (1973) defines educational policy as:

> A judgment, derived from certain system of values and certain assessment of situational factors, operating within institutionalized education as a general plan for guiding decisions regarding means of attaining educational objectives. (Good, 1973, p.206)

Furthermore, in Qatar, educational policy is defined as a set of principles, bases, criteria and regulations for meeting the comprehensive aims of its education system (Ministry of Education, 2007a), particularly with regard to children with learning difficulties. It also includes the precise commitment of the State to education as a whole (Ministry of Education, 2007b), whether for children with or without learning difficulties. Thus, the importance of an education policy that outlines the set curriculum is apparent. Accordingly, special education schools in Kuwait build their programmes in the light of educational policy.

2.3.5 Educational Polices in Kuwait

The establishment of educational policy was not swiftly achieved in Kuwait, but was rather associated with the emergence of the first formal educational institution supervised by the

government in 1936, the Department of Education (Kuwaiti Research and Studying Centre, 2002b) which was the first educational policy-making body in the country. However, this policy was general and did not specify children with learning difficulties. The Department had a conception of the educational policy expressed through its decisions; the priority being education and its regulation, developing the curriculum, and holding training courses for Kuwaiti teachers (Kuwaiti Research and Studying Centre, 2002d). In the mid-50s this policy was apparent in the form of principles based on three pillars: free state-sector education for all; the elimination of illiteracy, and educational opportunities for all who wish to continue their studies (Kuwaiti Research and Studying Centre, 2002d).

In 1961, Kuwait gained its independence and the Educational Department became a Ministry of Education. Following this, 'Code Number 11' was issued on 24 March, 1965, concerning compulsory education. This law included 15 Articles dealing with free education for all Kuwaiti children from primary school to intermediate level (Almahanaa, 1993). Also included in this law was the State's responsibility to provide school buildings, textbooks, teachers and everything else required for the success of mandatory education (Almahanaa, 1993). Moreover, this law included pupils with special educational needs, as stated in Article 4 on compulsory education for children with special educational needs:

> Obligation of children with physical or sensory (hearing, visual, mental) disabilities to attend special education schools for as much as they are capable of continuing study. (Alalban et al., 2003, p.125)

After issuing this law, there was an associated set of policies that sought to develop the system of special education in Kuwait.

2.4 Special Education in Kuwait

Kuwaiti policy is based on the consideration that the citizen is the true resource of value for achieving progress and advancement. Therefore, Kuwait has sought to invest in this great resource by providing the means to ensure the development and growth of the potential and efficiency of its population at all levels (Alalban et al., 2003). Education is an important means of development and it should not just concern pupils without learning difficulties, but should be inclusive of all learners. Attention should therefore be paid to providing equal opportunities in education and instruction, so that pupils with learning difficulties receive special educational provision to prepare them for their lives (Alalban et al., 2003). This provision has been reflected in the general aims of education in Kuwait,

which covers the educational requirements of the whole of Kuwaiti society, including children with learning difficulties.

This denotes beginning of efforts on the part of the Ministry of Education regarding special education for those classified with visual, auditory or motor disability and other difficulties. The Ministry have established educational plans, a curriculum and educational aids, as well as other prerequisites of the educational, instructional and rehabilitation process (Alalban et al., 2003). In addition, efforts have been made to establish appropriate diagnoses and therapeutic services in a manner that should lead to integrated work, whereby all aspects work together to meet the intended aims within the framework of the Ministry of Education's policies. These provide technical and administrative cadres and a specific financial budget for special education (Alalban et al., 2003), giving special education the chance to grow, expand and develop.

2.4.1 The Beginning of Special Education in Kuwait

To ensure that special education services are available to all in Kuwait, the Law for Compulsory Education for the Disabled was enacted in the early 1950s. Initially, special education in Kuwait started simply, through the introduction of classrooms for the blind. These were attached to a religious institute in 1955 (Hammad, 1990), but very soon, because of growth and expansion, an independent school for blind children was developed from them, including elementary and intermediate stages (Hammad, 1990). Special education then expanded to include hearing impairment, with a school being opened for those with impaired hearing (Kuwaiti Research and Studying Centre, 2002b). Gradually, more and more institutions were added to these, such as a special school for children with motor disability (Hammad, 1990) and mental retardation (opened in 1960), as well as a secondary school (Vocational Rehabilitation) for children with learning difficulties in 1967 (Hammad, 1990). In 1990, complementary to the Vocational Rehabilitation School, the Instructional Workshops School was opened (Kuwaiti Research and Studying Centre, 2002d). Since the establishment of special education schools, the Ministry of Education has sought to provide special educational provision and other facilities. However, many of these facilities were destroyed or raided by the Iraqi invasion of Kuwait in 1990, although following independence from Iraq in 1991, the Ministry tried to provide essential facilities for schoolchildren.

2.4.2 The Aims of Special Education in Kuwait

The aims of special education in the country are:

> a) To work on mitigating the difficulties encountered by disabled pupils, which prevent them from benefiting from the different educational curricula, according to the type of disability they have (for example, through curriculum design, educational technologies, or audio-visual and motor instruction).

> b) To ensure disabled pupils acquire all of the skills that prepare and enable them to lead an independent life; either in their motor skills, social relationships, family life, recreational activities or other areas.

> c) To ensure disabled pupils deliberately and systematically acquire the social skills that on the one hand, enable them to fulfil themselves and on the other, help them build healthy social relationships with other members of the community. This will allow them to integrate into the community as far as possible.

> d) To develop the neural, physical and social capabilities of disabled pupils, as far as their actual abilities permit and without forcing any restrictions of any kind that will lead to this development being limited.

> e) To provide disabled children with the opportunity to learn an occupation that will allow them to excel, according to the characteristics imposed by their disability and taking into consideration all aspects of technological progress in different occupational fields.

> f) To attempt to improve conditions for disabled in any way possible. (Alalban et al., 2003, p.126)

In summary, the main aims of special education in Kuwait are currently concentrated on ensuring that pupils with learning difficulties can acquire the necessary skills that will qualify and enable them to live independently in the future, in addition to the social skills that could increase their self-confidence and enhance their relationship with society. Moreover, there is the assumption that these aims will benefit children's mental, physical and social abilities, as well as providing them with vocational skills and enabling them to perform the work they do. Besides these general aims of special education, Kuwait has also ratified the United Nations Convention on the Rights of Persons with Disabilities

(UNCRPD) and considers SpLD/Dyslexia and other disabilities as a human rights issue. This makes Kuwait's policies compliant with international standards.

2.4.3 Special Education Supervisors in Kuwait

The Ministry of Education has established a supervision section, comprised of a group of supervisors with wide experience in the teaching field. The role of the supervisor in the education process and the aims of the supervision section in special education schools are described below.

The hierarchy of employment in the teaching system in Kuwait is as follows: teacher, senior teacher, Assistant School Head Teacher and then School Head Teacher (see Figure 1). On the other hand, the senior teacher may be chosen to supervise the creation and selection of teaching material in his/her area of specialisation. Therefore, a supervisor is a teacher with long teaching experience, who represents the Ministry of Education; transferring its tendencies, reflecting its educational policies and following up the achievement of its educational aims. Hence, he or she will be someone linking the educational leadership and the teacher (Rifai, 2000).
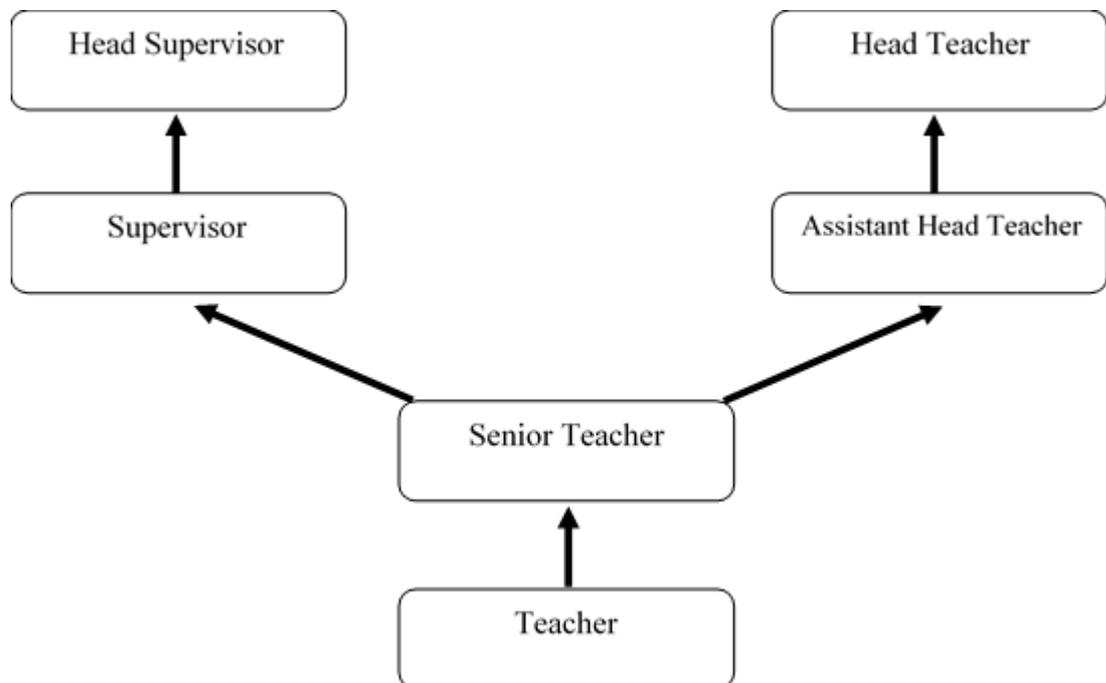
Figure 1. The hierarchy of employment in the teaching system in Kuwait

2.4.4 The Aims of the Supervision Department in Special Education Schools

Alalban et al. (2003) states that the main aim of supervision departments is to elevate the level of professional, technical and administrative performance amongst teachers, by examining the curriculum and programmes and the extent of their appropriateness for teachers. The supervisors are therefore responsible for modifying, adapting, introducing and developing the curriculum for pupils with special educational needs.

Supervisors are also responsible for following up and evaluating school performance, as well as suggesting modification to planning, direction and development, in the light of the general aims of education in the State of Kuwait and the specific objectives of special education schools. This has been achieved by monitoring and continuously evaluating teachers.

Supervisors urge the school administration to work with parents in helping them develop the skills to meet their children's needs on a daily basis and to explain to parents the importance of cooperation between the school and the family. They identify techniques for continuous evaluation of the teaching and learning process, such as the measurement of learners' achievement. They are also required to analyse findings and use them to develop the curriculum and programmes.

Supervisors are moreover responsible for running internal and external training courses to develop teaching performance, whether in delivering the curriculum and other programmes, applying methods of instruction and working within the administration of special education schools.

It is clear from the above aims that an important role is played by supervision departments, in an attempt to counter any challenges that may hinder the development of education for pupils with learning difficulties. As a result, the Ministry of Education has established specific aims, schools and supervisors for such pupils.

2.5 The Current Situation Facing Education in Kuwait

From the aforementioned review of the situation facing state and private education in Kuwait, shortcomings still exist in the educational process. Even with the passing of laws and regulations, as in the example of Constitutional Articles urging for more attention to be given to all categories of special education, private administration for pupils with learning difficulties in Kuwait is still inadequate, despite the opening of a certain number

of schools by the Ministry of Education, such as the School for the Deaf and Blind, amongst others and as stated above.

One of the most pressing issues in the field of learning disabilities nowadays pertains to the significance of identification and intervention at an early age. In Kuwait, it is only relatively recently that attention has been paid to early intervention, specifically after the ratification of *Act No. 8,* 2010 concerning the rights of persons with disabilities, which stipulates in its *Articles 9* and *10* that:

> **Article 9:** The government commits to providing educational services and teaching aids for persons with disabilities, including the categories of slow learners and those with specific learning difficulties, on an equal footing with others in mainstream education, while taking into account the special needs of communication, language, and necessary facilitative arrangements, as well as recruiting the specialised professional and educational staff who should be highly efficient and given material and moral incentives. In all educational and professional tests, including certification tests provided by governmental or civil agencies, the rights and needs of people with disabilities, slow learners and those with learning difficulties should be taken into consideration. In addition, the government should commit to providing the necessary audio and video equipment and sufficient guarantees to create an adequate atmosphere to help them complete their education.
>
> The Ministry of Education also provides training courses for all teachers in public schools to help them learn how to identify cases of learning disabilities and slow learning and how to deal with them according to their respective needs.
>
> While the local authorities are responsible for covering the financial side of special assessment tests for slow learners and learning difficulties, the Ministry of Education should commit to providing specialised centres for such tests from the effective date of this law.
>
> **Article 10:** The government should also take all effective and necessary administrative and regulatory arrangements for the inclusion of persons with disabilities and learning difficulties and slow learners in the different stages of education within educational and training curricula in keeping with their sensory, physical and mental abilities, which would eventually entitle them to be included into society and engage into the professional and productive cycle. (Legal Information Network for Gulf Cooperation Council, 2010)

This new law has in fact offered a great deal to persons with special needs and is considered to be a very important document setting out the respective rights and duties. What matters for practitioners involved in learning difficulties is that this law, with respect to its Articles 9 and 10, shows interest in children with specific learning difficulties, as well as in slow learners. However, all practitioners should have an understanding of the reading

difficulties of slow learners and children with SpLD, who experience literacy problems throughout their lives (Elliott & Grigorenko, 2014). Moreover, the two above-mentioned Articles do significantly provide for pupils with learning difficulties, in terms of diagnosis and the provision of educational and psychological services. This is in addition to the training given to school teachers and other staff and the integration of children into schools and the wider society, so that they are ready to engage in the labour market and become productive members of society.

2.5.1 The Ministry of Education

The Ministry of Education is the hub of the educational process in Kuwait. Within it is a special education department responsible for government-funded special education schools, but it has also established the General Secretariat for Special Education, which is responsible for slow learners and those with specific learning difficulties. The General Secretariat for Special Education has since been keen to organise special classes for slow learners in state schools and to offer services and facilities for inclusion in state education. In contrast, there has not been the same level of interest in pupils with SpLD, who were initially left in mainstream classes without a clear policy or services to aid their situation.

However, since the application of the above-mentioned law, there has been growing interest on the part of the Ministry to develop a plan for early intervention at primary school level, which is jointly arranged between the supervision section and state sector teachers. The intervention mechanism is contingent on class teachers who are responsible for detecting and diagnosing pupils with learning disabilities using either of two approaches. The first pertains to survey tests conducted at the beginning of the school year and which are administered to pupils attending grades two to five. The second method depends on achievement tests prepared by the school and monitored by the supervision section under the Ministry of Education. These tests are distributed over four periods of the school year. In addition, there are signs indicated to assist teachers with early detection. To be more specific, these pertain to a child's physical and social development, among other secondary signs, such as difficulties in recognising colours, sizes, shapes and reactions (Ministry of Education, 2012). Teachers have been informed to identify children with learning difficulties, apply interventions by considering learners' needs and offering them additional activities.

To date, the Ministry of Education has sought to find solutions for pupils with learning disabilities in mainstream education schools and to develop plans for treatment and

intervention. In primary schools, for example, the Ministry has introduced the so-called support classes, which allow teachers to monitor low-performing pupils and those with learning difficulties (Ministry of Education, 2012). However, the criticism directed toward this approach lies in how the needs of typically developing and gifted children can also be accommodated, as they may feel such classes are a waste of time. Moreover, some teachers may feel they are undertaking extracurricular activities for no extra compensation, which could in turn affect their performance levels in these classes, while others may not have sufficient experience in dealing with such learners.

The other type of intervention put in place by the Ministry of Education relates to establishing centres which cater for learners throughout the three stages of education; namely primary, middle and high school. These centres operate within state schools that form part of the Ministry of Education, but only in the evening. Thus, they come under different administration from that of morning schools. For this type of intervention, highly qualified teachers are nominated by the head teachers of schools running morning sessions. Teaching takes place four days a week, with two sessions per night. The number of pupils to a class will range from a minimum of seven to a maximum of 15 (Ministry of Education, 2012).

However, the disadvantage of the above-mentioned type of intervention is that it is not free of charge, unlike morning schools and these centres are only to be found in certain areas, which may discourage the child's parent or guardian from registering them, due to transportation issues. Another shortcoming relates to the rules for opening a centre, which stipulate that it may not officially operate unless a minimum number of seven pupils are registered. Class size has also attracted some criticism, as the classes tend to have high student numbers and these sometimes include ordinary and even talented pupils. It should also be pointed out that some children may feel the psychological strain of having to attend both morning and evening sessions, giving them little time to rest or do their homework. This could ultimately impact on their academic attainment and learning. It may also affect the parents, given the enormous pressure placed on their shoulders in terms of having to monitor their children during the morning and evening sessions, while enduring their own work pressures.

The General Secretariat for Special Education, which is affiliated with the Ministry of Education, has also sought to provide a special programme for slow learners, for which the Ministry has also set special classification criteria. To achieve this, some teachers have

been sent on special courses in Kuwait and abroad (The General Secretariat for Special Education, 2007).

In short, there was no clear interest shown by the Ministry of Education for children with learning difficulties until 2010. In fact, real interest only started through an agreement with the Centre for Child Evaluation and Teaching, which is addressed below.

2.5.2 Centre for Child Evaluation and Teaching (CCET)

The CCET was established in 1984 as a result of serious endeavours by a group of Kuwaiti women, who realised the difficulties faced by children suffering from learning disabilities, but failed to find an answer at home. They were therefore forced to seek help elsewhere to address these issues. In the UK and US, it was already possible at that time to diagnose such cases among children and provide them with the necessary programmes. Following their travels abroad, the aforementioned group of women noted it was extremely important to establish a centre in Kuwait to diagnose cases of children with learning difficulties and provide them with the most appropriate educational management. In fact, the centre started out with the help of friends and family and registered as a public-benefit corporation to help children experiencing learning difficulties in the Shuwaikh region. The new CCET building, located in Al Surra, was refurbished completely in 2007 with the help of donors who believed in the important role of the centre. However, the objective has never been to restrict support services purely to persons with learning disabilities, but rather to extend them to include their families, teachers and related professions, so that the challenges posed by learning difficulties can be overcome (Centre for Child Evaluation and Teaching, 2010).

Recently, the Ministry of Education has started cooperating with CCET, where some children with learning difficulties are taken on board after a series of tests to ensure their eligibility. They are then registered at the Centre, where they receive the most appropriate remedial programmes. After a year or two, they are then sent back to their regular schools (Centre for Child Evaluation and Teaching, 2010).

In the CCET, there are two intervention programmes; one in the morning and another in the evening. The morning programme is a therapeutic intervention programme run by CCET in collaboration with the Ministry of Education, with the prescribed curriculum being taught in state schools under the Ministry, in ways which will best suit pupils' abilities, taking into account the difficulties they are obliged to contend with. The morning

educational programme was initiated during the academic year 1994/1995 and is still running at present (Centre for Child Evaluation and Teaching, 2010).

This morning programme seeks to enable children to live with their learning problems and to find ways to help them do so, before integrating them into their regular schools once they can keep pace with their peers and become self-reliant in the learning process. Thus, the programme aims to promote children's self-respect and self-confidence. As for the teaching methods used, these are briefly outlined as follows:

- Pupils are taught the Ministry of Education's planned curricula.
- There should be a specialist teacher for each subject, with a strong preference for small classes, in order to provide teachers with the opportunity to meet the needs and accommodate the individual differences of learners.
- Allocating daily personalised sessions for learners as part of a treatment plan for the difficulties they usually face and instilling information in their minds.
- The morning education programme is based on an integrated educational method via multiple senses. The teacher therefore uses music, painting, computer and physical education activities to deliver information in as clear a manner as possible.
- The individual plan for each student is subject to periodic review, in order to make appropriate amendments that will best serve the student and to ensure the smooth and successful operation of the educational process (Centre for Child Evaluation and Teaching, 2010).

As for the evening programme, this provides an opportunity for persons with learning difficulties to attend the type of classes they cannot access in the specialised programmes offered by schools in morning sessions. In addition, pupils are provided with the services outlined below.

A- Individual treatment sessions:

Learners benefit from lessons in the basic subjects offered, according to the Individualised Educational Plan (IEP). This IEP is developed by the teacher in relation to educational reports on the pupil by the Centre, or according to the results of diagnostic tests conducted by the teacher.

B- Treatment sessions for the pronunciation issues of pupils with learning difficulties:

A student who suffers from problems in articulation may register to benefit from speech therapy sessions, aimed at improve their speaking skills, modifying defective language skills and helping learners acquire new language skills. These sessions are also aimed at expanding pupils' vocabulary banks, treating speech and language defects and providing treatment for stuttering.

C- Educational diagnostic tests in core subjects:

To identify learners' key strengths and areas of concern, as well as signs of learning difficulties, the programme runs educational tests in cooperation and coordination with the Centre's Diagnostic Unit. These tests assess core subjects, including Arabic, mathematics, and English.

D- Behavioural therapy:

The evening educational programme provides behavioural therapy services for pupils with learning difficulties or psychological and social needs. Intervention programmes are used to bring about positive change in their behaviour (Centre for Child Evaluation and Teaching, 2010). Moreover, the Centre has developed a treatment programme in Arabic, known as '*I read and write*', to teach reading and writing in Arabic based on the Orton-Gillingham approach to reading instruction. This language-learning strategy, which depends on multiple senses, is adopted in the teaching of people who suffer from learning difficulties when it comes to reading and writing individually or in small homogeneous groups. However, the same strategies can be used with some modification to fit the usual type of classroom found in the respective context. Studies have demonstrated that the principles upon which the Orton-Gillingham approach is based can help all children learn to read and write (Mahfoudhi et al., 2011).

The skills pertaining to the '*I read and write*' programme, which took the country three years to prepare, have been moulded according to the assessed skills in the State of Kuwait, from grades one to nine. Other Gulf curricula have been taken into account, particularly the comprehensive unified Arabic syllabus in stages of state education in the member states of the Arab Office of Education for the Gulf States. Therefore, this programme depends on the skills of the Kuwaiti and Gulf curricula, but seeks to arrange them according to research findings relating to the common errors in reading aloud, comprehension, spelling

and vocabulary found in various primary level resources, including Arabic, mathematics, science, and Islamic education, as applied in state schools in Kuwait. The programme also details and meticulously addresses these skills, according to their gradual and interdependent aspects, from easiest to hardest and divides them into sub-skills (Centre for Child Evaluation and Teaching, 2010).

In this respect, the Ministry of Education has come to an agreement with CCET and with a British advisory body awarding certificates for quality, namely Inclusion Quality Mark (IQM), to oversee the implementation of quality educational inclusion in the Mubarak Alkabeer educational area, in a total of 24 primary schools (grades one to five). This educational inclusion project, officially launched in 2010, is a pioneering endeavour aimed at improving the educational process. Its aim is to accommodate individuals with learning difficulties through the integration of learners with mild and medium learning difficulties into primary schools. Two schools were selected for this purpose, the As-Sadim model school exclusively for boys and the 'John Kuwait' School for girls (Alrashdan, 2013). Both these schools provide support children with learning difficulties and respective teacher training policies.

The abovementioned project consists of four periodic phases; the first involves a compilation of information on participating schools, visits and data analyses. The second refers to spreading awareness of educational inclusion and its mechanisms and how to practically ascertain its realisation, in addition to learning difficulties and how to overcome them. The third phase looks into the application of screening tests to identify children with learning difficulties and to determine levels of difficulty, before providing the appropriate therapeutic intervention programmes for them. Finally, the fourth stage is that of therapeutic intervention via training schools participating in the project to provide therapeutic intervention programmes for people with learning difficulties, according to the level of difficulty.

All in all, the above project has sought to establish an appropriate environment for integration, including for all those working in the schools under the project, in addition to those overseeing the schooling process. This will imply the teaching and administrative staff, practitioners, heads of departments, inspectors, mentors, supervisors, parents and pupils (Educational School Merger Project, 2012).

2.5.3 Kuwait Dyslexia Association

The Kuwait Dyslexia Association started working in the field of learning disabilities and dyslexia in 1999 as a committee under the Patient Support Fund. It continued to support persons with dyslexia through the provision of consultation and information-sharing in this area, as well as supervising treatment and helping communities establish informed opinions on disability. The organisation was finally launched under the Kuwait Dyslexia Association on the 14th of December 2005, via Ministerial Decree No. 12/2006. This was announced in the Official Gazette, no. 756 19/2/2006, as a public-benefit association, specialising in the field of learning disabilities in general, and dyslexia in particular (Kuwait Dyslexia Association, 2009).

Cooperation between the Ministry of Education and Kuwait Dyslexia Association has only recently been established, with dyslexia-friendly classrooms being set up in government schools, in cooperation with the Kuwait National Commission for UNESCO and the British Dyslexia Association. Upon conducting a scientific survey, it was shown that a large number of people have difficulties with reading (Kuwait Dyslexia Association, 2009). However, the Association has developed a strategy to deal with this issue, prioritising early intervention and rapid and precise detection, as well as drawing upon international expertise, by developing a programme that relies on computer technology. This is known as the Arabic Cognitive Profiling System (CoPS). For this global programme, which originally comes from Britain, accompanying rights were acquired to translate it into Arabic, resulting in a pilot programme to identify learning difficulties on scientific grounds. It is used for children aged four to nine years.

The CoPS programme is delivered to children on an individual basis, using a computerised system. It consists of nine tests, including four visual and four audio-tests, as well as an additional test to diagnose strengths and weaknesses in the child's cognitive schema. The Arabic CoPS has proven to be of real benefit to teachers in terms of identifying the cognition difficulties children may face during the learning process. It has also pointed to key strengths and areas of concern and contributed to the development of appropriate strategies for overcoming these difficulties and avoiding academic failure. Thus, the programme has issued a comprehensive guide for teaching children, which includes sound awareness, auditory discrimination, short-term auditory memory, short-term visual memory and verbal and visual sequencing (Kuwait Dyslexia Association, 2009).

2.5.4 Kuwait University

The University of Kuwait was opened in 1966 and currently comprises several colleges, including the College of Education established in 1981. The College of Education was keen to incorporate multiple disciplines, such as Arabic, English, mathematics, chemistry, and biology, amongst others (Kuwait University, 2004). However, a department dedicated to special education is yet to be established, despite its importance for a large segment of society. In addition, the College of Education is only interested in promoting and providing qualifications for a large number of teachers, who may have never been given access to taught modules like special education or courses on how to work with children with learning difficulties.

2.5.5 College of Basic Education

The College of Basic Education is one of the colleges under the Public Authority for Applied Education and Training (PAAET), established in 1982. Prior to the establishment of the current College, it was known as the Teachers Institute. This provided a two-year course, before the Institute was converted into a college in 1986, with a four instead of a two-year academic course. The College now offers specialties such as Arabic, English, mathematics, science, computer studies, art education, music and other disciplines. Teachers are also trained here, before embarking on their professional careers and are given some information about special education (The Public Authority for Applied Education and Training, 2009). Seven years ago, the Department of Special Education was established to cater for the following disciplines: mental impairment, mental superiority, motor disability and hearing and visual impairment. Teachers have since been inducted into modules to sharpen their skills in working with children with special educational needs (The Public Authority for Applied Education and Training, 2009). Finally, a relatively short time ago, one of the official newspapers in Kuwait (Al-Watan Newspaper) announced on the 11th of January 2013 that the specialty of learning difficulties would be adopted in the College of Basic Education (Alwatan Newspaper, 2013).

Based on the above, it could be argued that the Ministry of Education in Kuwait is still lacking in terms of meeting the needs of children with learning difficulties. This is because there does not seem to be a clear policy on school administration and no specific strategies or programmes for the early intervention for children with learning difficulties have been defined so far. Similarly, educational institutions, such as universities, have failed to meet the expectations and requirements of children with learning difficulties. Finally, the CCET

and the Kuwait Dyslexia Association do not offer their services free of charge and do not accommodate a sufficient number of children with learning disabilities, compared to the existing capacity for this category. Therefore, potential stakeholders and educators should seriously contemplate the status of special education in Kuwait.

2.6 Conclusion

The Kuwaiti government has been interested in developing the State's education system since its establishment in 1745. However, this interest is an interest which had already developed over time, as Kuwait moved from an illiterate, Bedouin society into a life of education and development, as described earlier. Educational and instructional development in Kuwait began after the discovery of oil in 1938 and continued with the flourishing of the country's economy. Furthermore, this development was not restricted to a certain category of society, but was rather inclusive, endeavouring to accommodate pupils with learning difficulties.

The Ministry of Education fostered a special interest in pupils with learning difficulties, issuing a special educational policy for them and providing them with educational services and facilities. These facilities included special schools. However, the present author would argue that the philosophy of special education at the Kuwaiti Ministry of Education has been based on isolating pupils with learning difficulties in special schools, although the international trend is for inclusion within mainstream state education, equipped with the appropriate facilities. Therefore, internationally, the focus is on developing inclusive education, so that all pupils can learn in the same environment (Rix, 2005). In addition, Mittler states that "Inclusion is now a world-wide movement" (Mittler 2000, p.13).

Integrating pupils with learning difficulties with peers who do not have such difficulties in general state education is therefore deemed to be better than isolating them in special schools (Humphrey, 2009). This is because inclusion first reduces the negative effects of labelling. Additionally, inclusion provides an opportunity for pupils with learning difficulties to interact with their peers and learn from them. Moreover, it helps develop the social and academic aspects of those children's lives (Topping & Maloney, 2005). Furthermore, the policy of inclusion corresponds to the nature of Kuwaiti culture, emerging from Islam, whereby non–discrimination is encouraged and there is an emphasis on dealing with everyone fairly. Besides, inclusive services for pupils with learning difficulties in Kuwait are relatively easy to provide, since children can attend any school that is close to

their homes, without encountering travel difficulties, while special education schools may be located far from their homes.

The aims of special education are derived from the general aims of education in the State of Kuwait. However, although they are compatible with the general aims, there is an issue concerning the social skills that enable the children with learning difficulties to build their confidence, as well as to establish social relations with other members of society. In fact, this will not be fully achieved unless the children are integrated with peers in mainstream schools who do not have learning difficulties. Nevertheless, this claim is not of the moment; it is one which has long been made by researchers. For example, Madden and Slavin (cited in Topping & Maloney, 2005) concluded that there was no evidence of segregated schools enhancing either academic or social progress, in comparison to mainstream schools.

In Kuwait, identification and intervention for people with learning difficulties has only started in more recent years. It therefore seems that much is yet to be discovered and many children are awaiting an appropriate intervention and treatment. As such, educators and concerned parties are required to take into account the possibility of learning difficulties increasing or growing in severity, unless treatment programmes are put in place to deal with them. The number of institutions offering such programmes is currently limited and may not be able to accommodate large numbers of students with learning difficulties. This would mean that significant numbers of learners would be deprived of the appropriate remedial services in regular schools. Therefore, many such children face countless difficulties and pressures, forcing some of them to drop out of school and discontinue studies, although there are no statistics available. The Ministry of Education should thus continue to develop plans to deal with this issue by creating a link with other educational institutions, like Kuwait University and PAAET, in order to find other means of early identification and intervention for learners with special needs.

Chapter Three: Literature Review

3.1 Introduction

In this chapter, the literature on the research topic and its associated fields, including an overview of dyslexia and specific learning difficulty (SpLD) is reviewed; introducing relevant theories on dyslexia. This should enable teachers to understand the nature of the difficulties faced by pupils with dyslexia and how these problems can affect teaching and learning. The primary and secondary characteristics of dyslexia, its diagnosis and treatment, the effect of dyslexia on self-esteem/self-concept, and teachers' perception of the impact of early intervention on pupils with SpLD (dyslexia) will also be discussed. The review includes an overview of the Arabic language, Arabic script and orthography, Arabic phonemes and morphology, similarities between Arabic and English, and developmental dyslexia in the Arabic context. The literature related to studies on early intervention, the effects of delayed intervention, the obstacles and barriers that prevent the implementation of early intervention in primary schools, and studies on early intervention from Arab countries and the West are also reviewed.

3.2 Dyslexia

Dyslexia is known as a reading or specific learning disorder (SpLD). This disorder is usually developmental, rather than being acquired by other means, i.e. traumatic brain injury. It has not been fully defined yet, but the most commonly accepted definition was given by Rose (2009a), a member of the British Dyslexia Association. According to Rose (2009a), it has the following characteristics:

- Dyslexia mainly affects a person's reading, writing, fluency and accuracy.

- One of dyslexia's main features is a generalised weakness in phonological processing, which causes problems in learning, for example, letter/sound mapping, amongst other processes.

- Dyslexia is likely to be on a continuum, as there are no obvious boundaries – discrepancies are arbitrary.

- Any difficulties regarding brain activity, lingual problems, balancing problems, and disability to pay attention or to manage things may not be symptoms of dyslexia.

- An idea of the severity and persistence of SpLD can be gained by studying individual current or past responses to sound intervention (Phillips et al., 2013).

Dyslexia is a type of learning difficulty which may be 'neurobiological in origin' (International Dyslexia Association, 2013). Lyon et al., (2003) describe dyslexia as "one of several distinct learning disabilities. It is a specific language-based disorder of constitutional origin characterized by difficulties in single word decoding, usually reflecting insufficient phonological processing" (pp.2-3). It can become evident where there are problems with fluent or accurate word recognition, as well as poor decoding and spelling ability. Such difficulties primarily result from a deficit in phonological elements of language that would not appear to correspond to other cognitive abilities, or given effective classroom instruction. Other consequences would include impaired reading skills and enjoyment, thus affecting knowledge and vocabulary development (Lyon et al., 2003).

These problems with decoding individual words are frequently unexpected, in terms of age or other academic and cognitive abilities. Moreover, they are not connected to any sensory impairment or general disability in development. Dyslexia manifests as an inconsistent difficulty with various linguistic forms. It often comprises, along with reading problems, a noticeable issue with writing and spelling expertise (Elbeheri et al., 2006). Developmental dyslexia has captivated linguists, neurologists, psychologists and teachers for over a century and has lately received even more attention (Elbeheri et al., 2006).

In fact, identifying the causes of dyslexia has been the focus of research in the field of learning difficulties for some years and has attracted the interest of ophthalmologists, neurologists, medical practitioners and many others in the medical field. Despite constant studies on the topic, the actual cause of dyslexia remains undetermined, but it is generally acknowledged to be a combination of neurological, psychological and genetic factors. However, in most cases concerning children, the causes of learning problems often remain a mystery. According to Reid (2012), although screening tests can identify children at risk of dyslexia, they do not offer an absolute analysis. In fact, tests conducted on children have not been fully successful and only help identify possible cases of children at risk of dyslexia or other learning difficulties.

3.2.1 Specific Learning Difficulties (SpLD) (Dyslexia)

In this study, the term 'Specific learning disability' (SpLD) is used to describe all learning disabilities and difficulties, whether related or unrelated to dyslexia (Individuals with

Disabilities Education Act, 2004). SpLD is commonly used, rather than SLD, because the acronym 'SLD' can also stand for Severe Learning Difficulties' within the area of Special Educational Needs.

In the UK, the term 'learning difficulty' also refers to those who experience SpLD (or dyslexia), but excludes those with mental deficiency and limited intelligence (Hardie & Tilly, 2012). However, in the Arab world the terms 'mental disabilities', 'mental retardation', 'mental handicaps' are used to refer to children with SpLD (Alghazo & Gaad, 2004). Specific learning disabilities are a heterogeneous group of disorders that individuals exhibit through major difficulties in verbal communication, understanding, interpretation of facts, reading, writing, mathematical reasoning and ability, or any problem emanating from abnormalities of the central nervous system (Lerner & Kline, 2006).

Selikowitz (2012) states that "A specific learning difficulty can be defined as: an unexpected and unexplained condition, occurring in a child of average or above average intelligence, characterized by a significant delay in one or more areas of learning" (p.4). Children with dyslexia often possess phonological difficulties and problems in recognising that words can be broken down into phonemes and also that letters have sounds. Moreover, they have problems in decoding words and in reading fluently. As mentioned earlier, these are believed to stem from neurobiological causes (Lyon et al., 2003).

Pupils with SpLD require more intense and explicit teaching, which needs to be carefully planned, structured and continuously assessed (Lewis & Norwich, 2001). In order to provide educational interventions, SpLD, such as dyslexia, must be detected early so that the student can be given necessary assistance. Generally speaking, dyslexia may be identified during the first years of primary school, wherever problems with reading and writing are observed as going beyond the usual difficulties to be expected during these learning stages. According to Rose's (2009b) report, the behaviour associated with dyslexia comprises poor reading and spelling skills; difficulties with phonological awareness, verbal memory and verbal processing speed, and combined problems with aspects of language, motor coordination, mental calculation, concentration and personal organisation. Rose recommends that information on the severity and persistence of dyslexic difficulties be extended to ascertain how individuals respond to well-founded interventions (Rose, 2009b). It is also recommended in the Gulf Cooperation Council (GCC) states that children with SpLD (dyslexia) be given the right to access mainstream school education. Here, if good inclusive practices are applied, pupils may be able to learn effectively; for example if the regular school curriculum is adapted and appropriate

teaching methods utilised (Alghazo & Gaad, 2004; Arif & Gaad, 2008; Gaad, 2015). This is called 'differentiation of instruction'. Differentiated learning is an inclusive approach to teaching, which allows all children to learn, including the disabled, in mainstream classrooms (Broderick et al., 2005).

3.3 Theories of Dyslexia

There are various theories related to dyslexia and individual researchers use a range of methods to investigate its root causes. However, it is worth noting that research in this respect is an enduring effort and that current knowledge remains incomplete. It is thus essential to shed light on modern theories pertaining to dyslexia and its related fields. This theoretical background will enable teachers to understand the difficulties which persons with dyslexia face and how theory can inform teaching and learning (Ramus et al., 2003). Such theories associated with dyslexia have helped develop curricula and the learning associated with them, although this is not always the case. Often, the development of methods of teaching and learning occurs as a result of the practitioners' own observations and experimentation and so the relationship between theory and practice is not always as clear-cut as it might seem (Ramus et al., 2003). This implies that teaching should be based on evidence-based practice.

The deep-seated controversy surrounding multiple interpretations of the occurrence of developmental dyslexia is largely centred on how to deal with developmental dyslexia at different levels of interpretation. Dyslexia can be due to problems with phonological processing, which has led to defining behavioural traits specific to dyslexia as a defect in phonological knowledge and awareness, as well as rapid naming and all other skills related to the ability to read, write and spell. The other abnormalities associated with persons with dyslexia indicate the existence of problems with cognitive processing (visual or auditory), memory, motor coordination and coordination (Zabell & Everatt, 2002). To overcome this problem, Frith (1997) suggests a multi-level interpretative framework known as the 'causal modelling framework', according to which multiple and different interpretations for developmental dyslexia can be identified, defined and explained (see Figure 2, below). This framework presents three levels of description to enhance our understanding of dyslexia, i.e. the biological, cognitive and behavioural levels (Elliott & Grigorenko, 2014).
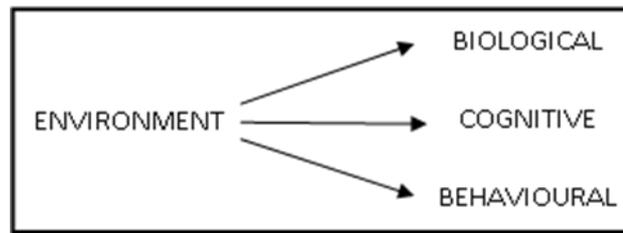
Figure 2. The theoretical framework underpinning different theories of dyslexia

Interestingly, the theoretical framework proposed by Frith explains the state of constant interaction and mutual influence of environmental factors, and their impact on biological, cognitive and behavioural levels.

There are a number of biological and cognitive theories of dyslexia. On a behavioural level, biological and cognitive factors can produce difficulties with learning to read; phonological tasks; naming; spelling; phonics skills, and the development of speech, as well as with balance, the estimation of time, memory and motion detection. Each of these theories will be briefly touched upon in turn in the following sections.

3.3.1 Biological Theories

Genetic factors: Various researchers have been engaged in efforts to identify a genetic basis to dyslexia, while other studies have concentrated on the extent to which reading sub-skills may be hereditary, or on finding gene markers for dyslexia on specific chromosomes. Many other research studies have investigated the genes responsible for developmental dyslexia and related genetic issues (Reid, 2012), as well as hormonal differences between dyslexic and control groups (Demonet et al., 2004). Such studies include the work of DeFries et al. (1997), Gilger (2002) and Goulandris (2003), who have found that learning difficulties are due to genetic influences or hereditary factors. Although researchers have tried to identify a genetic basis for dyslexia (Williams & O'Donovan, 2006), its locus has rather been susceptibility, as it is neither necessarily nor sufficiently affected by hereditary or chromosomal abnormalities and conditions (LoTurco et al., 2012). This could be the reason why there does not always appear to be a genetic link.

Language areas in the brain: Not only does dyslexia lack a biological function, but researchers have also confirmed that the language areas of the brain are affected, such as the inferior frontal gyrus, which is associated with spoken language (Ramus et al., 2003; Démonet et al., 2004; Maisog et al., 2008; Richlan et al., 2009, 2011). More recently, Positron Emission Tomography (PET) and Magnetic Resonance Imaging (MRI) have been

amongst the technologies used to enable researchers to identify any physical transformation of the living brain and the relevant active processes within it (Fawcett & Nicolson, 2008). The use of such technology has also enabled scientists to examine other types of environmental impact, particularly the impact of language as the most important environmental factor in terms of interaction with all other levels (Frith, 1997). According to Frith (1998), the phonological deficit in individuals with dyslexia "may be a result of weak connectivity between anterior and posterior language areas" of the brain (p.192). In other words, it is proposed that a deficit in the phonological processing of language is what causes dyslexia.

Cerebellum: One theory states that variation in the structure or a malfunction in the cerebellum (the so-called 'hind brain') could be responsible for ingenuity and spontaneity; thus providing an explanation of all aspects of dyslexia. This can consequently impact speech processing and general motor control processes; for example, estimating time and balance. There is evidence that the processing of information in the language areas of the brain, as well as in its magnocellular areas, takes place in the cerebellum. Therefore, any weaknesses here can lead to every type and degree of dyslexia (Fawcett & Nicolson, 2008). There is also evidence that the cerebellum plays a key role in the acquisition of language and cognitive skills, including reading (Fulbright et al., 1999). This biological theory proposes that dyslexia is caused by deficits in motor skills and automisation, thus rendering it a cerebellar abnormality. However, it does not imply that treatment applied to the cerebellum will necessarily help enhance reading skills (Hudson et al., 2007).

Transient/magnocellular systems: Individuals with dyslexia may encounter certain problems, or find it impossible to process the rapid input of sensory information, which would explain the associated visual difficulties, such as unsteady binocular vision and fixation while reading. This is because the brain's system of large neurones controls the timing of sensory and motor events (Chouake et al., 2012). This can also lead to confusion over letter arrangement and a consequent weakness in remembering the visual form of words. Moreover, it could even be a sign of something more worrying (Stein, 2001), such as inherent temporal difficulty with ensuing phonological visual and motor difficulties, rather than other explanations for dyslexia. The timing of these difficulties is also attributable to the structure of the brain (Stein, 2001). In addition, an auditory requirement may be indispensable for meeting the phonological demands of reading. This sensory deficit theory would imply that individuals with dyslexia have trouble with visual and auditory processing, which may cause learning difficulties. Therefore, it is suggested that

magnocellular training or visual and auditory training is required to alleviate the reading difficulties faced by children with dyslexia (Chouake et al., 2012).

Furthermore, there is evidence that dyslexia is the result of a deficit in the magnocellular part of the visual system (De Martino et al., 2001) However, some researchers argue that there is no causal link between an individual's sensitivity to motion and reading ability (Kranich & Lupfer, 2014). A review of the biological theories will demonstrate that mild abnormality or impairment in the function of a specific part of an individual's brain (with dyslexia) may result in cognitive difficulties. The sensory deficits suggest that reading and spelling problems are visual as well as auditory, while cerebellar impairment may cause difficulties with phonological processing. The magnocellular theory appears to unify the biological theories (cerebellar and auditory-sensory) and cognitive theories (phonological).

3.3.2 Cognitive Theories

Difficulties with phonological processing: Despite the fact that dyslexia potentially manifest in many different ways, it may be traced back to just one single reason, namely a phonological deficit. Several researchers have confirmed that phonological processing difficulties lie at the core of dyslexia and occur in all persons with dyslexia. Other researchers acknowledge the theory of phonological deficit, but regard the problem as a symptom of dyslexia, with the structure of the brain constituting the root cause (Snowling, 2000; Vellutino et al., 2004; Fawcett & Nicolson, 2008).

Working memory: The purpose of using the working memory is to store new information in an individual's mind for a limited period of time before it is either deleted or accepted. The memory can therefore be a crucial factor in dyslexia. For example, Squire and Kandle (1999) indicate that inefficient memory affects learners in terms of their understanding and slow reading of texts, as well as in their failure to recognise words that have already been learnt, which leads them to be classified as dyslexic (Colom & Shih, 2004).

Although dyslexia is commonly thought to be caused by a phonological deficit (Stein & Walsh, 1997; Snowling, 2000; Wolf et al., 2002; Ramus, 2003), there are claims that, the disorder is caused by general sensory, motor or learning processes (Ramus et al. 2003). This would indicate that the phonological deficit is only one part or result of the SpLD. The memory deficits in dyslexia may additionally be attributed to phonological difficulties (Vellutino et al., 2004). As individuals with dyslexia are not in a position to correctly relate letters and constituent sounds of speech, or to store or retrieve them, the phonological

theory proposes a direct link between a cognitive deficit and the behavioural problem to be explained.

3.3.3 Behavioural Theory

The impact on a subject of cognitive weakness is important to consider. This may vary not only across age groups, but also from person to person. An examination at behavioural level will consider all the effects of cognitive impairment on an individual, such as writing, reading, numerical problems and spelling. As stated earlier, cognitive weakness varies from age to age and problems reported early may turn out to develop into something different. For instance, a problem associated with phonetics in a child might change as he grows up. In cases where these problems are catered for and secured, there overall effect on the subject of the delay in learning will persist, preventing the efficient development of high level skills, such as comprehension and writing skills. Likewise, difficulties related to dyslexia also change with the passage of time, age and environment and writing, reading and spelling are areas may be accompanied by behavioural difficulties (Phillips et al., 2013).

The following behaviour can indicate a problem and suggest further examination of a student: difficulties in decoding, such as word recognition, slow reading and a lack of fluency. Furthermore, consistency in poor spelling and impaired grapheme-phoneme correlations, with no knowledge of phonetics, are further characteristics that are mentioned. Hence, the aforementioned observations define the basis for teachers assessing pupils experiencing dyslexia (Jones & Kindersley, 2013).

Peculiarities that are observed early on may be gathered from parents through interviews or general discussion. These may include the late development of syllables, difficulties in memorising, poor rhyme detection and low-level speech patterns. They can be further coordinated with late and difficult learning in activities, like cycling and self-help skills, such as dressing unaided. These difficulties worsen with age, as they are required to be fully developed when a child starts secondary school (Jones & Kindersley, 2013). In contrast to the above, behavioural theory is related to the various processing difficulties of an individual.

All the theories discussed account for at least some of the symptoms of dyslexia and are true of different individuals. Consequently, the learning difficulties caused by phonological, auditory/visual, or cerebellar deficit could partially overlap. Further

developments in theory are required to study the brain and the development of language skills to help ascertain the information required for identifying children with dyslexia and designing early intervention programmes.

3.3.4 What do Academics Agree on and Where Are the Differences?

There is wide consensus that dyslexia is underpinned by differences in the brain, leading to variations in how the information relayed by the senses to the brain is cognitively processed. For instance, someone suffering from dyslexia may face difficulties in processing such information, to a greater or lesser degree. In terms of reading and writing, these differences can lead to a learning disability. Research on the magnocellular system has resulted in some agreement that dyslexia may be caused by a more general cognitive deficit in timing. It is possible that this will affect all brain functions, including visual, phonological and kinetic functions.

There is agreement among some researchers that there may be physiological grounds for cases of dyslexia and as a result, MRI brain imaging techniques would be useful for consideration in future (Vandermosten et al., 2012). Although there are many potential underlying causes and difficulties associated with phonological processing is the best understood cause for dyslexia, neuroimaging methods are also significantly contributing to knowledge about the neurobiology of dyslexia (Norton et al., 2015).

There are various angles from which difficulties at cognitive level are explained by neurological variation. One view is that individuals with dyslexia may have deficits in different areas of the brain. For some theorists, the main focus is on addressing problems of phonological processing and speech difficulties, with regard to reading, spelling and naming, alongside other phonological functions. On the other hand, some researchers highlight the occurrence of difficulties with processing and a 'syndrome', often resulting from attempts at analysis, of symptoms occurring at behavioural level; for example, the work of Miles (1993). In more recent times, the phonological deficit hypothesis has become the basis of agreement amongst the majority of researchers in the field of dyslexia (Snowling, 2000; Vellutino et al., 2004). However, some claim that individuals currently suffering from dyslexia face difficulties across a broad spectrum, including visual processing deficits (Vellutino et al., 2004; Chouake et al., 2012). In fact, some would argue that difficulties with visual processing have greater significance than phonological problems.

More often, it is stated that phonological dyslexia and surface dyslexia are two types of dyslexia which are acquired. Those who suffer from phonological dyslexia may find it difficult to decipher words, while those with surface dyslexia may experience difficulty in recognising visual vocabulary. Nevertheless, Miles and Miles (1999) disagree with the notion that the same sub-type will automatically persist throughout every stage of a person's life. As suggested by several researchers, for example, Ellis (1993), the perceived differences involve individual compensatory approaches, rather than variations in underlying impairment. According to Fawcett and Nicholson (2001), it is predicted that subtypes of dyslexia may be due to inability or fundamental differences in brain function. It is therefore possible that future research will unveil magnocellular, cerebellum and other mixed sub-types; each linked with a different set of skills. In further research, the impact of magnocellular and cerebellum systems on sub-types will be highlighted.

At the same time, educators should be very sensitive when dealing with different approaches to dyslexia - some of which may be more complicated than others. It is worth highlighting the importance of avoiding looking at dyslexia as merely representing difficulty with reading and writing. It must also be understood, for example, that aspects of motor and organisational skills may be affected. Moreover, the view that individuals with dyslexia have a gifted side is an ongoing bone of contention. A great deal of research has been carried out on the weaknesses produced by dyslexia, but studies on their strengths are still few and far between, with a number of these drawing upon personal histories (Rack et al, 2007; Everatt et al., 2008; Glazzard, 2012). However, this approach could be seen as very positive, because it involves listening to the voices of those directly involved. On the other hand, more research may be necessary to generate overwhelming evidence proving there is a strong and stable relationship between dyslexia and creative visual thinking, in order to support the idea that the brains of individuals with dyslexia merely function differently.

Studies have in fact shown that although the brains of non-dyslexics tend not to be symmetrical (being larger on the left), the brains of individuals with dyslexia may show some symmetry, because the right hemisphere endeavours to compensate for the skills deficit in reading. Therefore, there may be significant development in parts of the brain which control, for example, visual and spatial skills, which do not depend on language. In fact, this is particularly relevant to visual and spatial skills (Krupska & Klein, 1995). Nevertheless, the assumption that learners with a tendency to process information in the right hemisphere of the brain will have better visual skills is yet to be conclusively proven.

The above debate would be significantly enhanced by further research on the magnocellular and parvocellular systems of persons with dyslexia (Stein, 2001); even though some critics believe that the strengths of such individuals may be due to environmental influences. The early failure of children with dyslexia in school may force them to look for opportunities to achieve success in other areas, while literacy problems may lead them to find unconventional ways and thinking strategies to deal with their difficulties. Artistic gifts can be distributed evenly among the population, but it seems more pronounced among individuals with dyslexia, as their creativity is confined to non-verbal areas. It is important to mention that no two persons with dyslexia are the same and there is no evidence that all individuals who suffer from dyslexia exhibit the same qualities.

According to the definition applied, estimates of dyslexia occurrence will vary. It has been found by some that there are more male than female dyslexia sufferers, although this can be challenged, given that different criteria have been used across such studies (Miles & Miles, 1999). It may also be stated that dyslexia affects both sexes equally, but if there are fewer or no females identified, it could be because women compensate for the deficits more than men, due to differences in the way they process language. There are still other researchers who claim that in general, girls tend to seek less attention than their peers of the opposite sex and are therefore more likely to have their problems overlooked at school (Riddick, 2006).

3.4 Characteristics of Dyslexia

According to Rose (2009a), there are major characteristics which can help with the identification of persons with dyslexia, however this may not be so easy to ascertain in children, which makes it a complex problem.

3.4.1 Primary Characteristics

Individuals with dyslexia frequently find it difficult to read, express concepts clearly, or fully comprehend what others say. However, there are three factors which can determine the presence of dyslexia. These are: memory, visual processing and auditory processing. According to Vellutino et al. (2004) one of the primary characteristics of dyslexia consist of phonological coding deficits; for example establishing patterns of linguistic similarities, differentiating letters, remembering sound (phoneme)-letter (grapheme) correspondences, or spelling words. Other major issues include problems in visual attention, or syntactic, perceptual, general language or verbal and visual memory processing (Siegel, 2006). But

there is no evidence to suggest that these characteristics are found in all individuals with dyslexia. In a recent study, Araujo et al. (2010) provide empirical evidence that phonological processing is the key to the acquisition of reading skills. According to Ramus et al. (2003) individuals with dyslexia are unable to process the phonological structure underlying a word when reading. There is other evidence of dyslexics performing below average in tasks that require phonological skills (Ramus et al., 2003; Shaywitz, 2003).

3.4.2 Secondary Characteristics

Reading is said to be a secondary issue regarding dyslexia. Children with dyslexia have issues with reading words and understanding them, according to Lundberg and Hoien (2000). They also have trouble with learning and comprehending (Bell et al., 2011). Studies on individuals with acquired dyslexia show that they have problems paying attention to certain tasks, probably due to a lack of comprehension of the tasks given to them, as a result of aggravation or fatigue (Davis et al., 2001). Often, individuals with dyslexia also have ADHD or ADD (Pauc, 2005). This was further investigated by Dhar et al. (2010) and the research showed that many individuals with dyslexia did indeed also suffer from ADHD, but it is not a fact that they are always present together or that one cannot occur without the other. However, children with ADHD in addition to dyslexia show unusually poor mental capabilities compared to those with dyslexia only (Dhar et al., 2010).

3.5 Dyslexia Diagnosis and Treatment

The main symptoms of dyslexia are revealed through reading (for example: reduced reading speed and a failure to associate individual letters with their corresponding sounds) and spelling (for example, spelling words incorrectly and limited vocabulary). These two disorders can occur concurrently (Schulte-Körne, 2010). However, the diagnosis of dyslexia is complex; although individuals with poor reading abilities may have several symptoms, it is not entirely clear which of these are necessary for diagnosing dyslexia (Elliott & Grigorenko, 2014).

There is evidence to suggest that early diagnosis is required to identify the symptoms of dyslexia (Woodcock et al., 2001; Fuchs & Fuchs, 2006). In order to provide appropriate help for learners, it is crucial to detect dyslexia and other learning difficulties as early as possible. Such a diagnosis may also need to measure speed, accuracy and comprehension when reading. Moreover, a child's reading and spelling performance must be poor when a

diagnosis is being made (Schulte-Körne, 2010). Psychometric tests are amongst the assessment tools considered useful for identifying the strengths and weaknesses of a student across various areas. In addition, they can be used in formulating individual intervention strategies to target any areas of weakness identified (Singleton, 2009).

Dyslexia is generally identified in pupils during the early years of primary school, if problems with reading and writing are observed, in excess of those normally encountered at this stage. Early identification of this nature should permit intervention before the child concerned begins demonstrating signs of poor learning, low self-esteem or reduced motivation (Snowling, 2013).

Specific tests have been designed for formal cognitive evaluation. These standardised intelligence tests will help assess children's intelligence, especially between the ages of six and 16; for example, the Wechsler Intelligence Test for Children (Wechsler, 2004); the Phonological Abilities Test (Muter et al., 1997); the Dyslexia Screening Test (DST); the Dyslexia Early Screening Test (DEST) (Nicolson & Fawcett, 1996); the Woodcock Johnson II, to test cognitive abilities and achievement (Woodcock et al., 2001), and the Cognitive Profiling System (Singleton, 1997). It is also recommended to administer such tests early in the day to ensure fair results, given that it is during this part of the day that a child's performance is normally at its peak (Schulte-Körne, 2010). Regardless of this, it must be emphasised that screening tests do not measure a child's overall reading performance. The aim of such assessment procedures is rather to quantify children's skills in a number of areas that have already been demonstrated as a critical foundation for overall reading success; for example, phonological awareness and fluency.

In the first instance, treatment will consist of identifying the specific disorder and providing advice for parents, as well as teachers, if applicable (Schulte-Körne, 2010). Subsequent treatment will then be based on the seriousness of the dyslexia and psychological problems, or associated disorders. In this respect, drug treatment has no benefits for dyslexia. On the other hand, information about the disorder, advice for parents and an explanation of the respective child's psychological stress can help teachers work towards better integration of the child at school (Schulte-Körne, 2010). In any dyslexia treatment, core problems with reading and spelling should be addressed, as well as the treatment of concurrent psychological disorders, should they be present (Schulte-Körne, 2010).

However, early detection alone (as discussed above) will not improve literacy levels, unless appropriate early intervention is carried out before such reading problems become

more deeply embedded (Whiteley et al., 2002; Speece et al., 2003; Velluntino et al., 2004; Fuchs & Fuchs, 2006). A good starting point for developing an appropriate intervention is to try and get to the root cause of the disorder (Snowling, 2013). This may require regular reading, as well as support with spelling.

3.6 Dyslexia and Self-esteem/Self-concept

Socio-cultural theory claims that an individual's sense of identity is inevitably dependent on what society/culture values. In modern societies, where literacy is a valued skill, an apparent inability to acquire it is likely to have an adverse implication on any individual's self-concept. This may be because of 'learned helplessness', or the state that children with learning difficulties can fall into (Reid et al., 2013). They fear that they will not succeed and will inevitably fail. It seems reasonable to assume that the self-esteem (confidence in one's own worth or abilities) and self-concept (a person's belief about himself/herself) of children who struggle with dyslexia and/or other learning difficulties may be affected. Children's intellectual and physical growth are in turn influenced by their sense of well-being, peer-acceptance and competence, affected by comparisons they may make between themselves and others, as well as the way in which they interpret other people's perceptions of them (Burden, 2008b).

3.6.1 The Relationship between Dyslexia, Self-esteem and Self-concept

Burden (2008a) reviewed research evidence from the past 20 years on the relationship between dyslexia and dimensions of self-perception, including self-esteem, self-concept, locus of control and self-efficacy. The above study reveals that although the literature does not point to any differentiation between general self-concept, global self-worth, global self-esteem and general self-esteem, there is a clear link between dyslexia and low academic self-concept. Academic self-concept is different from general self-concept as it is a collection of academic performance-related beliefs an individual has about themselves (Erten & Erten, 2014). General self-concept, on the other hand, is the belief someone may have - for example, children and adolescents with dyslexia - that they are less socially interactive, popular or valued than those without dyslexia. It is claimed that these perceptions are formed through their experiences with others in an environment. On the other hand, academic self-concept is exclusively an individual's perceived ability to learn.

Burden's (2008a) study also revealed that the association between dyslexia and low academic self-concept is not immutable and there may be a reciprocal relationship between

increasing academic self-concept and the development of literacy skills among children with SpLD. These findings are backed by Zeleke's (2004) meta-analytical study, which established that up to 89% of reviewed studies indicated that children with learning disabilities had diminished academic self-esteem, despite the fact that their global self-esteem was the same as that of the general population. A further study by Stevens (2012), determined that children's self-esteem was unaffected by their transition from primary school and despite the fact parents sometimes reported anxiety over their children's reading, routines and organisation, among other factors.

Burden's (2008a) findings are supported by Terras et al. (2009) and Snowling et al. (2007), who found no evidence of effects on global self-esteem or self-concept among children with dyslexia. However, they determined that children with dyslexia suffered deficits in self-esteem and self-concept, with regard to scholastic competence. Terras et al. (2009) argue that low academic self-esteem and self-concept stems from these children's poor psycho-social and behavioural adjustment, positive parental/peer/family attitudes and the understanding that the nature of dyslexia is correlated with self-esteem. This suggests that successful psycho-social adjustments can improve children's' self-esteem. Besides, a solid understanding of dyslexia may help them avoid some of these difficulties. However, this study offers no insight into how to promote psycho-social adjustment. Snowling et al. (2007) and Glazzard (2010) emphasise the necessary role of social support and contextual changes in bolstering psycho-social functioning, which is strongly correlated with self-esteem.

3.6.2 Effects of Dyslexia on Self-esteem and Self-concept

Glazzard (2010) sought to identify the factors that affect self-esteem, based on earlier findings, where, among other things, learning difficulties, unfair teacher treatment, bullying, difficulties with peer relationships, low social support and poor psycho-social adjustment were found to be responsible for poor levels of confidence and self-worth. The results determined that dyslexia had a negative impact on self-esteem/self-concept, with children with dyslexia attributing their success to external factors. While also confirming the sense of isolation often experienced by children with dyslexia and the positive influence of support from teachers or families, among others, it is worthy of note that Glazzard (2010) did not bring forth any new evidence than had been established by earlier studies/literature. However, Glazzard did reinforce previous findings by Burden (2005), who found that learners with dyslexia had highly positive attitudes towards learning.

Glazzard also found that all learners with dyslexia were very confident, which they attributed to the diagnosis.

Among these above-mentioned earlier studies is one by Humphrey (2001), which compares the results of student and teacher ratings for the self-esteem of children with dyslexia attending mainstream schools, a control group and another group of children with dyslexia attending special education schools. The results indicate that, while dyslexia was found to cause considerable adverse effects on self-esteem and self-concept, these were heightened among participants who attended mainstream schools, as compared to the group in the special education units. Unlike Burden (2008b), Humphrey (2001) found both global and specific deficits in self-esteem and self-concept, with children who have dyslexia reporting isolation, bullying and exclusion at school. Humphrey (2002) argues that the difficulties faced by children with dyslexia, especially in mainstream schools, have undesirable effects on their development, because they create feelings of inadequacy and can attract the perception of them as inadequate and even bullying from other children. Furthermore, Humphrey and Mullins (2002b) argue that the fact of having dyslexia exposes children to multiple factors within educational and social environments that adversely affect their psycho-social development, including reduced self-esteem and self-concept. The above study found results similar to Glazzard (2010), with regard to the tendency of children with dyslexia to attribute success to external factors, such as school support and quality of teaching, while accepting failure as resulting from internal factors; for instance, their own success in relation to learning, over which they have no control.

However, there are other studies which show little or no effect on the self-esteem or self-concept of children with dyslexia. Stevens (2012) ventures that these differences are due to the context, procedural differences in the sampling, and conceptual differences in defining and measuring constructs like self-esteem and self-concept. Stevens (2012) provides a helpful context for understanding the widely varied and mostly conflicting empirical findings. The above researcher asserts that special learning environments cannot avoid contributing to the sense of inadequacy experienced by children with dyslexia, because they will only compare themselves to similarly challenged children. The respective study found that the learners required adequate support to build resilience. On the other hand, Stevens' (2012) findings indicate that children with dyslexia do not necessarily have low academic self-esteem, which is contrary to Burden's (2008a) findings, which indicate that children with dyslexia exhibit reduced academic self-esteem, while their global self-esteem remains unaffected. The reason why learners with dyslexia

are not as resilient and tend to have lower self-esteem/self-concept is because they feel that they lack competence, which is an internal factor. On the other hand, learners without dyslexia are more likely to take responsibility for their actions, even if they fail. They therefore tend to accept the fact that they did not make the effort to do well in a subject and in so doing, protect their self-concept. This demonstrates that learners without dyslexia are more resilient and since children with dyslexia do not often have such strong self-esteem/self-concept, provision must consequently be made to strengthen their resilience.

Most of the literature shows a negative relationship between dyslexia and both self-esteem and self-concept. Furthermore, Humphrey (2001), Snowling et al. (2007) and Terras et al. (2009), among others, emphasise the importance of psycho-social support. Besides, some of the difficulties experienced by children with dyslexia stem from their poor psycho-social adjustment, bullying, lack of peer acceptance and low level of support from teachers and family. Humphrey (2001) and other researchers hold that the problem of self-esteem for children with dyslexia is particularly widespread in mainstream schools, as compared to special education schools and this is worth noting. These studies were carried out within Western culture, where schools address learning difficulties through early diagnosis and intervention, and place children in special, as opposed to mainstream schools, with support for their psychosocial development.

3.6.3 The Impact of Early Intervention and role of parents in supporting Pupils with SpLD (Dyslexia)

There are practical and other challenges that impede early diagnosis and/or intervention. Reid (2011) points to some of these difficulties through his review of multiple studies. They include the fact that dyslexia diagnosis often occurs only after a child has been taught for some time and has consistently failed. Failure results in the associated frustration, loss of motivation, anti-social behaviour and other factors that hurt their self-esteem.

Humphrey (2001) does, however, recommend early intervention, including equipping children with coping skills, as well as with a supportive social/educational environment and special school placement. More specifically, Humphrey (2001) recommends creating a more dyslexia-friendly environment by making changes to the role of peers. This can be achieved by improving interactive learning, as well as developing the school environment and teachers. It could involve programmes for enhancing self-esteem, early diagnosis and

the provision of multi-sensory instruction programmes, specially designed for children in mainstream schools.

Zakopoulou et al. (2011) conducted three separate studies in Greece that clarified the causal model for dyslexia occurrence (including psychomotor ability, phonological awareness, memory, perception and pre-reading skills). The aim was to develop a tool for identifying the characteristics of dyslexia. The study also aimed to remedy early dyslexic symptoms; for instance, in the acquisition of reading and writing mechanisms and it examined the involvement of neurological diseases in the manifestation of dyslexia. The findings indicate that early diagnosis and the understanding and multifactor intervention of specific dysfunctions associated with developmental dysfunction, especially at pre-school age, facilitates the early and effective prevention of subsequent difficulties. However, this study does not speak of dyslexia-related self-esteem and self-concept, but has only been included in this review due to the assumption that, if dyslexia can be remedied, so can its associated effects.

There is a debate on how best to provide early interventions or provide additional instructional resources for children with SpLD. Currently, structured phonics techniques are recommended by proponents of phonics-based reading instruction, to help struggling readers overcome their reading impairments, rather than the primary use of whole-language approaches (Buckingham et al., 2013). The above authors suggest that instead of teaching young children to read and spell words by decoding them based on their spellings, children should be taught to read by recognising words as whole pieces of language. In other words, language should not be broken down into letters and combinations of letters and 'decoded'. It is recommended that a balanced literacy approach should be used to combine phonics and whole language into one curriculum (Maddox & Feng, 2013).

There is the common assumption that two individuals with dyslexia have the same range of difficulties. It is slowly dawning on researchers and clinicians that this SpLD is not a single homogeneous deficit (Snowling & Hulme, 2012). In fact, teachers and other practitioners are diagnosing children through the recognition of difficulties in a range of cognitive skills, using the discrepancy model. The IQ-reading discrepancy that leads to the aptitude-achievement discrepancy formula often locks children out of special education classes (Reid, 2016). Parents of children with dyslexia prefer the discrepancy-based label, as they will feel rest-assured that their child does not lack intelligence, even though he or she may be a poor reader (Elliot & Grigorenko, 2014).

In addition to the above, Elliot and Grigorenko (2014) argue that the term 'dyslexia' does not clearly define the condition. They therefore hold that it is not enough to identify whether a child has the ability to phonologically process sounds in words, or whether they have other unexplained language-related problems. The suggestion is that the SpLD is caused by biological factors and as such, cannot be treated exclusively through instructional practices in the classroom. Elliot and Grigorenko (2014) point out that merely identifying the problem cannot inform appropriately tailored forms of intervention, call for more scientifically and professionally sound approaches, or demand evidence-based interventions to address this SpLD. However, they are of the opinion that the use of dyslexia label to describe the deficits underpinning reading difficulty needs to put to an end. They also highlight the need for assessment for intervention, rather than assessment for diagnosis.

3.7 Dyslexia in Languages Other than English

The defining characteristics of dyslexia vary as a function of language. For example, while children learning to read in a deep orthography like English may show difficulties mapping letters onto sound, children learning a shallow orthography (for example Finnish) demonstrate difficulties with fluency (Seymour et al., 2003). The linguistic characteristics of Arabic are different from those of many other languages, especially English. It is therefore essential to understand these features, in order to be able to recognise the effects of dyslexia amongst children in Arabic-speaking countries. In the following paragraphs, an overview of the Arabic language is presented, including its orthography, morphology and phonology, and any similarities it may share with English. Furthermore, the field of developmental dyslexia in the Arab world is discussed.

3.7.1 The Arabic Language: A General Overview

Arabic is a major world language (Katzner, 2002) and constitutes one of the world's six official languages recognised by the UN. It is spoken by around 400 million native speakers and is the official language of 22 countries in the world. To be more precise, it is widely spoken in the Middle East and North Africa (MENA) region, encompassing all nations in the Arabian Peninsula (Saudi Arabia, Kuwait, Jordan, Qatar, the United Arab Emirates (UAE), Iraq, Lebanon, etc.), as well as countries in North Africa (Tunisia, Morocco, Egypt, Algeria, etc.). It is also argued that the Arabic script is the second most widely used in the world, as it is associated with Islam and the Quran (Thackston, 1994; Almaazmi, 2013).

Moreover, the Arabic script and some words have been adopted for use in other languages, such as Urdu, Balouchi, Pashto and Pharsi.

The Arabic language has developed over the course of centuries and has undergone some changes from an etymological and phonetic perspective (Suleiman, 2006). Various tribes and communities within the Arab world have transformed the way the language is used in different circumstances, which has led to the general perception that the language manifests diglossia, or a situation in which two different varieties of the language are spoken (Mahfoudhi et al., 2009). Diglossia is shaped by social-cultural historical factors that influence the way a language is either spoken or written (Farran et al., 2012). It indicates a sociolinguistic aspect, whereby different variations of a language are used for formal (official) and informal purposes (Saiegh-Hadded, 2012). The Arabic language comprises four varieties: classical, Modern Standard Arabic (MSA), national dialects and local dialects. Classical Arabic or Quranic Arabic is an exclusive form and only used in religious texts (Sallourm, 2003). MSA is a formal variation of Arabic used by the news media and for educational purposes (for example: academic texts, journals and related publications). It is argued that MSA is crucial for reading (Elbeheri et al., 2009). National dialects, which display distinct pronunciation and vocabulary particular to a nation, are forms of Arabic also used in the film and television industry. Conversely, local or colloquial dialects are variations on the language specific to certain tribes or communities in regional and domestic settings; for example, the Bedouin dialect. These are used informally in everyday or familiar dialogue and exchanges.

3.7.2 Arabic Script and Orthography

The Arabic script is an 'Abjad Hawaz' script, which evolved from the Nabataean and Aramaic scripts. Arabic is consequently categorised as a Semitic language that has existed since the seventh century AD. The script is read from right to the left and consists of 28 letters.

In fact, there are two types of script which comprise Arabic: 'Naskh' and 'Riqa'. 'Naskh' indicates 'copying' or 'replicating'. It is very commonly used, especially in school textbooks. On the other hand, it tends to regarded as a script that is time-consuming and difficult. The most commonly used script it therefore 'Riqa', since it is clearer and takes less time to write (by imposing letters on top of each other) (Almaazmi, 2013).

Although the Arabic script is used extensively around the world, it is not without its limitations. For example, its orthography has diacritical markings; in other words, it consists of short vowels which are represented by symbols. The use of symbols adds stress to letters and therefore changes the way words are pronounced. This is evident in poetry, the Quran and textbooks. However, there are also vowels without diacritical markings (see Table 3.1, below).

Table 3.1. Examples of Arabic orthographic representation with and without vowel diacritics

With vowel diacritics	Without vowel diacritics	Pronunciation	Meaning in English
كَتَبَ	كتب	Kataba	'he wrote'
كُتِبَ	كتب	Kutiba	'it was written'
كُتُبٌ	كتب	Kutubun	'books'

The Arabic script appears to be in long-hand, as the letters are joined via thongs, for example 'ay' and 'ow'. Most of the alphabet, i.e. 22 out of the 28 letters are connectors, which link both the preceding and succeeding letters (Almaazmi, 2013).

Orthography is a term indicating a conventional spelling system. It includes rules about how marks are used in a language (for example, the use of punctuation to create sense and clarity in sentences, use of capital letters) (Badian, 2001), while orthographic processing is the ability of an individual's brain to form words, remember information and retrieve it for later use (Stanovich & West, 1989). In Arabic, the two commonest forms of orthography are 'deep' and 'shallow'. For example, the presence of diacritic marks clearly indicates that Arabic is a deep language. These marks help the reader to understand and articulate the language properly. The reader will thus also understand how the words are organised and will consequently make sense of what they read or hear. On the other hand, because some written words have diverse meanings, Arabic is also considered as a shallow language. This is due to a morphological process, whereby word stems can be modified so that they fit the syntactic and communicative context (Khemakhem et al., 2013). Nevertheless, it is precisely this characteristic that renders the language difficult to read, as a substantial amount of morphological information is required by the reader to be able to break words down into parts which can be understood according to their exact meaning. In children with dyslexia, the disadvantages of this feature are even more pronounced (Mannai & Everatt, 2005). As a result, the Arabic script and its orthography can be very challenging for such children. This includes its cursive nature, the Nashk and Riqa scripts

and potential misinterpretation of the non-connecting letters (six out of the 28 letters in the alphabet).

3.7.3 Arabic Phonemes and Morphology

In terms of phonetics, Arabic has what could be described as one of the world's most phonetic alphabets. It is a 28-letter alphabet, consisting of 34 phonemes, 17 characters and dots. These dots are significant according to their number (from one to three) and position (whether above or below the letter). Moreover, phonemes in Arabic can be best defined in terms of where they are produced and uttered in the mouth (Almaazmi, 2013).

Morphology involves identifying, analysing and describing the structure of the significant parts of a language, known as morphemes. Most notably, Arabic is characterised by its system of consonantal roots, typical of Semitic languages. This comprises root vocalisation, prefixes, suffixes and in-fixes and the grammar in Arabic is based exclusively on this root system, which is primarily made up of consonants. Here, the semantic core of the Arabic word in fact constitutes the root and so the morphology of Arabic is highly complex, but dynamic, with the meanings of words being affected by the way the language is used (Smythe & Everatt, 2000). As a result, Arabic morphology is more methodical than English. However, the dots used in Arabic can prove to be an additional challenge for individuals with dyslexia, in that they are less able to separate graphemes. Morphological awareness thus becomes essential in the development of skills to understand a written text. What may also be necessary are assessments, which take into account signs indicators of morphological ability.

3.7.4 Similarities between Arabic and English

The English and Arabic alphabets and symbols are very different from each other and this is partly due to the transparency between letters, symbols and sounds represented by the characters (Mannai & Everatt, 2005). Nevertheless, similarities may also be found between the two languages, such as linguistic parallels and similarities in writing. For example, the alphabetic spelling system in each language constitutes typical sets of letters, that signify specific sounds. In addition, both languages contain consonants and vowels, while in some words, they may have more than one function. This can be seen in English where the letter /c/ is mostly pronounced as a /k/ sound, for example, in the word 'cup', 'c' is pronounced as /kap/ rather than /kup/, since a hard 'c' is pronounced more like 'ka'. In the two

languages, cursive writing (Arabic), joint or connected writing (English) are also used (Almaazmi, 2013).

Many Arabic sounds exist in English language and vice versa, but there are exceptions (Almaazmi, 2013). The sounds which exist in both languages are shown in Table 3.2, below. The English sounds which are not found in Arabic are associated with the English letters, 'v', 'g' and 'p', which are represented as 'f' (v), 'j' (g) and 'b' (p) in Arabic.

Table 3.2. Similar sounds in Arabic and English

Arabic	English	Pronunciation
ب (ba)	B	Baby
ز (zay)	Z	Zebra
م (ma)	M	Muster
ن (na)	N	Napping
ف (fa)	F	Fabulous
ج (ja)	J	Jest
ل (laam)	L	Lampoon
ر (rolled r)	R	Roar
ث (tha)	'th'	Thrust
ذ (dha)	'th' voiced as 'dh'	That, Their
ش (hins)	'sh'	Shoe, Shroud
س (sin)	S	Sop, Sob
ة (ta marbuta)	T	
Silent- Modern Arabic		Table, Torch
Ta – Classical Arabic		
ي (ya)	Consonant- y	Consonant – yell
	Vowel – ee	Vowel - bee

Similar to Arabic, the English language has letters with diacritical marks and guides to facilitate accurate and unambiguous reading. These letters/words were borrowed from other languages, such as French; for example, exposé, résumé or café, where the 'e' at the end of these words is stressed, rather than being silent, which is normally the case.

Finally, a further similarity between the two languages is the commonality of predictors for the development of literacy skills (Mannai & Everatt, 2005). These are related to the cognitive and socio-cultural factors forming the foundations for teaching literacy.

3.7.5 Developmental Dyslexia and Arabic

Developmental dyslexia is not language-independent (Elbeheri & Everatt, 2007; Al-Ghizzi, 2015). There are more individuals with dyslexia in the Arab world than in Western countries, and developmental dyslexia is very predominant in Arab countries (UNDP, 2012). The reason for this situation is that the Arabic language poses a challenge to those affected and causes difficulties in language processing (Al-Ghizzi, 2015). Arabic therefore

presents special difficulties for children with dyslexia, because they cannot easily make letter-sound correspondence and tend to make spelling errors. These difficulties are caused by the omission of a single phoneme. Furthermore, diglossia, which manifests itself in Arabic, can hinder learning, especially with regard to reading and writing (Saiegh-Haddad, 2005). It is therefore important to develop Arabic intervention programmes, especially considering the fact that most letters in Arabic have more than one written form (Aboras et al., 2012).

Nevertheless, in Arabic-speaking countries, there has been very little research into developmental dyslexia and so not much is demonstrated concerning the assessment of the learning difficulty (Elbeheri et al., 2006). Compounding the issue is the dearth of trained professionals and specialist services for the diagnosis and support of individuals with dyslexia. Consequently, the majority of the evaluation methods, approaches to mediation and types of support, along with relevant policy, come from research in Western countries. As a result, there is little awareness of developmental dyslexia in the context and very little understanding of the specific difficulties related to the acquisition of reading and literacy skills in Arab countries or I relation to the Arabic language.

It can therefore be deduced that appropriate evaluation, identification, intervention and support for dyslexia, especially designed with the socio-cultural needs of the population in mind are as yet relatively undeveloped in the Arab world (Elbeheri, 2009, 2006). It is consequently very difficult to assess dyslexia as the manifestation of a learning disability in an Arabic speaker. As mentioned above, the shortage of trained professionals and services offering diagnosis and support for individuals with dyslexia also contribute to the widespread poor understanding of developmental dyslexia and difficulties in reading and literacy acquisition in the Arab world.

However, there has been a certain amount of recent research on dyslexia in the Arabic context to corroborate findings derived from Western research as regards its occurrence and causes (Al-Wabil & Al-Sheaha, 2010; Al-Ghizzi, 2015). Phonological processing skills were previously been held as predictors of dyslexia (Abu Rabia et al., 2003; Saiegh-Hadded, 2005; Elbeheri & Everatt, 2007; Hamdan & Amayreh, 2007; Elbeheri et al., 2009) and there are studies which claim phonological awareness to be indicative of dyslexia in Arabic countries. Moreover, this awareness is believed to be the key to literacy development, although there are other scholars who claim that problems with words and homonyms indicate difficulties in reading and writing in Arabic (Abu Rabia et al., 2003;

Mannai & Everatt, 2005; Elbeheri & Everatt, 2007; Hamdan & Amayreh, 2007; Elbeheri et al., 2009).

The main problem in most Arab countries is that education systems are more geared towards typically developing learners, but do not cater for the needs of those with learning disabilities, such as dyslexia. As a result, Arabic-speaking persons with dyslexia tend not to receive adequate support and intervention. It is largely due to high numbers of expatriates coming to live and work in the Arabian Gulf that awareness of this phenomenon has increased, given the more extensive knowledge of learning disabilities and developmental dyslexia in other countries. Such knowledge is currently becoming more common amongst educators, pupils, parents and policy-makers and has given rise to more research on developmental dyslexia in Arabic (for example: Abu Rabia et al., 2003; Saiegh-Hadded, 2005; Mannai & Everatt, 2005; Hamdan & Amayreh, 2007; Elbeheri & Everatt, 2007; Elbeheri et al., 2009). In addition, some specialised institutions have been established for the proper identification, diagnosis and support of persons with dyslexia, even though most of the assessment and intervention taking place are conducted in English by expatriates. What therefore emerges is the pressing need for dyslexia identification within the context of the Arabic language and culture and for more frequent methodological research to isolate parallels and differences from country to country and between languages, so that strategies for diagnosis can be developed that will correspond to the respective cultures and languages (Smythe & Everatt, 2000).

3.8 Early Interventions

Early intervention is only possible if dyslexic difficulties are identified early; not only through screening tests (although these are reliable), but also by closely observing and assessing early reading ability; matching the abilities of children who may have dyslexia with typically developing learners (Rose, 2009a). While dyslexia cannot be cured, early identification and suitable interventions can improve the educational outcomes for pupils with dyslexia.

Early intervention may generally be defined as:

> Intervening early and as soon as possible to tackle problems emerging for children, young people and their families or with a population most at risk of developing problems. Effective intervention may occur at any point in a child or young person's life. (C4EO expert group, 2010, p.2)

Early intervention or early prevention is a paradigm referring to better access to the early stages of development of a potential disorder, not only by providing additional support, but also securing good outcomes for all individuals (McCrory et al., 2008). It involves a shift in thinking from pessimism to optimism and will reflect a willingness to invest in young children, while providing specialist intervention and support services, identifying disabilities and using preventive measures to help them and their families take charge of their lives (Shonkoff & Meisels, 2000; McGorry et al., 2008). The quality of the services provided early in a child's life will not only have a strong influence on his or her early development, but will continue to have an effect in adulthood (Shonkoff & Meisels, 2000; McCain & Mustard, 2002).

Personalised learning (one-to-one instruction) is an effective intervention, through which curricula and teaching methods may be tailored to meet children's individual needs and to accelerate their learning pace, so that it matches that of their peers (Rose, 2009a). Research indicates that individuals with dyslexia learn differently in comparison to non-dyslexics (Mortimore, 2005, 2008). This suggests that early intervention for dyslexia must also consider the way the child learns, teaching phonological and phonemic awareness, and multi-sensory intervention, which concentrates on phonological awareness. Exley's (2003) study, which examined the way children with dyslexia learn, found that the learner's preferences not only enabled them to perform better, but also to feel better about themselves. The study shows that dyslexia in learners is associated with preference for a specific sensory learning style. The findings from Exley's study illustrate how flexible learning approaches, such as multi-sensory learning opportunities can meet the needs of pupils with dyslexia. Multi-sensory learning, or the use of different sensory pathways (such as using drawings, audio-visual imagery, discussions, listening, or touch - also known as kinaesthetic-tactile learning) can improve recollection of concepts and learning (Exley, 2003; Kelly & Phillips, 2016).

In the US, a widely used approach is the 'Response to Intervention' (RTI). This approach, involves the systematic monitoring of the development of pupils with dyslexia through a programme of intervention, rather than assessing their existing skills (Justice, 2006). Pupils who cannot learn or respond to effective teaching may easily be diagnosed in this way. By adopting this approach, the needs of a child with dyslexia can be identified early, so that appropriate support can be provided as soon as they appear to lag behind (Snowling, 2013). It is an approach that enables teachers and schools to better organise themselves, in order to provide early reading interventions for children with dyslexia. This will then reduce risk

and improve reading outcomes (Justice, 2006). RTI is a prevention model consisting of various levels of reading intervention applied to children with dyslexia, based on their individual needs (Fletcher et al., 2006). It involves several stages, which may be effective for comparing differences between slow learners and those who are capable in their reading development (Fuchs et al., 2002; Speece et al., 2003; Vaughn et al., 2003). Research has shown that RTI can help prevent the reading difficulties of most pupils with dyslexia (for example, Vellutino et al., 2006).

3.8.1 Effects of Early Intervention

Research has shown that learners who acquire oral language skills very early at school can attain educational success and will be able to develop reading comprehension at a later stage (Fricke et al., 2013). However, studies have also found that there can be real improvement in reading, phonological awareness and language skills, if early interventions incorporate training in reading, phonological awareness and vocabulary (Bowyer-Crane et al., 2008; Duff et al., 2008). However, the findings from Duff et al.'s (2008) study, which examines eight year old children, suggest that ongoing remediation is required to alleviate reading difficulties. These findings corroborate results from earlier studies, such as Hatcher et al. (2006a) and Vadasy et al. (2000).

Outdated early literacy intervention programmes would last between eight and 12 weeks, and the commonest approach was to directly or indirectly teach phonological awareness and word-decoding skills (Lovett et al., 2000). More recent research (Duff et al., 2014) recommends that reading and language intervention for young children (around age six) should be sustained for long enough to yield improvements. The above study used a Reading and Language Intervention (RALI), specially devised by the authors for a nine-week period, but there was no marked improvement in the children in comparison to their peers. Previous research has shown that the longer the interventions, the more significant the effects (for instance, Hatcher et al., 2006a, 2006b). These studies are discussed in the sections below.

3.8.2 Effects of Delayed Intervention

Dyslexia is an SpLD, which is present in an individual from a young age, but with early assessment, detection and intervention, the learning difficulties faced can be reduced (Fletcher, 2009; Reid, 2011). It may therefore be assumed that delayed assessment can result in delayed intervention. One of the reasons for delayed assessment and intervention

is due to a failure to recognise, or a lack of awareness of the signs of dyslexia on the part of teachers (Katz, 2001). However, the success of early intervention can be heightened, but only if a clear profile of the child's difficulties and strengths is available (Reid, 2016).

Interventions that are delayed or even denied learners with dyslexia can have adverse long-term effects and the individuals concerned may fail to develop adequate reading skills and perform well academically. However, when appropriate educational interventions are implemented for pupils at a very early stage in their lives, fewer long-term reading problems are encountered than is the case with those receiving support later on (Wadlington & Wadlington, 2005). Based on previous research, it is evident that a delay in intervention - for example, beyond third grade or nine years of age - will lead to most children with dyslexia continuing to experience reading difficulties, even throughout high school (Shaywitz, 2003; Handler & Fierson, 2011). Intervention is linked with early identification and assessment and any delay in the process can seriously affect pupils, due to the fact that the brain's rapid growth and responsiveness to instruction during the period from birth to the age of eight mean that the primary school years are critical for literacy development (Nevills & Wolfe, 2008).

3.8.3 Obstacles and Barriers that could prevent the Implementation of Early Intervention in Primary Schools

3.8.3.1 The Curriculum and Lessons

As with Kuwait, the UK's national curriculum consists of four key phases: Key Stage 1 (age 5-7 years); Key Stage 2 (age 7-11); Key Stage 3 (age 11-14), and Key Stage 4 (age 14-17) (Harlen, 2014). However, younger children can also attend pre-school up to the age of five. The UK National Curriculum was reviewed because of the challenges it posed for learners; for example, a structured but overloaded curriculum and the lack of flexibility for schools to meet learners' individual needs and build on their prior learning (Rose, 2009a; Wilson, 2014). Similarly, the school curriculum in Kuwait was reviewed, with changes being made in light of the reform initiatives, as the curricular materials were not research-based and did not follow basic multi-sensory language principles for English language learning (Hook & Haynes, 2009; Haynes & Mahfoudhi, 2009). The intention was to develop a curriculum which would be suitable for pupils with learning difficulties. A prolonged, unstimulating and wearying curriculum can have an adverse effect on children, as they are obliged to memorise everything they are taught. Pupils with dyslexia also have difficulty remembering spoken sounds for very long, due to their poor auditory short-term

memory. In fact, pupils with poor auditory short-term memory very often cannot even remember a short list of instructions (Hodge, 2000). Teachers interviewed by a newspaper in the UK claimed that pupils often fail to absorb the necessary background knowledge on a topic (Garner, 2014).

The school day at primary school in the UK starts at around 9.00 am and finishes around 3.15 pm, with an extensive programme of lessons, sports and activities. However, it is claimed that almost all schools exceed the recommended minimum school day (Rose, 2009b). An arduous curriculum and long lesson duration can result in stress for pupils with dyslexia. This claim has been elaborated on by Hodge (2000), who states that pupils with dyslexia can suffer a great deal of anguish and trauma in such learning environments.

3.8.3.2 The Effects of Class Size

The size of a class is an important factor in pupils' learning, as smaller classes permit better quality teaching (Elias, 2014). Most learners with dyslexia need individualised teaching and support (for example, one-to-one teaching or small groups), so they can learn at their own pace. Therefore, smaller class sizes are recommended (International Dyslexia Association, 2013). Elias (2014), who examined teachers in mainstream schools in New Zealand, found that teachers did not favour large classes, as they perceived these as impinging on the time that could be spent on individual children. The above study found that large class sizes can have a negative impact on academic achievement, as teachers may not be able to best support pupils with dyslexia. This will also affect learning. In short, larger classes can impact on a teacher's capacity to assist learners with dyslexia, who continually request help and need more reassurance than other pupils in mainstream classrooms (Humphrey, 2002). Humphrey (2002), who investigated teachers in the UK, found that smaller classes allowed them to better manage children who display timid behaviour. These findings suggest that smaller class sizes surely result in more attention being given to learners so that they can make progress. Similarly, in Kuwait, large classes have hampered the effective implementation of intervention strategies (UNDP, 2012).

3.8.3.3 Teacher Workload

Teachers in primary schools, especially in mainstream environments, have the arduous task of not only dealing with diverse student groups, but also with external academic therapists and the parents of pupils with SpLD (dyslexia). Rose (2009a) refers to a review of observational studies in the US, which identified several reasons why it is difficult to teach

pupils with SpLD (dyslexia); one of the key reasons being the teachers' workload, which was reported as being too high.

Research carried out in the UK (DfE, 2010, 2011) has revealed that the teaching hours of primary school teachers were not proportionate to those of secondary school teachers. While teaching hours have increased for primary classroom teachers, teachers in secondary schools have experienced a drop in their teaching hours (DfE, 2010, 2011). Meanwhile, primary school teachers do not have sufficient time for planning, preparation or assessment and it is estimated that they require at least 10% of their classroom time free for carrying out such tasks (DfE, 2010, 2011). Wilson (2002) not only found that teachers preferred smaller classes so they could encourage positive behaviour and attitudes in their pupils, but because they also experience high workload. The study also found that teachers considered smaller classes to be less stressful. The negative effect of increasing class size is that teachers find it difficult to give attention to less motivated pupils.

3.8.3.4 Lack of Support in Implementing Early Intervention - Appropriate Educational Aids and Financial Support

The availability of appropriate materials is one of the criteria for dyslexia-friendly practice, according to Mackay (2005). Learning aids in the form of both written and textual materials, Information and Communication Technologies (ICTs), and specialist software are the learning tools and teaching resources required for supporting pupils with SpLD (dyslexia) and represent the key to successful implementation of early intervention. However, it is claimed by some that parents believe it is necessary for their child to be openly recognised as dyslexic, in order for the necessary resources to be made available to facilitate the child's progress (Rose, 2009a). Financial support is therefore required for implementing early intervention, but this funding must be decentralised, so that schools can provide better support. However, in Britain, it is the Special Education Needs and Disability Division of the Department of Education and Skills which provides funding for pupils with dyslexia. In Kuwait, the International Dyslexia Association effectively engages in providing relevant information, supporting research, organising and professional development and promoting advocacy and public policy (Thomson, 2010). However, a lack of support has been identified, due to the lack of trained teachers to provide appropriate interventions for SpLD (UNDP, 2012).

3.8.3.5 Guidance for Early Intervention in a Teachers' Handbook

Handbooks are a resource for enhancing the guidance teachers seek for early intervention. This is because various explanations are offered for the causes of dyslexia and when developing an intervention, it is essential to understand these. This is therefore essential information to be included in teachers' handbooks and it must be critically reviewed to ensure its appropriateness (Snowling, 2013).

In the UK, the Driver Youth Trust has made it a priority to campaign for better training for teachers in understanding dyslexia (Dyslexia Action, 2009). This is largely due to the realisation that most pupils with SpLD (dyslexia) are typically characterised as having poor decoding and dysfluent reading skills.

The most popular methods of ensuring that teachers are informed is by translating policies into a set of practice guidelines, specifically aimed at teachers. In terms of dyslexia, there is generally a lack of guidance for early intervention in teachers' handbooks. Therefore, teachers may not be able to identify such learning difficulties (Reid et al., 2004).

3.8.3.6 Parental Involvement in Delivering Early Intervention

Parental involvement refers to the active participation of parents in a pupil's intervention programme and will involve them making decisions about this plan. Parental involvement and support is thus considered integral to the provision of support for pupils with SpLD (dyslexia) (Rose, 2009a). Studies have in fact acknowledged that parent involvement is a vital element of effective developmental intervention (Mahoney & Wiggers, 2007). Kellar-Guenther et al. (2014) examined parent involvement in early intervention services and reported that the respondents indicated the highest levels of parental involvement in the home or in a natural setting. However, parents were reluctant to get involved when the intervention was provided elsewhere, for example in childcare settings. Even at home, parents did not appear to make their presence felt, because they were often distracted by siblings, television, or household chores. These distractions are minimal in a professional childcare setting. However, parents seemed to feel that when the intervention took place in a natural setting, it improved the quality of coaching or instruction. The findings of the above study would suggest that the provision of early intervention activities in natural settings results in greater acceptance by parents.

Eakin (2006) describes some of the challenges facing parental involvement in early childhood intervention. First, some parents may not feel confident about making

suggestions or decisions over such an intervention for their child. Second, in a Culturally and Linguistically Diverse (CALD) family background, the parents are not always aware of the help available, or else may hold certain beliefs affecting their involvement in early childhood intervention programmes with their children. Moreover, in non-English speaking countries where the parents do not speak English as a second language, it may be difficult for them to access intervention (Eakin, 2006). This lack of access could be further aggravated by the parents' financial situation, in that they may not be able to afford the fees for early childhood intervention, as it is not always free of charge (Eakin, 2006). Although there are obstacles, parents have to be encouraged and empowered to continue supporting their children. If the parents do not become involved, there is a strong likelihood that the children will remain passive and show little interest in their surroundings or the people around them.

3.8.3.7 Clarity in the School Administration's Policy on Early Intervention

To gain a clearer and deeper understanding of how to accommodate and support the needs of individuals with dyslexia in mainstream education, it is necessary to appreciate the subtle changes which should be made to policy and practice. If the school's policy is to regard dyslexia as a learning deficit, based on it being a disorder, then the focus in practice will most likely be on special educational needs, remediation and teaching. School policy should rather include viewing dyslexia as a learning difference, and consequently, school practice will involve inclusion, planned intervention, differentiation and learning (British Dyslexia Association, 2005; Gaad, 2015).

School authorities are confronted by obstacles, which include concerns over the number of pupils who require support; additional training requests; the reluctance to label a pupil too early; a lack of awareness amongst staff, resulting in late identification; the lack of clarity as regards views on dyslexia; teachers failing to fully value Individual Education Programmes, the notion among teachers that they must wait for the results of student assessments, and teachers being unable to use their skills and experience in appropriate intervention, even in the absence of an assessment (Reid et al., 2004).

3.8.3.8 Increased Pressure on Teachers to Meet Specific Targets in Terms of Educational Outcomes

Teachers need to be able to understand their role in meeting the needs of pupils with SpLD. In other words, they need appropriate awareness and skills, which puts them under

considerable pressure. They are already often overloaded, as they have many other tasks to accomplish; for example continuous assessment, the development of Individualised Education Programmes, early intervention initiatives, and curriculum planning (Reid, 2005). These tasks are time-consuming in themselves, but then they are expected to assume new roles in response to intervention. Moreover, schools and teachers need to be supported as they endeavour to incorporate the latest research into teaching practice; for example, assessing learning, measuring progress over time, and evaluating the effectiveness of reading interventions (Duff & Clarke, 2011). The pressure to include learners with dyslexia in mainstream classrooms has consequently served to increase the demands placed upon teachers, leaving them in a dilemma, as they are obliged to develop new skills and seek opportunities for training. However, through the provision of training, teachers will not only be able to play a crucial role in the identification process (Rose, 2009a), but they will also be able to devote themselves more fully to early intervention.

3.9 Impact of Teachers' Perceptions on the Progress of Pupils with Dyslexia

Teachers' perceptions of pupils with dyslexia have assisted greatly in gaining a better understanding of the problems encountered in educational institutions (Scruggs & Mastropieri, 1996; Norwich, 2008). These beliefs or perceptions can determine a pupil's level of achievement and have an impact on their placement in sets according to ability (Alexander-Passe, 2007). Some teachers develop these perceptions at an early stage and find it difficult to change their perspectives, because they fear being considered incompetent and as not really understanding the plight of their pupils (Alexander-Passe, 2007). Therefore, some teachers may simply continue labelling pupils according to their perceptions. Here, it is argued that some teachers view children with unidentified dyslexia as 'lazy and 'stupid', due to a lack of awareness of the conditions that result in the SpLD and also due to their lack of training in identifying and differentiating children with dyslexia (Alexander-Passe, 2007; 2016). In so doing, they fail to provide educational opportunities for some of their pupils. Hornstra et al. (2010) examined teacher's attitudes to dyslexia and the impact of their beliefs on the academic achievement of students with dyslexia. It was consequently found that most teachers did not have a positive view of the learning difficulty. For instance, the teachers in the above study did not award ratings for writing achievement to their students with dyslexia. However, not all the students had been officially diagnosed as having dyslexia; the teachers had merely labelled them as having an SpLD, because they strongly believed that this was the case.

Teachers believe that all their pupils progress, and that all pupils should learn on equal basis, depending on the teacher's competence (Roll-Pettersson, 2008). However, due to a lack of proper awareness amongst teachers concerning dyslexia, it is not always easily detected. This may equally be due to uncertainty, poor training or the lack of a proper definition, amongst other things. These misunderstandings and a total absence of resources cause many problems for individuals with dyslexia and if they do not receive the correct expert attention and supervision, they may face considerable negative pressure, leading to anxiety and low self-esteem. It is only teachers that can support children with dyslexia through these hard times and this requires dedication. However, not many teachers are able to be constantly vigilant about such problems in their pupils and mainstream pressure on them does not support them in this regard (Elias, 2014). This is further compounded by the fact that teachers require special training to be effective in such a role.

According to Goddard et al. (2004), there is a direct link between a child's accomplishments, attitude and efficiency and that of his teacher's attitude. The research shows that it is the will and attitude of the teacher that will have the greatest impact on an individual, rather than, for example, socio-economic factors, such as gender, race or ethnicity. The competence and efficiency of the respective educational institution will also play a vital role in the child's success

Facts show that the ability of a student to gain knowledge is at its peak when the teacher is eager to help (Elias 2014). However, it has also been revealed that teachers have different perceptions of individuals with learning disorders. On the other hand, the condition of the individual and his eagerness to learn may impact the willingness of the teacher. Nevertheless, the teacher may not be very helpful if a child's condition is severe and could fail to give him the correct amount of necessary attention. Moreover, if an individual is very eager to learn and shows a great deal of willingness, then the teacher may demonstrate more attention and deliberation. This is especially significant where there is a need to spend an additional amount of individual time with the child (Elias 2014). Individual support from teachers has been reported as very helpful. In contrast, some teachers who manage to identify problems early on are often perplexed about how to intervene in a useful way (Roper, 2010). Nevertheless, a class teacher should have a certain level of understanding of any children with dyslexia in her class.

Hodge (2000) proposed that teachers be made aware of dyslexia so that they are able to intervene at the right time and not blame the student for irresponsible behaviour or a lack of interest, when in reality, he is suffering from a disorder. With this in mind, a great deal

of anxiety may be spared the respective. Instead, an optimistic and helpful atmosphere can be created, whether the child with dyslexia feels valued and that they can accomplish something. A better understanding of this disorder will undoubtedly influence the teacher's behaviour towards the child. It is therefore important that teachers realise that dyslexia is a disability which not all pupils have and so a particular environment needs to be created that will encourage them to learn.

To teach a learner with dyslexia who has a number of reading and language problems, educational institutions must hire experts and professionals that know how to effectively teach a child with dyslexia and who have sufficient patience (Moats, 2000). This is because more time and attention is necessary for a child with dyslexia to comprehend or read the tasks being set by the teacher (Tunmer, 2008). The next step is to ensure that the teachers are ready for this, have enough information on how to deal with children with dyslexia, are experienced enough to intervene at the right time and have the will to carry this out using the necessary means (Lowell et al., 2014); for example, by using instructional methods such as phonological and whole language approaches, or finding a method that suits the child, rather than expecting all children to learn in the same way.

Williams (2012) investigated first grade and kindergarten teachers' knowledge of dyslexia, as well as their phonological awareness knowledge and skills in the US. The study examined how the teachers used this knowledge in reading intervention groups. The research showed that the teachers had many misunderstandings regarding dyslexia, phonological awareness and phonics, which led to them using inappropriate techniques in the reading intervention groups. As a result of this lack of awareness and knowledge of dyslexia, and the absence of proper guidance on phonological awareness and phonics, misconceptions were formed.

Over time, teachers' general concepts and views have changed a great deal. For example, in the 1980s and 1990s, teachers tended to be adverse to phonics (Heilman et al., 1998). Later, they experienced some change in their discernment and thinking (Shaffer et al., 2000). Literature suggests that phonics play a very important role in learning for children with dyslexia, as it is a method of teaching reading and writing by raising phonemic awareness at primary school level (Costenaro & Pesce, 2012). Although teachers now know the value of phonics, the research shows that they are not necessarily able to comprehend the methods involved in teaching this way (Washburn et al., 2011).

However, notwithstanding the above, it is the importance of teachers' attitudes and approaches to dyslexia that have been highlighted in the literature, as described by Gwernan-Jones and Burden 2010:

> "The importance of teachers' beliefs about the children that they teach, especially with regard to manifest learning difficulties has long been well established. What matters most for the learning of children with learning difficulties and disabilities are the commitments and capabilities of their teachers." (p.68)

This suggests the need for teachers to motivate and appreciate the efforts of their pupils in the classroom; providing them with opportunities to succeed and view themselves as whole individuals. If teachers fail to support these children, there is the danger that they will eventually suffer both and socially.

3.10 Previous Studies on Early Intervention

In most cases, SpLD is not identified by either parents or classroom teachers, but rather by qualified specialist dyslexia teachers (Rogers, 2011). In order to identify early warning signs of SpLD, classroom teachers therefore require training, so they can respond effectively and provide early interventions. The literature suggests that parents, teachers and specialist teachers should plan early interventions before implementation (Al-Zyoud, 2011). This will in turn require the formation of effective partnerships between schools and parents through regular consultation and by building trust (Rogers, 2011). However, such interventions in Arab countries, for example Kuwait, need to be culturally appropriate (Almaazmi, 2013).

3.10.1 Studies from Arab Nations

Teachers' Beliefs and Attitudes towards Dyslexia: Implications for Early Intervention: Research demonstrates that when teachers are trained in the early identification of dyslexia and implement planned intervention, 90 per cent of the children treated in such a way can be integrated into a mainstream and inclusive classroom (Dyslexia International, 2014; Gaad, 2015). However, there is only a limited body of research from Kuwait or the Arab states in general that have examined teachers' awareness of dyslexia. Alghazo and Gaad (2004) explored teacher's beliefs concerning the inclusion of students with disabilities in mainstream classrooms in the UAE. The results showed that teachers were not inclined to include students with learning difficulties, as they believed that such work required more of their time for preparation, planning and providing adequate assistance. In another study,

Arif and Gaad (2008) evaluated the special needs education system within the UAE and observed that teachers were frustrated by the nature of their work with students with learning difficulties.

In one Kuwaiti study, Aladwani and Al Shaye (2012) evaluated knowledge amongst primary school teachers concerning the early signs of dyslexia and their level of awareness of the related difficulties suffered by children with dyslexia. They found that a teacher's years of experience can play a significant role in their ability to identify dyslexia. However, one can argue that experience alone will not be sufficient and that training and professional development are more crucial factors for identifying SpLD at an early stage in a child's life. The issues flagged up by the above authors have been of potential interest to subsequent researchers, as in the present case, where they are investigated further by collecting data from teachers. However, the process of early identification is highly complex, because very young learners have only had a very limited period of time in which to start developing reading and language skills (Handler & Fierson, 2011). Moreover, according to Aladwani and Al Shaye (2012), teachers' lack of awareness is probably due to confusion and misunderstanding over the term 'dyslexia'. Another study from the UAE revealed that years of teaching experience and professional knowledge can influence teachers' beliefs in a positive manner (Alborno & Gaad, 2014), indicating that it is rather the problem of work overload which hinders teachers in Kuwait from providing support for pupils with dyslexia. The lack of time and the fact of teachers being overloaded with duties keeps them from adapting to new methods, attending workshops/conferences and thus keeping up-to-date in their ability to identify dyslexia. The findings reveal that greater awareness and better opportunities for professional development will help teachers develop early remediation programmes and implement timely intervention. This will in turn greatly reduce the number of children meeting diagnostic criteria for dyslexia.

Further to the above, the UNDP-Kuwait project (UNDP, 2012) also raised concerns about the lack of teacher preparation programmes, making it difficult for educators to identify and teach students with learning difficulties, or to take preventive measures for early intervention. This is compounded by the lack of technical assistance to develop Arabic-based curriculum materials for intervention in SpLD.

In conclusion, the results show that teachers do not have the appropriate or sufficient knowledge and skills to assist learners with dyslexia in an optimal way. Further research is therefore required to understand whether they would benefit from professional development, in order to be able to teach such learners more effectively. As a result, the

aim of this research is to examine teachers' awareness and knowledge of dyslexia on a larger scale, which would allow the results to be applied on a national level.

Multisensory Approach: The literature on early reading instruction for individuals with dyslexia states that a multi-sensory and phonologically-based approach is appropriate (Rose, 2009a). This could be due to the claim that early rigorous, multi-sensory and systematic phonics instruction is at the core of dyslexia intervention (Stein, 2001; Joshi et al. 2002). Although this refers to dyslexia in English-speaking/reading children, multi-sensory and systematic phonics instruction is being offered by the Centre for Child Evaluation and Teaching used in Kuwait (Kuwaiti Association for Learning Differences, 2012). Likewise, the Egyptian Dyslexia Association (EDA) also provides intervention programmes for children with dyslexia in Arabic and English using a multi-sensory approach (Almaazmi*, 2013*).

In a study by Hazoury et al. (2009), the Orton-Gillingham approach to reading instruction, a multi-sensory approach (for example, visual auditory, tactile and kinaesthetic) for decoding was developed and tested to determine whether it was beneficial for students with dyslexia in the Lebanon. The researchers who carried out this study - the first of its kind in the Arabic-speaking world - referred to it as an innovative "technique that teaches decoding to students with dyslexia using a research-based systematic multisensory approach, derived from research-based reading strategies developed in the US on the English language, and taking into consideration the unique features of the Arabic language" (Hazoury et al., 2009, p.1). The rationale for developing the programme to tackle reading difficulties was the lack of such methods in the Arab world. The Orton-Gillingham technique not only relates to linguistic patterns, but gives more importance to vocabulary, improved font and colour-coded reading materials (Hazoury et al., 2009).

The above study found that teachers were not only creative, but were also able to strike a chord with students with dyslexia (Hazoury et al., 2009). The multi-sensory approach tested consisted of six parts: the teaching of phonics; the use of systematic and sequenced instruction, giving attention to vocabulary and the alphabet; the use of colour-coding to help identify the letters in a word, and lastly, the multi-sensory stage, which includes visual, auditory, kinaesthetic and tactile methods of learning. The study found that a multi-sensory approach helped create audio-visual associations in learning through kinaesthetic activities; helping to establish left-to-right progression, encouraging word-retrieval from the long-term memory and providing more feedback for the teacher (Hazoury et al., 2009).

The study was unique as it did not use an English-speaking population. The experimental study found that students were able to make progress by paying more attention to words Nevertheless, although the approach used in the study may have been successful, the selection of an Arabic-speaking population did not allow the researchers to make generalisations from the sample they studied.

In Kuwait, there are no programmes with a systematic and comprehensive approach to teaching pupils with dyslexia in schools. However, there are some specialist schools that provide one-on-one tutoring, smaller class sizes (six pupils in a class), multi-sensory teaching, and self-esteem and motivation sessions. (Tibi, 2010). This does, however, suggest that intervention strategies, such as multi-sensory approaches, are being used in schools in Kuwait.

Reading Interventions: Research on reading interventions and assessing reading performance in schools in Arabic nations has been limited. However, the literature proposes that eye tracking be used to find out how learners focus their eyes when reading Arabic and such observations could help in determining learning difficulties and in providing adequate interventions (Abadzi & Martelli, 2014).

Eye tracking is claimed to help reveal the behaviour of the student during a reading session; for example visual stress caused by eye movement (Singleton & Henderson, 2007). Al Wabil and Al Sheaha (2010) used eye movement analysis to screen learners with dyslexia, based on the notion that the learners would focus longer while reading specific Arabic texts. The findings from exploratory experiments conducted by the researchers reveal differences in the intensity of eye-gaze and reading patterns between readers with dyslexia and a non-dyslexic control group. The children with dyslexia investigated in the study displayed longer fixation duration, with slower eye movements. Additionally, the findings showed that the eye movement patterns observed reflect cognitive processes corresponding to the reading of Arabic texts. The above researchers claim that eye movement analysis is crucial for examining the nature of reading problems and tailoring reading interventions to meet the specific needs of persons with dyslexia. However, the crux of the matter here is to identify those texts which do or do not reveal the difficulties faced by learners with dyslexia.

There is not much evidence on eye tracking as a reading intervention because eye movement research is still evolving. However, eye movement is a factor that that can cause reading problems in children (Miller & O'Donnell, 2013).

Phonemic Awareness Intervention: In the Arabic language, phonological awareness is crucial for acquiring reading capabilities and an important skill that learners must acquire to become readers of both vocalised and unvocalised text (Bari, 2011; Halebah, 2013). This is critical, because many letters are similar in the Arabic alphabet and this can lead to difficulties in acquiring reading skills in both learning and teaching (Breznitz, 2004). It would appear that phonemic awareness is essential for the early literacy development of Arabic-speaking children (Zayed et al., 2013). In fact, Arab children with dyslexia are considered to have relative difficulty with phoneme awareness and require timely interventions to remedy reading difficulties (Mannai & Everatt, 2005; Ashour, 2011; Zayed et al., 2013). However, there is a paucity of empirical studies examining the problem of dyslexia and the use of phonological awareness interventions in Kuwait and other Arab states, except for a few from Egypt (for example, Elbeheri, 2004; Elbeheri et al., 2006; Aboras et al., 2012; Elmonayer, 2013).

In a recent study, Alyaba (2014) developed a computer game application to target kindergarten children in Saudi Arabia who are at risk of dyslexia. The application was designed to help children improve their reading and listening skills. The aim of the study was to develop reading skills, differentiating between sounds and stimulating children's phonological awareness. Arabic-speaking children, unlike children in the West, do not have the luxury of being able to access varied programmes designed to promote phonological awareness. In Saudi Arabia, there are no programmes for detecting dyslexia in children at an early age. It was this current lack of such programmes in Arabic which encouraged the researcher to design an application to serve Arabic-speaking pre-school children who may be at risk of dyslexia. The children being targeted were in the age group 4-6 years and the game was in Arabic, modified to suit the local culture. The study found that the children were able to select appropriate words and phrases, and improve their reading skills. The results of the study indicate that the children were able to acquire the necessary skills and learn the language.

Other research findings from Egypt have similarly shown that reading interventions enhance phonological awareness among at-risk kindergarten pupils (Elmonayer, 2013). In the Egyptian study, Elmonayer (2013) developed a Kindergarten Inventory of Phonological Awareness and administered pre- and post-tests to children in experimental and control groups. The researcher engaged the experimental group in reading activities designed to improve their phonological awareness skills, while the control group participated in regular classroom activities. The findings show that the children in the

experimental group demonstrated higher levels of phonological awareness than did those in the control group and the reason for these improved phonological skills may have been the specific design of the intervention, for example the reading activities. The study's results provide evidence to suggest that phonological awareness intervention can effectively address deficits in phonological awareness and facilitate reading acquisition.

Remediation programmes to improve phonological awareness were also developed by Aboras et al. (2012) for Arabic-speaking children suffering from dyslexia, using materials appropriate for Arabic culture. The researchers applied culturally specific materials knowing that the children would be familiar with them and this could influence better comprehension of narrative texts. Like other studies from Egypt, the children with dyslexia were divided into experimental and control groups. Phonological Awareness Training for the Reading Programme was also modified to suit the nature of the Arabic language. For example, by using Arabic script, writing from right to left, using rhyming activities, sound blending, sound segmenting, and including reading and spelling activities. The study found that learners were able to develop reading-related phonological processing abilities. The findings also illustrate that the effects of phonemic awareness instruction were enhanced by combining reading instruction and spelling activities. This would corroborate the results of previous studies, which have proved that training in phonological awareness helps develop reading and spelling skills (Gillon et al., 2004).

Despite the fact there are a number of studies on phonological awareness interventions, it is essential to note that teachers should correspondingly maintain positive perceptions of the role of systematic phonological awareness instruction and possess the appropriate knowledge and skills concerning the structure of their own native language. This knowledge and attitude is required for the successful development of intervention programmes. Other studies conducted in the region, for example Tibi (2005), have similarly surveyed teachers' knowledge and skills with regard to phonological awareness. Although the intention of such studies has been to stress the importance of a potential intervention design and they are clinically relevant to the promotion of positive change, the findings unfortunately reveal that teachers are not adequately prepared for the provision of phonological awareness programmes. For instance, Tibi (2005) found teachers to possess poor knowledge and skill in the area of phonology.

Parental Involvement in Early Interventions: In order to detect, evaluate and then educate a child with dyslexia, parents must be kept in the loop, as they play a major role in accessing

proper guidance for their child (Al-Zyoud, 2011). According to a newspaper report in the UAE (Pennington, May 23, 2015), most parents and teachers have compassion for children suffering from dyslexia, so the actual task for the teachers and head teacher is to handle such children's parents, which can be difficult due to social stigma, societal pressures and ensuing humiliation (Pennington, 2015). This is necessary as the progress of a child with dyslexia will depend on the support they receive. Therefore, the head teacher should convince parents to support their child and provide assistance as soon as they can for the betterment of the child.

Studies reveal significant advantages for those whose problems have been discovered at an early age (Al-Natour et al., 2008). They also show that this timely evaluation is more helpful for the parents, since it gives them enough time to adjust to the subsequent social embarrassment. When the teachers discover reading problems in pupils at an early enough stage, it can save parents a great of the trouble they would have had to go through if they had not been made aware of their child's condition. It moreover gives them time to think of the best way to address their child's needs. If, however, teachers fail to recognise symptoms early, parents can become stressed and angry at the teacher's failure to identify it and at the poor performance of their child in class (Al-Zyoud, 2011). According to Al-Zyoud (2011), parents need to be better educated and trained in this area, even if they are reluctant, so that active early intervention programmes can be implemented (Al-Zyoud, 2011). However, eliminating negative attitudes or changing the mind-set of parents in the Arab states is a complex process. Therefore, it could be argued that culturally appropriate remediation programmes are required to overcome those negative attitudes.

Dyslexia from an Arab perspective: The Arab world consists of 22 nations, all connected by a common language, namely Arabic. However, Arabic has many dialects and is spoken differently across the Arab world, whether in Kuwait, Morocco, Egypt, etc. This makes the language context highly complex (Elbeheri et al., 2009) and it is a complexity that is more keenly felt by learners with SpLD, given that dyslexia is a language-based learning disability (Elbeheri et al., 2006). To clarify the above, the research shows that dyslexia is manifested differently according to the language concerned (Smythe et al., 2004). Therefore, in order to better understand SpLD in the context of the Arabic language, it is claimed that its relevant cultural and linguistic characteristics must be acknowledged, especially its cursive style, the way it is written and read, the orientation of the text (from right to left) and its system of capitalisation (characters modified according to their position in a word, i.e. whether at the beginning, in the middle, or at the end) (Elbeheri et al., 2006).

Dyslexia also has a manifestation that is culturally specific, whereby children with SpLD can find it difficult to learn Arabic or English from teachers who are not from the GCC states. For example, they may be taught by expatriate staff, originally from India, Pakistan, Palestine or Egypt (Gaad, 2005; Elbeheri et al., 2009; Al Rowais et al., 2013). As a result, there will be linguistic variations and some of these teachers may even lack the skills to effectively teach children with dyslexia, due to cross-cultural variations in language use. Thus, culture also affects language and consequently plays an important role in how individuals with dyslexia struggle to learn languages (Al Rowais et al., 2013).

Researchers from the Arab world have nevertheless provided a helpful context for understanding what dyslexia looks like in a child learning to read in Arabic (Elbeheri et al., 2006, 2009; Mahfoudhi et al., 2010; Al Rowais et al., 2013; Gaad, 2015). According to Mahfoudhi et al. (2010), Arabic is a highly morphological language and therefore importance should be given to morphological awareness, as it will allow pupils with SpLD to acquire the essential skills for understanding written text. Moreover, pupils with SpLD who are in mainstream schools may be obliged to contend with teachers who do not have positive attitudes to inclusion (Gaad, 2015). In such an environment, pupils with dyslexia should be assessed by considering the specific linguistic features of Arabic and providing culturally and linguistically appropriate interventions (Elbeheri et al., 2006). Most importantly, children with SpLDs in Kuwait and other GCC states should be provided with interventions by taking into account the morphological aspects of the language (Mahfoudhi et al., 2010; Al Rowais et al., 2013).

Culturally-appropriate Intervention Approaches: Almaazmi (2013) developed a culturally-appropriate assessment method for diagnosing Emirati pupils with dyslexia. The above study examined a potential framework for the provision of intervention and related support for learners. In order to do so, the Dyslexia Adult Screening Test for the Arabic language (A-DAST) was translated from English and adapted to suit the Arab cultural and linguistic environment, after pilot testing the items with volunteers from government schools in the UAE. This test was used to assess pupils' counselling and support needs and the provision of intervention and support. The results of the A-DAST tests revealed that higher education students performed poorly in literacy and phonological tasks, as compared to English-speaking cohorts from the UK, which most likely indicates the asymmetrical nature of Arabic orthography.

The counselling and support needs of learners with dyslexia were assessed with a questionnaire. What the data from the questionnaire revealed was that the learners die not

consider the available counselling and support services to be sufficient. Also highlighted was the lack of specialised programmes designed to address the needs of learners with dyslexia in the Emirates, namely their academic, social and emotional needs. In the above study, the students were assessed in their academic progress, before and after the programme of intervention and support. This programme was characterised by literacy training, improving learning approaches, creating self-awareness and improving memory. The overall results demonstrated that the programmes and assessment method had helped the learners with dyslexia improve their academic performance. In fact, the above results would indicate that developing culturally-appropriate intervention and remedial programmes in Arabic may help overcome literacy issues in learners with dyslexia. The results also appear to corroborate existing recommendations made by the UNDP project, which advised that the context of the cultural world to which a child with dyslexia belongs should be considered (UNDP, 2012). In other words, it is crucial for an intervention to be linguistically and culturally appropriate. However, this study developed a programme for higher education students, instead of kindergarten or first grade schoolchildren, despite the fact that it is the early school years that reveal childhood vulnerabilities, such as SpLD. More importantly, early intervention helps children with dyslexia to obtain support before reading problems become severe or adversely affect the development of their self-concept; resulting in, for example, frustration and lowered self-esteem.

3.10.2 Early Intervention Studies from the West

Dyslexia requires appropriate early intervention programmes, vital for children who are at risk (Shaywitz, 2003). It is also important for an early intervention programme to be specifically designed for a child's unique learning needs. Unlike the literature from Kuwait and other Arab nations, international literature from the US, UK and Europe presents more studies of early intervention programmes for learners with dyslexia, with an emphasis on reading, multi-sensory approaches, training in phonological awareness and Response to Intervention (RTI). The results of the studies show that phonological awareness training and letter sound training have long-term effects (Elbro & Petersen, 2004; Hindson et al., 2005; Moore et al., 2005, van Otterloo et al., 2009; Snowling & Hulme, 2011; van der Leij, 2013). A developing understanding of dyslexia, as well as evidence-based early interventions for children at risk are currently encouraging schools to revise the curriculum by integrating oral language, reading and writing skills (Bell et al., 2011).

Emphasis on Early Interventions: Children with dyslexia require intervention from kindergarten age, as they are not endowed with well-developed phonological awareness. They do not develop reading skills easily and need more instruction, especially in PA. This would indicate that early assessment and intervention are essential and may make a real difference to learners with limited levels of PA (Wilson & Lesaux, 2001; Birch & Chase, 2004). PA and its specific component, phonemic awareness, enable learners to identify or manipulate words that are presented orally (Torgesen, 2004).

The significance of providing early interventions has been magnified by several intervention studies which have selected at-risk children attending kindergarten, even before formal reading instruction has begun (Fielding-Barnsley & Purdie, 2003; Elbro & Petersen, 2004; Eleveld, 2005; Hindson et al., 2005; van Otterloo et al., 2009). The rationale for providing early intervention is driven by the results of studies showing that children who fail to acquire literacy skills during the early stages of their schooling can be expected to remain poor readers in later years (Francis et al., 2005), with consequently reduced motivation and self-esteem (Torgesen, 2004). The prevention of the development of reading difficulties through early intervention can be a useful way to avoid this problem (Torgesen et al., 2004). However, this will entail screening during the early years to precisely identify children at risk of failing to develop reading skills. It will also require teachers to play a key role in providing children with the essential phonological skill instruction that may assist in the transition from oral to written communication.

Reading and Language Interventions: Research on reading interventions has provided encouraging results. For example, Hatcher et al. (2006a) found that children made significant progress in reading accuracy, spelling and reading comprehension over a 20-week period of intervention. Those children who attained very low scores and failed to make progress when provided with regular classroom instruction were followed up by Duff et al. (2008). They developed an approach called 'Reading with Vocabulary Intervention' (REVI) and after a nine-week intervention that comprised reading, and phonological and vocabulary training, the children were found to make statistically significant gains in these areas and their overall language skills. Follow-up interventions undertaken five years after the study by Snowling and Hulme (2011) reported positive effects and showed that the children had maintained their gains and improved their reading skills. This implies that regular ongoing observation and support is essential for maximising the effectiveness of such interventions.

Furthermore, dialogic reading was a home-based intervention applied by Fielding-Barnsley and Purdie (2003) to compare 26 experimental children with 23 at-risk children for a period of eight weeks. The programme involved parents reading eight books six to seven times to children with dyslexia, using a dialogic reading method. This interactive technique encourages parents to prompt children with questions and engage them in discussions while reading to them. The study findings reported that the experimental group of children were more able to learn and retain information than the children in the control group. The study findings indicate that the intervention was beneficial to children at risk of developing a reading disability. Although the research reveals that dialogic reading has positive effects on oral language, there were no indications of it having any effect on phonological processing.

Phonemic Awareness Intervention: Children with dyslexia have difficulty with the recognition and spelling of whole words, mediated by appropriate phonological /phonemic awareness interventions (Brooks, 2013). PA skills are essential for acquiring reading skills and constitute the leading predictor of a child's reading success or failure. PA training therefore enables children with dyslexia to acquire reading and writing skills (Torgesen, 2005). However, despite the considerable progress in word reading and comprehension that PA interventions allow, it is the inclusion of phoneme awareness training components and systematic phonics instruction which will lead to the most successful outcomes (Torgerson et al., 2006). In the UK, some of the most successful interventions have been conducted by Hatcher and colleagues, who delivered a combination of PA, phoneme awareness, and reading and writing activities (Hatcher et al., 2006a, 2006b). The literature proposes numerous and varied approaches to teaching phonics, namely analytic, analogy and synthetic phonics (Wyse & Goswami, 2008). Analytic phonics are a form of teaching through which pupils are taught to infer common letters and sounds in a set of words, all beginning or ending with the same letter or sound (Torgerson et al., 2006), for example: bet, bark, bush, bent. However, synthetic phonics has been recommended as the preferred approach in schools in the UK as it teaches pupils letter-sound (grapheme-phoneme) relationships in a very clear incremental order (Wyse & Goswami, 2008). Children are typically taught small groups of letter sounds before starting to read. More specifically, analogy phonics teaches how to use parts of written words so that learners can decode unknown words (Milne, 2005). However, this approach can only be used if learners are already in a position to identify new words.

Duff and Clarke (2011) analysed interventions for children with dyslexia and claimed that remediation for problems with word recognition required training in phoneme awareness, letter knowledge, and the application of these skills to reading and writing tasks. This study, along with work by Snowling and Hulme (2011) and others (for example, Vellutino & Fletcher, 2009; Brady, 2011) are among several evidence-based interventions to date. However, there is a dearth of follow-up studies which record the relative stability of gains in reading. It points to a need for more follow-up studies, concentrated on longer intervention periods (Hulme & Snowling, 2009).

Hindson et al. (2005) developed an intervention training programme, specifically targeting phoneme awareness and letter knowledge. However, the above authors also included dialogic reading. The interventions were carried out on a one-to-one basis at school and at home with pre-school children from at-risk families. The training programme consisted of 30-minute sessions and was created to investigate the short- and long-term effectiveness of the intervention. Positive short-term effects were witnessed, with the at-risk group who had received the training outperforming their untrained, at-risk counterparts as regards phoneme awareness. Follow-up tests were carried out after two months of kindergarten attendance and demonstrated that trained children who were not at-risk still managed to outperform at-risk children who had also received training. These findings reflect those of a previous study (Byrne & Fielding-Barnsley, 1993), which indicated that children with dyslexia master foundational literacy knowledge more slowly, even with effective teaching methods and training programmes.

Elbro and Petersen (2004) also investigated the effects of a programme to develop phoneme awareness and letter knowledge, run by a teacher with a whole kindergarten class for approximately 30 minutes per session over 17 weeks. The results illustrate how the trained at-risk children outperformed their untrained at-risk peers, as regards phoneme awareness in a post-test and follow-up assessments at the beginning of the second and third grades. However, these findings are in contrast to those of Hindson et al. (2005) and Byrne and Fielding-Barnsley (1993), whereby it was found that children with dyslexia master literacy knowledge very slowly, even if they receive effective training.

In the Netherlands, several studies (for example, Eleveld, 2005; van Otterloo et al., 2009; van der Leij, 2013) aimed to enhance phonological skills/phoneme awareness, naming speed and letter knowledge training. van der Leij (2013) examined the early intervention developed by the Dutch Dyslexia Programme. This targets children considered to be at risk of developing dyslexia. The programme was largely influenced by training in phoneme

awareness. The findings of the Dutch Dyslexia Programme provide evidence that it is difficult to prevent dyslexia. van der Leij (2013) argues that interventions will only bear fruit if they are adapted for the needs of the at-risk children concerned and if they are conducted at an early enough stage. In Eleveld's (2005) study, the immediate effect on letter knowledge did not appear to be greater than anything observed in other studies reviewed (for example, Elbro & Petersen, 2004; Eleveld, 2005; Hindson et al., 2005; van Otterloo et al., 2009). On the other hand, unlike Eleveld's (2005) study, parents acting as tutors were involved in most of the other Dutch studies applying an intervention (such as van Otterloo et al., 2009; van der Leij, 2013). The most significant result emerging from all these concerned the performance of at-risk children in reading and spelling skills, as these were found to have improved in post- and follow-up tests. To sum up, the results of all the studies investigated here support the value of phonological awareness training interventions to improve reading and pre-reading skills in children with dyslexia.

Response to Intervention: "Response to Intervention (RTI) is a comprehensive early detection and prevention strategy that identifies struggling students and assists them before they fall behind" (Gersten et al., 2008, p.4). The rationale for using RTI as a remediation strategy is because it is a multi-tiered approach which includes regular classroom instruction (first tier of intervention), universal screening for reading, constant monitoring of at-risk children through regular assessments, and the provision of increasingly powerful interventions, based on a child's progress (Scanlon et al., 2005; Fletcher & Vaughn, 2009).

Moreover, Scanlon et al. (2008) investigated at-risk kindergarten children in their acquisition of reading skills in response to an intervention, where an interactive strategic approach was applied. This approach was used to determine whether a teacher's professional development, supplemental instruction in a small group setting, or a combination of the two can help overcome at-risk children's reading difficulties. The results show that providing high quality supplemental instruction in small groups and appropriate professional development for teachers, as well as a combination of these can help substantially reduce the incidence of early reading difficulties. The results clearly indicate that classroom-based instruction can improve early reading skills and ameliorate learning difficulties, which corroborates the results of research into interventions, whereby what have been found to be most effective in lowering the incidence of early reading difficulties are small supplementary groups and one-to-one interventions (Vellutino et al., 1996; Scanlon et al., 2005).

It is frequently acknowledged that any achievements made by children with dyslexia are for the most part determined by the strategies adopted by teachers and the quality of the instruction. This is what the RTI approach addresses (Fuchs et al., 2002b; Vaughn et al., 2003) and so researchers have recommended it, not only as an alternative to discrepancy models, but also as a means of approaching early and intensive intervention, by identifying at-risk children, preventing problems with their reading and enhancing their reading outcomes (Fletcher et al., 2006; Al Otaiba & Torgesen, 2007; Jimerson et al., 2007; Vellutino et al., 2007).

Nearly two decades ago, Vellutino et al. (1996) argued that it is only in response to high-quality and intensive reading instruction/intervention that early reading difficulties and inherent weaknesses in phonological processing ability can be identified. However, it is also argued that the RTI approach to diagnosis determines that it is the quality and intensity of instruction which will directly impact the frequency of a 'dyslexia' or 'learning disabilities' diagnosis (Torgesen et al., 2008). In other words, if RTI approaches are to be effective, it is crucial that more importance should be given to understanding what type of instruction is required for reducing the incidence of early reading difficulties and supporting teachers in the provision of quality instruction.

Self-concept/Self-esteem and Early Interventions: Early intervention research from the UK has also explored other issues deemed beneficial for learners with dyslexia. Researchers (for example, Humphrey, 2002; Hales, 2004; Tsovili, 2004) have acknowledged that learners with dyslexia may lack self-esteem. According to Burton (2004), learners with dyslexia can also feel insecure, lack an individual identity, or fail to develop a sense of belonging. They may even fear they will not be respected by others and could therefore lack determination and motivation, feeling incompetent as a result; although much depends on individual circumstances, such as risk and protective factors namely, genetic or environmental. Other learners with dyslexia may in fact cope very well.

Esteem enhancement programmes can produce lasting increases in self-esteem if they are designed with the specific goal of improving the attitude of children with dyslexia towards themselves. Burton (2004) claims that effective esteem enhancement interventions can encourage learners to identify and understand their own strengths, as well as enhancing their self-assurance in coping with dyslexia and other facets of academic life.

Burden (2008b) analysed the results of studies relating to the self-concept of school children with dyslexia and found that their self-esteem can improve if the problem is

identified and if early intervention and emotional support are provided. Children who realise their feelings are being understood have been found to show resilience, which in turn helps them to ameliorate their learning difficulties (Burden, 2005). This illustrates how delayed intervention, or a lack of emotional support, can cause confusion, giving rise to further emotional reactions; for example withdrawal and anxiety. Therefore, children may need counselling besides reading interventions (for example phonological/phoneme awareness) to help them find their own ways of overcoming the challenges they face (Burden, 2008b).

Moreover, student advocacy, mentors and counsellors may all form part of a dyslexia-friendly learning environment. MacKay (2001, 2005), who supports such environments, claims that the promotion of a dyslexia-friendly school environment requires strong school leadership, the integration of the whole school and students' needs being met; for example, the needs of students with learning difficulties, the need for stringent monitoring and assessment, and the creation of a culture of high expectations. According to Riddick (2006), these environments can encourage learners with dyslexia to compare themselves with their peers and as a result, perform well. The current study argues that dyslexia-friendly environments provide opportunities for pupils to improve their self-esteem and feel supported.

Parental Involvement in Early Intervention Programmes: There is evidence that parents can deliver highly effective reading programmes if they are provided with training and on-going support (Lingard, 2005; Scammacca et al., 2007). This shows how parental involvement can generate positive outcomes for children. Studies also indicate that schools should make substantial efforts to support parents in developing their children's language and literacy skills (Shiel et al., 2005). However, there are questions such as 'will they collaborate?' as parents and teachers may have concerns about cooperating with each other. In addition, teachers may not always be certain about parental involvement and the role parents can play. Research on early intervention and parental involvement (for example, Sénéchal & LeFerve, 2002; Hall & Harding, 2003; Persampieri et al., 2006) reveal that not all parents are comfortable relating to teachers, but most of these problems are manageable and can be overcome, given that teachers play a crucial role in the development of children's literacy skills.

According to Hurford et al. (2016), parental involvement may have adverse effects on children because parents do not have an understanding of intervention strategies. As a result, they become frustrated and may even physically and emotionally abuse their

children, reacting disproportionately to their child's negative behaviour. The above authors highlight the need to increase parents' awareness of dyslexia. The study concludes that by fostering teacher-parent cooperation, adequate support can be provided in natural contexts, such as the home.

The Importance of Instruction Time in Early Interventions: Dedicated instruction time is considered to be one of the essential factors for effective literacy instruction and in particular, for successful early interventions (McPhillips & Shelvin, 2009). Teachers must make decisions on how to manage time for reading in their teaching. The frequency of teaching input is the key to the academic success of learners and it is argued that daily teaching sessions are essential (Lingard, 2005; Scammacca et al., 2007). Solity et al. (2000) argue that in order to make strong gains, children with learning difficulties should be provided with interventions or training programmes over a period of time and these should not be massed into a limited period. It would suggest that daily practice (for example, 10-30 minute sessions) should be distributed over a few weeks or months. Rose (2009a) supports the concept of 'little and often' (p.14).

Moreover, existing studies prove that the outcomes of an intervention are not always linked to its duration; short, but timely and intensive interventions may present the most efficient approach (Vaughn et al., 2000; Brooks, 2007). The results of the above-mentioned studies demonstrate how intensive intervention can provide effective remediation within a relatively short time span.

3.11 Conclusion

Literature from the Arab states and the West states that early intervention is most effective for 'accelerating' literacy among children. Therefore, it is crucial that children at risk of dyslexia are identified as early as possible, as dyslexia is a multi-faceted disorder. Therefore, the research recommends that children with dyslexia be accurately diagnosed to ascertain the appropriate type of intervention required for ameliorating learning difficulties. It is very clear that the literacy skills of children with dyslexia can be enhanced through improved phoneme awareness and methods involving systematic phonics, where these interventions are effectively integrated into the school curriculum. Along with various types of intervention (for example, multi-sensory, reading, phonological/phoneme awareness, eye tracking, RIT), classroom instruction that involves small group instruction and intensive one-to-one support have been advocated by researchers. This would entail a combination of traditional teaching and evidence-based interventions. Furthermore,

increasing numbers of researchers, experts and practitioners propose that more attention is required to the provision of support, besides remediation, enhancing teachers' and parents' understanding, and the identification of more effective learning methods.

One of the results of dyslexia relates to low self-esteem (Burton, 2004) and the literature ventures that intervention programmes will prove more successful if they include activities and tasks that enable learners with dyslexia to come to terms with their difficulties and better comprehend their strengths and capabilities. A dyslexia-friendly environment and the crucial role that parents and teachers play in the initial diagnosis of a child's condition, as well as the support of specialists in a school, can help in the identification, treatment and provision of continuous support. This will enable learners to function, adapt and compensate for their limitations.

The aim of the literature review presented in this chapter is to evaluate previous research and theories related to SpLD and dyslexia. The review of the literature suggests that a construct is required to cover teachers' knowledge and understanding of dyslexia, their perceptions of the effect of dyslexia and early intervention on the self-concept/self-esteem of pupils with an SpLD, and the challenges facing the implementation of early intervention programmes.

Chapter Four: Research Methodology

4.1 Introduction

The present study was aimed at investigating teachers' perceptions of the challenges related to provision of services for learners with SpLD (dyslexia) in government run primary schools in Kuwait and to identify teachers' perspectives regarding early intervention.

4.2 Research Questions

Main Question: What are the challenges facing teachers regarding the implementation of early intervention of the pupils with SpLD (dyslexia) in primary schools in Kuwait?

Research sub-questions:

1. What knowledge and understanding do Arabic language teachers in Kuwait currently possess of the concept of SpLD (dyslexia)?

2. What are Arabic language teachers' perceptions of the effect of dyslexia on the self-concept/self-esteem of pupils with a SpLD (dyslexia)?

3. What are Arabic language teachers' perceptions of the impact of early intervention on the self-concept/self-esteem of pupils with SpLD (dyslexia)?

4. What are Arabic language teachers' perspectives with regard to the implementation of early intervention?

5. What are the perspectives of Arabic language teachers and educators of how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

6. What are the strategies adopted by supervisors and decision-makers, as ways of overcoming any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

This study is designed with a combination of qualitative and quantitative research methods, commonly referred to as a mixed-method approach. The following sections will provide explanations for why this method was chosen.

4.3 Theoretical Framework: Teachers' Expectations of SpLD (Dyslexia) Pupils' Learning and Achievement

The theoretical framework guiding this study (see Figure 3, overleaf) claims that teachers' expectations affect pupils' academic progress. It was developed from a review of the literature and draws heavily upon the work of Riley and Ungerleider (2012), as well as Kaplan and Owings (2013).

4.3.1 Teachers' Expectations

Many teachers have expectations based on the perception that all children are capable of learning and that learning is contingent on the quality of teaching (Roll-Pettersson, 2008). These expectations of the performance of learners tend to have an impact on teachers' attitudes, which in turn can affect the way they treat students. The term 'teachers' expectations' refers to the biased interpretations made by teachers with respect to the potential of their students to achieve and maintain academic success (Riley & Ungerleider, 2012).

Teachers' expectations of their students' academic accomplishment can influence the learning and success of such learners (Kaplan & Owings, 2013). The impact of these expectations on students' learning and achievement, also referred to as the 'Pygmalion effect' (De Boer et al., 2010), will include teachers forming different expectations of students' performance, treating students differently, and causing students to change their behaviour and perform in keeping with their teacher's expectations (Demanet & Van Houtte, 2012). In mainstream classrooms, teachers tend to allow their expectations to directly influence and sometimes openly guide their interaction with learners with dyslexia and very often, they will engage with and assess their students, based on these expectations (Rosenthal, 1997). However, expectations need to be positive, in order to encourage students with SpLD (dyslexia) and help them feel that they are no different from other learners.

Teachers' Expectations		
All children are capable of learning		

| **Characteristics of students with SpLD (dyslexia)**

Learning difficulty

Poor self-esteem/self-concept | **Teacher's negative perceptions**

Lack of knowledge/understanding of SpLD (dyslexia) or of the importance of early intervention

Underestimating the achievement of students with dyslexia | **Teachers' negative expectations**

Negatively influences students' learning and achievement.

Biased interpretations of the potential of students with SpLD (dyslexia))/academic achievement |
| **Teachers' knowledge and understanding of SpLD (dyslexia) and early Interventions**

Development of teachers' instructional capabilities

Development of positive teacher-student relations | **Teacher's positive perceptions**

Accept differences

Innovative practices

Early intervention strategies | **Teachers' positive expectations**

Influences students' learning and achievement positively

Impartial interpretations of the potential of students (SpLD) (dyslexia))/academic achievement |

Figure 3. Theoretical framework (developed from: Riley & Ungerleider, 2012; Kaplan & Owings, 2013)

Pupils with dyslexia face difficulties in the classroom (not only in their learning, but also due to low self-esteem, substandard behaviour and social exclusion) and teachers have a responsibility to meet their needs. The literature suggests that children with dyslexia may become alienated and disenfranchised, leading to increased risk of depression and anti-social behaviour, if their condition/disorder is not properly addressed (Macdonald, 2009; Sutherland, 2011).

4.3.2 Teachers' Knowledge and Understanding of SpLD (Dyslexia) and Early Intervention

Teachers who do not have adequate knowledge or understanding of the characteristics of students with SpLD (dyslexia) may have negative perceptions of learners. On the other hand, teachers who are appropriately trained will be able to support children who find it difficult to read and write. They will also understand the importance of early intervention programmes, developing instructional capabilities and a better relationship with their students. Such deeper knowledge and understanding will help teachers accept differences in children, coming to terms with the various needs of learners with dyslexia, thus adapting their teaching approach accordingly.

4.3.3 Negative and Positive Expectations

Teachers' expectations can have lasting consequences, especially if teachers have negative attitudes towards students with learning difficulties (Campbell et al., 2003). Teachers with negative attitudes expect students to keep pace with their peers in class and learners who cannot do so are considered failures (Glazzard, 2012). Teachers with negative perceptions or unreasonable expectations will have an adverse impact on their students, as they can only see their students' shortcomings, rather than their own shortfalls in instructional practice (Glazzard, 2012). As a result, pupils with dyslexia may have a poor relationship with their teachers, which could have a negative effect on their motivation and self-esteem (Glazzard, 2012).

Hornstra et al. (2010) examined the attitudes and expectations of mainstream teachers to the academic achievement of pupils with dyslexia in the Netherlands. They found a significant correlation between negative attitudes to such pupils and generally poor teacher-student interaction. This was in contrast with teachers who were more receptive to innovative practices and who consequently kept an open mind about learning disabilities. The study found that knowledge of the disorder, accompanying behaviour and underlying values amongst teachers had an impact on their teaching practice, in turn affecting their relationship with their students. Given that most students with dyslexia may not be able to learn how to read and/or spell in the usual way, teachers have a responsibility to identify the factors which possibly contribute to their poor performance (Hornstra et al., 2010). Such risk factors may include low or negative expectations amongst teachers; influenced by teachers' negative beliefs about dyslexia and often leading to poor student-teacher interaction and relationships.

Moreover, the results of Hornstra et al.'s study (2010) claims that teachers seem to overestimate the academic accomplishments of students without dyslexia, but underestimate the achievements of those with learning difficulties. It can therefore be assumed that students with learning difficulties who have been underestimated are at risk for having lower self-esteem and self-worth. Teachers with a lack of knowledge mostly form negative expectations of their students, due to their lack of understanding of SpLD (dyslexia) and because of their failure to form sound relationships with their students. In such circumstances, these negative expectations on the part of the teacher could in turn have a damaging effect on students' expectations of success and their academic self-concept. On the other hand, it could be stated that teachers who hold more positive beliefs about their pupils can better meet learners' needs by contributing to their overall educational experience and achievement (Campbell et al., 2003; Gwernan-Jones & Burden, 2010).

The prevalence of negative perceptions and negative expectations amongst teachers with regard to SpLD would suggest that there is a need for early diagnosis, which is in fact vital for putting an end to the development of learned helplessness in children with SpLD (dyslexia). In order to develop and sustain positive beliefs and expectations about children with dyslexia, teachers should be aware of its causes, the importance of early intervention and the importance of appropriate professional training. According to Gwernan-Jones & Burden (2010), "teachers with a higher degree of self-efficacy were consistently found to be more open to new ideas and more willing to experiment with new methods to meet the needs of their students" (p.66). In other words, teachers need to have a deeper understanding of dyslexia and early intervention, while acknowledging the shortfalls in existing classroom practice, if they are to meet the needs of students with SpLD.

4.4 Research Design

As mentioned above, the research design applied in the present study is known as a mixed-method design, as it is a combination of both qualitative and quantitative techniques. However, this is not a random or unscientific mixture of both approaches, but rather a carefully described theory. If only qualitative research methods were used, the information gathered would be of little scientific significance (Creswell, 2013). However, human knowledge is not just based on subjective thought, but rather on scientific evidence that has been observed and collected over time. Conversely, the use of quantitative methods alone in empirical research may place the researcher outside the research domain, whereas

an interpretive research methodology supports the view that people construct their own knowledge (Crotty, 1998). Therefore, in addition to the quantitative methods discussed, an interpretive methodology is also applied, giving the researcher an opportunity to interact with the teachers, in order to obtain a clear view of the problems they encounter. In fact, a mixed-method approach allows the researcher to implement qualitative methods for clarification, or to elaborate on whatever understanding has been gained from the quantitative aspect of a study (Koh et al., 2004; Keil et al., 2007). It infers that a quantitative approach is used to initiate the research, as is the case here. In fact, the mixed-method approach used in this study enabled the interpretations drawn from the quantitative approach to be validated (Bhattacherjee & Premkumar, 2004).

The rationale for using a quantitative approach (questionnaires) to initiate this research is because, in Kuwait, like elsewhere in the Arab world, the population are more familiar with questionnaires than interviews and there are several social and political reasons for this. In the Kuwaiti context, people feel more at ease responding to questionnaires rather than to interview questions. Therefore, questionnaires were administered to Arabic language teachers working in primary schools, after obtaining confirmation of agreement from the Ministry of Education. This survey was to identify the key issues and encourage the respondents to take part in subsequent interviews, with the aim of gathering deeper insights into the real issues of concern. Thus, it should be noted that it was impossible to begin this research using the qualitative method before the questionnaires had been returned. On the basis of data gathered using the questionnaires, together with the respondents' expressed wish to further participate in the research, a qualitative method was considered, namely interviews. The use of a qualitative method, following numerical data collection, thus allowed the researcher to interact personally with the participants and develop a deeper understanding of the real difficulties surrounding the implementation of early intervention for pupils with SpLD (dyslexia).

4.4.1 Data Collection Methods

The population sampled in the present study was drawn from primary schools in the State of Kuwait. Therefore 40 state schools offering primary education from six educational districts were purposively selected. This selection was based on information from the Ministry of Education, whereby these 40 schools were reported as catering for pupils with dyslexia and had either implemented intervention programmes or were in the process of doing so.

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4.4.2 Quantitative Data Collection

4.4.2.1 Study Participants (Survey)

The sample selected included Arabic language teachers in primary schools in Kuwait. Initially, 594 questionnaires were distributed. A total of 471 were retained as the final state school sample, with 66 excluded due to their being incomplete and 57 not returned. In Table 4.1, below, the distribution of the final questionnaire sample is presented. In terms of the selection criteria for the teachers, they needed to be qualified to teach Arabic in state primary schools and/or inclusive education, with the latter being dedicated to meeting the needs of learners with special educational needs. Teaching effectiveness and classroom management strategies were also considered. Among the teachers selected, the sample included Kuwaiti nationals and expatriates. Moreover, out of the 471 surveyed from state-sector primary schools, 52 were male and 419, female.

Table 4.1. Participant demographics

Teachers	School	
	Male	**Female**
Public primary schools	52	419
Total	471	

4.4.2.2 Research Instrument: Survey Questionnaires

The advantage of a questionnaire is that it is practical and permits the collection of substantial amounts of information from a large number of people within a short period of time and in a relatively productive way. The data can be very quickly analysed statistically, using software packages. Questionnaires are standardised and rigid, but open-ended questions can also be included. A participant information sheet (Appendix A) was enclosed with the questionnaire to encourage the teachers to answer the questions frankly. In addition, the participant information sheet also asked them to avoid providing incorrect responses, and to return the questionnaire in the envelope provided. This procedure indicated the importance of their views for the success of the research. The participants would also understand from the information sheet that the information they provided would be interpreted as a potential solution to the challenges they face. However, despite the fact questionnaires are considered reliable, they lack validity, as the researcher obtains only a limited amount of information, without much explanation. Therefore, the researcher must

make assumptions when presenting the findings. Nevertheless, questionnaires were used in this instance, as they made it possible to identify the difficulties faced by the teachers when teaching pupils with SpLD.

4.4.2.3 The Questionnaire Design

The literature related to the current study was reviewed before the questionnaire was developed (Appendix B). The first section of the questionnaire is related to the demographic characteristics of the participants and consists of multiple choice questions about their biographical background (7 items). The second section consists of questions related to dyslexia, specific learning difficulties, and the general learning characteristics of pupils who experience difficulty with learning (10 items). The third section pertains to the instructors' awareness of the self-concept/self-esteem of pupils with SpLD (dyslexia) (14 items). The fourth section pertains to educational issues related to early intervention (10 items). Finally, the fifth section consists of questions on the obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait (14 items).

The questionnaire used Likert-scale questions. The scale used for this study included a total of 55 items. Each item required a response on a four-point Likert scale, ranging from 0 (strongly disagree) to 3 (strongly agree) (Dawes, 2008). There were also statements that were worded positively, while others were stated negatively.

The questionnaire had to reflect the culture in which it will be used and not the culture in which the original instruments were developed. Moreover, the researcher was concerned about issues relating to originality and therefore did not use pre-existing scales which may not be relevant to the research questions in the current study. Therefore the questionnaire was developed from the literature. The literature search helped identify concepts and constructs which were included in the questionnaire (see Table 4.2). In order to evaluate the construct and criterion validity and reliability the instrument was pilot tested on sample of teachers (see section 4.4.2.5. Validating and Piloting the Survey Questionnaire).

Table 4.2. Constructs derived from literature to develop the questionnaire

Literature	Constructs	Statements/Items
Reid (2012), Elliott & Grigorenko (2014), Schulte-Körne (2010), Duff et al. (2008), Nevills & Wolfe (2008), Garner (2014), Rose (2009a), Jones & Kindersley (2013), Aladwani & Al Shaye (2012)	Items related to dyslexia (SpLD), general learning characteristics of pupils who experience difficulty with learning(10 items)	1. I have enough knowledge of the definition of reading difficulties to support pupils with learning difficulties (dyslexia). 2. I fully understand the definition of dyslexia. 3. I have enough familiarity with the characteristics of pupils with specific learning difficulties (SpLD)/(dyslexia) to be able to support them. 4. I have enough familiarity with the screening of pupils with SpLD (dyslexia) to be able to support them. 5. I have enough familiarity with the diagnosis of pupils with SpLD (dyslexia) to be able to support them. 6. I have enough familiarity with the treatment of pupils with SpLD (dyslexia) to be able to support them. 7. Children can grow out of dyslexia. 8. You cannot identify dyslexia until a child is 8 years old. 9. Dyslexic pupils always fail to follow instructions that guide them. 10. Approximately one in eight children in a classroom will say they have dyslexia.
Reid et al.(2013), Burden (2008 a & b), Stevens (2012), Terras et al. (2009), Glazzard (2010), Riddick (2006), Humphrey (2001), Snowling et al. (2007)	Items related to instructors' awareness of the self-concept/self-esteem of pupils with SpLD (dyslexia) (14 items)	1. Pupils with specific learning difficulties (SpLD) (dyslexia) have negative self-concept. 2. Pupils with SpLD (dyslexia) have negative self-esteem. 3. Pupils with SpLD (dyslexia) suffer from anxiety. 4. Pupils with SpLD (dyslexia) suffer social isolation. 5. Pupils with SpLD (dyslexia) suffer from shyness. 6. Pupils with SpLD (dyslexia) suffer from insecurity. 7. It is hard for pupils with SpLD (dyslexia) to make friends, because of their poor self-concept and low self-esteem. 8. Pupils with SpLD (dyslexia) feel different from their peers. 9. Some pupils with SpLD (dyslexia) react badly because they have learning difficulties. 10. Pupils with SpLD (dyslexia) worry about what people think of them. 11. Pupils have poor self-concept because of delayed intervention. 12. The most effective intervention strategies for pupils with SpLD (dyslexia) focus on their self-concept and self-esteem. 13. Early intervention has an impact on pupils with SpLD (dyslexia) by increasing their self-concept and self-esteem. 14. Appropriate classroom rewards should be provided to enhance self-concept and self-esteem.
Gaad (2015), Alborno & Gaad (2014), Terras et al. (2009), Elbeheri &	Items related to educational issues related to early	1. You are familiar with the concept of early intervention. 2. The appropriate age to start early intervention is in first grade. 3. You have the skills to apply early intervention programmes.

Everatt (2007), Elbeheri et al.(2009), Haynes & Mahfoudhi (2009), Kelly & Phillips (2016), *Handler & Fierson (2011)*	intervention (10 items)	4. The family provide useful input in the follow-up and supervision process for early intervention. 5. When teaching, you have sufficient knowledge of multi-sensory approaches as a kind of early intervention. 6. There is a scarcity or total lack of suitable books and resources for early intervention in the school library. 7. The school periodically runs workshops on early intervention. 8. Students are anxious about reading because of delayed intervention. 9. Students are likely to be unmotivated because of delayed intervention. 10. Early intervention needs to take place in a separate room from the main classroom.
Wilson (2014), Elias (2014), Snowling (2013), Gaad (2015), Kellar-Guenther et al. (2014), Duff & Clarke (2011),	Items related to obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait (14 items).	1. The length of the curriculum does not allow me time to include early intervention programmes. 2. The length of the lessons does not permit me to include intervention programmes. 3. The high number of students in the class reduces the opportunity for early intervention. 4. Teachers are not sufficiently aware of early intervention. 5. Teachers are not sufficiently prepared through training courses. 6. It difficult for teachers to assess pupils using the activities that the textbook recommends. 7. The large amount of work assigned to Arabic language teachers outside the classroom does not allow time to apply early intervention. 8. The large number of lessons per language teacher is an obstacle to early intervention. 9. The unavailability of appropriate educational aids is an obstacle to early intervention. 10. The unavailability of financial support for the school is an obstacle to implementing early intervention. 11. There is a lack of guidance for early intervention in the teachers' handbook. 12. There is a lack of cooperation from parent(s) in delivering early intervention. 13. There is a lack of clarity in the school administration's policy regarding early intervention. 14. Some language supervisors focus on coordination rather than on objectives, which thus reduces the importance of early intervention.

4.4.2.4. Translating the Questionnaire

Once the questionnaire was finalised, it was translated from English to Arabic. Translation is considered extremely important, because most of the Kuwaiti teachers were more proficient in Arabic than in English and therefore, translation was crucial for ensuring that the questions would have an identical meaning to all participants (Saunders et al., 2007).

The researcher was aware that while translating the research instruments, proficiency in the source and target languages alone is not sufficient. This was because translation is claimed to be a multifaceted activity and also involves studying the context of the translation for instance culture, as well as the the knowledge and the experience of the translator (Hatim & Munday, 2006; Hatim, 2014). This suggests that the researcher should be culturally sensitive (Beauford et al. 2009).

A parallel translation method, as suggested by Douglas and Craig (2007), was then used. The questionnaire was translated from English into Arabic by two professional translators. The services of an independent translator from Kuwait were used to translate the questions from Arabic to English by another person. The reason for using this strategy was to ensure that the richness, meaning, and cultural flavour are not lost in translation, for example research related terminology, appropriateness of wording, nuances, and idiomatic expressions (Hatim, 2014).

An independent academic researcher, who was fluent in both English and Arabic and aware of intervention programmes for dyslexia, was invited to evaluate the two translations executed by the two independent professional translators and to compare them with the original English-version questionnaire. As the questions were translated into Arabic, the opinions of senior lecturers and professors from PAAET were sought, these being experts in Arabic, to ensure that there was no deviation from the intended meanings of words. After any differences in the Arabic wording had been discussed, amendments were made. When the translators and the independent academic researcher had reached a mutual agreement, the questionnaire was ready for distribution. The process also enabled cultural and linguistic validation of the translated instrument.

4.4.2.5 Validating and Piloting the Survey Questionnaire

A questionnaire's validity will primarily depend on its reliability. A questionnaire may only be considered as valid, if it truly measures what it is intended to measure (Joppe, 2000). Correspondingly, reliability is defined as the extent to which results obtained via a questionnaire or any other research instrument remain constant over time and give an accurate representation of the total population under study (Joppe, 2000). "Reliability and validity are considered to be the tools of a positivist epistemology" (Winter, 2000, p.7). In order to reduce any error in measurement, a valid and reliable questionnaire therefore needs to be designed. A measurement error is the "discrepancy between respondents' attributes

and their survey responses" (Groves, 1987; p.162). In this case, the researcher took reliability into account, so that similar results would be obtained by the questionnaire, if it were to be administered again in future using similar participants and under the same conditions.

Furthermore, the use of ambiguous questions can render a questionnaire inconsistent and therefore, attempts were made to avoid ambiguity. By piloting the questionnaire or collecting data from similar subjects prior to the actual research (main study), reliability can be ascertained. Piloting the questionnaire also helps improve the validity of the questionnaire (Peat et al., 2002). This can be achieved by asking the participants (a sample chosen for the pilot study) for their opinions on the research instrument as a whole.

Before piloting the questionnaire, participant information sheets were distributed to teachers, explaining the objectives of the research. The information sheet was prepared by following suggestions put forward by Bell (2014). These suggestions included: the time required to complete the questionnaire, asking participants if the instructions were clear and to indicate any vague questions; asking participants why these questions were not clear and whether any questions were partial or objectionable, and finding out whether any particular question or topic related to the study had been omitted. Moreover, the participants were asked to make suggestions and comments on the layout of the questionnaire (Bell, 2014). This served as the information sheet for both the pilot study and main study.

The survey questionnaire was piloted and validated with 15 teachers and head-teachers selected purposively from schools in Kuwait, and four teachers selected from schools in the UK. Moreover, the scale's validity was measured by a number of experts (five Arabic language teachers and three Arabic language supervisors), as well as a professor specialising in Arabic from the Educational Research Department. This was to ascertain the compatibility of the test items with its content, on which the ratio of the agreement was high among these experts.

The data from the pilot study were critically studied and minor revisions were made to the instrument. The pilot survey enabled clarification of the questionnaire and ensured that it would measure the responses of the teachers in the appropriate area. Questions that the teachers had not understood were re-worded. Besides, changes were also made to the questionnaire/items, by rewording some of the statements and eliminating ambiguous items, rendering them clear to the study participants.

Moreover, the need for reliability was considered, as mentioned previously, given that the study seeks to obtain the same results from the questionnaire (measure), if it were to be administered again to similar subjects under comparable conditions. However, inferring reliability is difficult to achieve in practice and so one solution would be to consider testing the questionnaire on a small proportion of the study sample on two different occasions. One threat to reliability is in fact ambiguity in the questions and so every attempt was made to avoid this. As the questions were translated into Arabic and back-translated into English, senior lecturers and professors from PAAET in Kuwait were consulted, given their expertise in both Arabic and English, so as to ensure there was no deviation in the meanings of words.

4.4.2.6 Methodological Changes in the Light of the Pilot Study

After the pilot study, many methodological changes (adjustments) were introduced, namely:

- The time spent answering the questionnaire was reduced to 10 instead of 20 minutes as the participants were able to complete it in less than 10 minutes.
- Some of the expressions were re-worded to clarify meaning in the information sheet for the research study.
- The phrase 'closest to the correct answer' was added to all sections in the questionnaire answer sheet instructions, so that the participant could answer all the questions.
- Some terms were replaced to clarify their meaning in the second section of the questionnaire; more specifically the use of words 'more familiarity'. In the third section, this rewording involved item 12 ('self-esteem' and 'self-concept' instead of 'self-belief', in addition to items 4 ('social isolation' instead of 'loneliness') and 5 ('shyness' instead of nervousness'.
- All items in the fourth section of the questionnaire were reworded, for example using synonyms for 'scarcity', 'unmotivated' instead of 'unenthusiastic'.

4.4..2.7 Administering the Questionnaire

The questionnaires were sent out in December 2013. Before implementing the questionnaires, there were several procedures to be carried out in Kuwait, before the start of the implementation process:

1. A mandatory endorsement letter was requested from PAAET, the body sponsoring the present doctoral research. This letter was submitted to the relevant authorities in the Ministry of Education (Department of Educational Research) to confirm the researcher's status as a postgraduate student and that the research was related to learners with special needs.

2. The researcher visited the Department of Educational Research to seek approval to administer the questionnaire and start the application process. The researcher requested a task facilitation letter that would allow him to use the questionnaire (Appendix C), stating his name and the research study title, to be forwarded to the directors of educational districts. In addition, the administration approved the questionnaire after it had been revised by a professor competent in Arabic, before authorising it with their official stamp.

3. After receiving the approval note, the researcher approached the respective educational districts in pursuit of a final task facilitation letter (Appendix D), which is basically a formal document to facilitate the data collection procedure. This official document was addressed to the principals of the primary schools under study for final approval. Once this was accomplished, the researcher was free to proceed with the practical aspect of the questionnaire.

4. After successfully completing the paperwork for the above process, the present researcher started visiting the schools under study, in order to distribute the questionnaires. In several meetings with the principals or assistant principals at these schools, the head of the Arabic Language Department would normally be invited to view the questionnaires.

Several principals showed an interest in the current research study and offered their unconditional help when its aims and significance was explained to them in detail. As such, they sought to motivate the participants and encouraged them to take the questions seriously, by stressing the importance of their opinions for the success of the research. It was also clarified to the participants that the questionnaire data would be used to put forward a number of educational suggestions and ideas, in the hope of improving and reforming existing practice. As a result, the researcher expected to help overcome some of the problems and obstacles facing the learners. In addition, the researcher used the attached information sheet to establish whether the respondents wished to participate in a personal

interview, which would take place at a later stage. Finally, all the participants were requested to return the questionnaire using the envelope provided.

4.4.2.7 Difficulties Facing Implementation

The researcher faced a number of difficulties when administering the questionnaire. These practical issues are highlighted as follows:

1. The researcher encountered some difficulties with the Educational Research Department of the Ministry of Education on the day when the task facilitation letter was expected to be issued. The issuance process required no more than five minutes, but the administrative member of staff in charge announced that the letter would take at least three days to prepare. After clarifying that this was for a postgraduate course abroad, the abovementioned staff member informed me she had to wait for the principal's signature and stamp, which would take approximately three hours; a situation the present researcher just had to accept, in order to be able to proceed with the rest of the paperwork and data collection procedures. After waiting for two and a half hours, the letter was finally ready, but the researcher was frustrated at the fact the assistant principal, who had the authority to sign and stamp the letter had in fact been available to do so for the whole of that period.

2. Another difficulty was encountered in Al-Ahmadi Educational District. After obtaining the letter from the Educational Research Department, final approval had to be sought from the educational districts, in accordance with Ministry of Education rules. On travelling to meet the person responsible for issuing the letter, the present researcher was informed that he would have to wait two days. The researcher subsequently explained that he had previously accessed a same-day service in another educational district, but in this instance, he was informed the principal could not currently be contacted and it would be more convenient to return the following morning to collect the letter. The researcher complied and returned on time the following day, but the letter still had not been issued. He was then advised to either wait or phone the office later. Despite being given a contact number, the researcher failed to reach the person concerned, or indeed, anyone else that day. Finally, the letter was obtained on the third request. What makes this particular incident worth noting is that it took place far from the researcher's

hometown and thus wasted valuable time, which could have otherwise been invested elsewhere in the data collection process.

3. The third difficulty involved the timeframe for returning the questionnaires, which was just two days, although it should be borne in mind that it generally took no more than 10 minutes to complete a questionnaire. With some of the schools, there was a delay and so the researcher requested the principals to hand the completed questionnaires to security guards in sealed envelopes, ready for collection in the evening.

4.4.3 Qualitative Data Collection

> Most qualitative research probably is based on interviews. There are good reasons for this. By using interviews, the researcher can reach areas of reality. (Denzin & Lincoln, 2008, p.869)

Following analysis, the evidence from the pilot study revealed many potential challenges to the implementation of early intervention programmes to address learning difficulties amongst pupils. In order to explore the views and opinions of teachers and other stakeholders, interviews were then conducted. These more precisely identified the reasons for the current status and shed more light on the experiences of those facing such challenges.

4.4.3.1 Selection of Participants for the In-depth and Focus Group Interviews

The in-depth and focus group interviews took place using a sample of 35 participants comprising 24 Arabic language teachers, with 2 senior Arabic language teachers (Table 4.3). These were selected from 14 primary schools across a number of different geographical areas.

Furthermore, there were interviews conducted with nine Arabic language supervisors from different educational districts; two of these being head Arabic language supervisors.

Table 4.3. Participants' demographics (interviews/focus groups)

School	Senior Teachers		Teachers	
	Male	Female	Male	Female
Primary schools	1	1	11	13
		2		24
Supervisors	Head of supervisors		Language supervisors	
	Male	Female	Male	Female
Arabic language supervision	0	2	2	5
		2		7
Total			35	

The focus group interviews took place with a sample consisting of four groups.

> Group 1: 1 senior teacher and 4 teachers

> Group 2: 1 senior teacher and 3 teachers

> Group 3: 1 head supervisors and 3 language supervisors

The sample size for each group was determined based on the recommendation that four to 12 respondents are ideal for group discussions (Carlsen & Glenton, 2011).

4.4.3.2 Research Instrument: Interviews

Interviews are the typical method associated with qualitative research.

> Interviews are often said to 'reach the parts which other methods cannot reach'" and "interviewing allows a researcher to investigate and prompt things that we cannot observe. We can probe an interviewee's thoughts, values, prejudices, perceptions, views, feelings, and perspectives. We can also elicit their version or their account of situations which they may have lived or taught through: his or her story. (Wellington & Szczerbinski, 2007, p.81)

Interviews are, in essence, a conversation between two or more people. As Kvale rightly states: "an interview is literally an inter-view, an interchange of views between two persons conversing about a theme of common interest" (Kvale, 2008, p.5). Interviews, which may otherwise be considered as conversations, based around a specific and relevant topic are becoming more and more common in practice for the development or expansion of knowledge production. The type of interview used to this end is called a research interview, since "the research interview is an inter-view where knowledge is constructed in the inter-action between the interviewer and the interviewee" (Kvale, 2008, p.1).

In comparison with questionnaires, data collection can take place in a more flexible way through in-depth interviews. In the present study, it is therefore such in-depth interviews

which were used to gather deeper information. These consisted of semi-structured interviews, carried out with teachers on a face-to-face basis. Wherever necessary, complex questions were explained to the interviewees by the present researcher, during the interview procedure. Open questions were put to the participants, with the researcher picking up on any non-verbal clues that would indicate issues of relevance to the interviewees and it was observed how they responded to different questions. The reason for using semi-structured, in-depth interviews was to allow scope for modifying or adapting the questions, in accordance with respondents' answers. Prompts were also used, namely further questions or invitations to discuss matters which had not been mentioned by the respondent and to encourage them to talk more. By using prompts, the researcher encouraged the respondents to elaborate on any issues they saw as important, providing these were specific and related to the research questions. In addition, the interviewer, namely the researcher maintained a schedule with a list of prompts, which meant that the relevant questions were put to the interviewees. In order to complement the prompts, probes were also used, wherever further clarification was required in a response. These probes consisted of probing questions and they were reflective or emphatic (for example, 'So what you're saying is…?'), hints (for example, 'you mentioned...), or pause probes (for example, saying nothing, but giving the respondent the opportunity to continue).

Aside from the above, a primary reason for selecting the semi-structured for of interview was to be able to clearly explain the study aims, while also allowing for the correction of any mistakes or ambiguities becoming evident in the interview questions. Furthermore, other important aspects, which the researcher may not have considered during the planning process, could become apparent during the interviews themselves. Another important aspect to be taken into account is the capacity for both verbal and non-verbal behaviour to be observed and interpreted in the participants. Such features are characteristic of semi-structured interviews and differentiate them from many other research instruments.

Here, the researcher exercised a minimal level of control, despite the fact that interpretivism does not dictate such control over the process for a qualitative researcher. This was achieved by putting the questions to the interviewees in the correct order and conducting the interviews in an appropriate venue, whereby the participants would feel comfortable about providing accurate responses (Phellas et al, 2011). Moreover, given the risk of an interviewer introducing bias in qualitative interviews, the researcher avoided leading questions, which could have elicited desirable responses from the interviewees, thus affecting the reliability of the results.

4.4.3.3 Research Instrument: Focus Groups

A focus group interview is defined as a group interchange, pertaining to the perspectives of individuals or a group when interpreting specific topics or experiences (Denzin & Lincoln, 2008). They are consequently a special type of group, aimed at gathering information from a specific target audience (Bloor et al., 2001), usually consisting of small groups of around four to six participants, convening to discuss set subjects. In the present study, these discussions were guided by the researcher.

Focus group interviews were determined for this study, as a means of more detailed examination of issues arising in the questionnaire results. The researcher particularly sought more insight into the vocabulary commonly used for discussing such topics, which could in turn be used when designing questionnaires or other research tools in future research. Additionally, the focus group interviews in the present study would complement the quantitative survey. Generally speaking, focus groups can take place at any point during evaluation, but they were conducted after the survey and semi-structured interviews in this study.

4.4.3.1 Considerations before Piloting and Administering the Individual Interviews and Focus Group Discussions

The success of an interview is dependent on the following points, applicable to the current study:

> a) The social characteristics of the interviewer, along with his ability and need to answer any questions addressed to him by the respondents.
>
> b) The respondents' and interviewer's characteristics: the success of an interview fully depends on the communal skills of the researcher, like being able to offer a warm welcome, their level of understanding related to the topic and capacity to deal with any kind of situation, whether verbal or non-verbal.
>
> c) The time, place and atmosphere of the interview venue: if the venue and time of the interview are suitable, the atmosphere will be pleasant between the respondent and the interviewer and so the interview will be a success.
>
> d) The interviewer should first ensure that he has accurate background information and then ask questions with sensitivity, so that the respondent is not confronted with any stumbling blocks. (Warwick & Lininger, 1975, p.184)

The researcher also took into account the disadvantages of the focus group method when conducting the focus group interviews. Many researchers, such as Denscombe (1998), Denzin and Lincoln (2005) and Abdullah (2006) agree that a focus group interview may be dominated by one or very few participants, while others have less of a chance to express their points of view. It also restricts the involvement of those who feel embarrassed about discussing the subject in the company of others (Abdullah, 2006). However, these limitations were considered when conducting the group discussions.

People who feel embarrassed about discussing sensitive issues may not wish to share their private experiences in public (Darlington & Scott, 2003), or else they may not wish to speak freely and express their thoughts on a subject without getting emotional and sensitive (Denscombe, 1998). The purpose of a focus group is to limit the amount of time given to each interviewee to express their thoughts (Darlington &Scott, 2003). However, Denscombe (1998) adds that it is difficult to record the exchange of views that takes place, because people speak at the same time and speakers do not always give each other much of a chance to fully express themselves.

To ensure the success of the focus group interviews, the researcher attempted to avoid the pitfalls described above and as Wellington (2015) states, managed and controlled situations with appropriate skill. In fact, the focus group interviews did not significantly differ from the individual interviews, in that there were certain factors the interviewer needed to bear in mind, such as flexibility, objectivity, reassurance, persuasiveness and good listening skills (Denzin & Lincoln, 2005). Moreover, the interviewer needed to remain sensitive regarding complex topics and avoid disapproving patterns of group interaction. In other words, the roles of directive interviewer and moderator needed to be equally balanced (Denzin & Lincoln, 2005). This also involved inspiring and cheering on those who did not participate much. In any case, there is usually some motivation from the researcher, who initiates discussion by introducing the topic in the first place (Denscombe, 1998). In addition, with respect to topics of high sensitivity, Mariampolski (1989) suggests starting the focus interview in a relatively safe zone and asking everyone to express their views. Until and unless the audience shows an inclination to move on to the sensitive topics, the researcher should avoid doing so. Finally, to ensure the proper eye contact necessary for a good interview, the interviewer should personally attend to the seating arrangement (Wellington, 2015). If the proceedings are to be audio- recorded, then the interviewer must find somewhere to hide the microphone, thus implying the need for a higher quality recording system than the one used for face-to-face interviews (Wellington, 2015).

4.4.3.2 The Validity and Piloting of the Individual Interviews and Focus Group Discussion

In this research, the researcher drew upon what he considered to be 'expert' opinions on its validity, as mentioned earlier. Therefore, the interview questions were presented to personnel with extensive experience in similar fields. The researcher subsequently made several changes to the questions after gathering opinions from these experts, who raised concerns over certain issues. The researcher also started training in individual and focus group interviews with associates from the School of Education at the University of York, amongst others, before implementing this technique. This ensured proper guidance on posing questions, managing sessions, recording responses and striking a balance when providing equal opportunities for all participants to respond. Hence, the researcher prepared himself for the interview process by learning how to ask questions appropriately, listen intently and encourage participants to speak more enthusiastically.

4.4.3.3 Development of Questions for the In-depth Interviews and Focus Groups

Expert interviewing mainly depends on preparation, with the researcher acquiring as much knowledge as possible to build up a good knowledge base. In this instance, this took the form of an extensive literature review. This process highlighted how researchers or interviewers must do their utmost to become quasi-experts in their field of investigation (Meuser & Nagel, 2009). The knowledge gained was used to develop the interview questions.

The main foci of interest in the present research interviews were the challenges faced by the teachers and their views on government policy for programmes of intervention. Two sets of interview questions were prepared for the participants. These consisted of 14 items for the Arabic language teachers and 13 items for the Arabic language supervisor (see Appendix E). The questions addressed participants' perspectives on the challenges facing teachers when implementing intervention programmes for pupils with SpLD in state primary schools in Kuwait. The qualitative research questions that will be addressed are presented below.

1. What are the perspectives of Arabic language teachers and educators of how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

2. What are the strategies adopted by supervisors and decision-makers, as ways of overcoming any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

The interviewees were briefed prior to the start of each interview session and this involved informing them of the interview's purpose and anticipated duration. The participants were also asked whether the interview could be audio-recorded and whether their full name could be used. These details had of course been requested and obtained during the rapport phase of the study, but were requested once again here for the sake of clear understanding and good interview etiquette (Kvale, 2008).

4.5 Ethical Considerations and Fieldwork Difficulties

Prior to the preparation of the individual and focus group interview questions, ethical issues were considered, specifically in relation to qualitative interviewing, after which, the researcher took such issues into account when preparing the above-mentioned questions. In this regard, Silverman states:

> The use of qualitative interviews as a data generation method raises a number of general ethical issues, and there will also be specific ethical concerns connected to any one particular project. (Silverman, 2013, p.95)

The procedures stipulated by the Department of Education Ethical Review Policy at the University of York were then followed so that approval could be obtained for conducting the research. In the process of applying these procedures, the Participant Information Sheet was appropriately drafted by the present researcher. It was subsequently sent to all those who intended to participate in the study. The researcher was also able to prepare an appropriate informed consent form, in order to obtain permission from the participants to gather data from them and use it in the research.

According to Kuwaiti culture and tradition, the researcher felt that the values of Kuwaiti society could affect the participants' responses in the study. Moreover, the ethical issues raised by this approach needed to be considered by the Kuwait Ministry of Education in their approval for conducting interviews with teachers. Moreover, the study aims needed to be clear and not ambiguous. This was important, so that they would be aware that this research was an attempt to identify the type of educational reform that could be executed for early intervention and not an attempt to assess the work of the schools. On this basis, the researcher sent a letter to the Ministry's Arabic Language Department, stating the aims

of the study and the purpose of the interviews. In addition, procedures were put in place to obtain personal approval, in order to reassure the administration concerning the aims of the research.

Secondly, consent was required from the Arabic language teachers and Arabic language supervisors intended as interview participants. This is was particularly important, because there was the possibility that some of them would hesitate to yield certain information, or to mention their strengths or weaknesses, given that such information could incur penalties being levied against them from higher up the hierarchy.

Thirdly, the issue of audio-recording the interviews potentially posed a problem for female Arabic language teachers or supervisors, on religious or social grounds, so that some may withhold their consent for their voices to be recorded. On the other hand, some officials could regard this process as a supervisory action and also refuse to be audio-recorded. The present researcher was therefore requesting permission from the participants to conduct a process which may conflict with their cultural or social values, or else pose risks to them in their professional lives. However, after ensuring full transparency in clarifying the study aims and guaranteeing confidentiality, as well as by explaining the coding system to be used in the interviews to replace names, so that the data presented in the dissertation would remain anonymous, with the recording also being deleted on completion of the study, the researcher obtained approval from the majority of the participants. The only respondents who refused to be audio-recorded were one teacher and one administrator, but these were interviewed in person, with the researcher writing notes by hand, having obtained their permission to so and gaining their trust. Thus, the interview process was not completely devoid of problems, but the difficulties were resolved. Furthermore, appreciation, enthusiasm and a sense of responsibility was generally evident amongst the respondents when providing their responses.

4.6 Chapter Summary

Many issues related to the respective research methodology were discussed in this chapter, including the reasons for applying both qualitative and quantitative research methods, which resulted in the use of multiple methods to achieve the research aims. Moreover, this chapter contains justification for the selection of participants and for the methods and procedures used, as well as stating ethical considerations.

It was subsequently evident that the use of more than a single method of data collection contributed to fulfilling the current study aims. In fact, the different methods used complemented each other, because key issues were identified through the questionnaire survey, indicating the teachers' understanding and knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia), as well as of the educational issues surrounding early intervention. It also highlighted the major obstacles to the implementation of early intervention in primary schools. In order to elaborate on these key points, semi-structured interviews explored these issues in greater depth, identifying the reasons underlying the challenges involved I applying early intervention. The next chapter will now examine the findings from the quantitative method used, namely the questionnaire survey.

Chapter Five: Quantitative Findings from the Data

5.1 Introduction

In this chapter, the main findings from the analysis of the questionnaire data are presented. These analysed questionnaire responses consist of sections relating to general information on teachers' understanding of pupils with SpLD (dyslexia), their knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia), educational issues related to early intervention, and the obstacles and barriers that prevent the implementation of early intervention in primary schools/education in general.

The data from the questionnaires were quantitatively analysed using the Statistics Package for the Social Sciences (SPSS) software. This took place in two phases: descriptive analysis, factor analysis and principal component analysis. The descriptive statistics derived from the questionnaire responses (teachers' characteristics) are summarised and discussed here. Factor analysis was conducted to identify factors among any variables observed and to describe the interrelationships between the variables. Factor analysis was also applied to reduce data into dimensions for further analysis. The rationale for using Exploratory Factor Analysis (EFA) was its history of use in the current research area and because it allows the researcher to explore the main dimensions to generate a theory (Williams et al., 2010).

The factor analysis was performed using principal component analysis which resulted in a clean factor structure. The broad purpose of factor analysis was to summaries data so that relationships and patterns can be easily interpreted and understood. It was used to regroup variables into a limited set of clusters. It helped to isolate constructs and concepts. The aim was to find to discover patterns in a set of variables, which was the reason why factor analysis followed descriptive statistics. It allowed a simple interpretation of observed data which is referred to as parsimony (Yong & Pearce, 2013).

In this instance, the analysis began by summarising the variables into a correlation matrix and determining whether the sample size was sufficiently large (>100). Moreover, the criterion, eigenvalue =1, or the Kaiser criterion for determining the number of factors or components to include was used (an eigenvalue >1.0, which accounts for a greater amount of variance). The factorability tests included the Kaiser-Meyer-Olkin (KMO) measure and Bartlett's Test of Sphericity. Factors with an eigenvalue of one or more were retained.

Through Principal Components Analysis (PCA), the number of variables was reduced. The various steps or tests carried out included extracting and retaining factors (eigenvalue >1.00), excluding variables based on the table of communalities (for ensuring that the communality for most of the variables was greater than 0.50), using the 'Rotated Factor Matrix' to see if each variable had a substantial loading on a factor (0.40 or higher), excluding outliers and finally interpreting the substantive meaning of the retained components.

Pooling together the results of EFA and PCA, this chapter aims to meet the following objectives and to find answers to the research questions outlined in Chapter Four.

1. To assess whether teachers and the schools they represent are implementing early intervention programmes for learners with SpLD (dyslexia).
2. To scrutinise the SpLD/dyslexic pupil's self-concept/self-esteem from the teacher's point of view.
3. To assess knowledge of the impact of dyslexia on the self-concept of learners with SpLD (dyslexia) from the teacher's point of view.
4. To examine teachers' perceptions of the impact of early intervention implementation on the self-concept/self-esteem of pupils with SpLD (dyslexia).
5. To gain insights into teachers' experiences and the challenges facing them in the implementation of early intervention programmes for pupils with SpLD (dyslexia).
6. To explore the perspectives of Arabic language teachers, instructors, and the major decision-makers on how to overcome the challenges facing the implementation of early intervention for pupils with SpLD (dyslexia) in primary schools.

In particular, the aim is to assess the teachers' knowledge and awareness of dyslexia and the implementation of early intervention programmes. The chapter also aims to provide further insights into the experiences of teachers and some of the challenges they face when applying early intervention programmes.

5.2. Descriptive Analysis

5.2.1 Participants' Understanding of Pupils with Specific Learning Difficulties (SpLD) (Dyslexia)

This section provides detailed information about responses to questions on the first sub-topic; in particular, what teachers understand about pupils with SpLD (dyslexia). Table 5.1, below, illustrates individual responses to these questions on teachers' understanding

of pupils with dyslexia. To facilitate the presentation of the findings, the responses were classified into two groups: 'strongly agree/agree' and 'disagree'/'strongly disagree'.

The results clearly indicate that the majority of the participants (81.5%, n=384 out of 471 participants) strongly agreed/agreed they had sufficient knowledge of the definition of reading difficulties to support pupils with dyslexia. Similarly, 66.4% (n=313) of the interviewees strongly agreed/agreed with this statement and considered that they fully understood the definition of dyslexia. Meanwhile, 58% (n=273) believed they were familiar with the characteristics of pupils with SpLD (dyslexia) and could therefore support them. At the same time, however, a large proportion (42%, n=198) of the teachers interviewed disagreed that they were sufficiently familiar with the characteristics of pupils with SpLD (dyslexia) to be able to support them. This would indicate that some of the teachers would probably need additional training to understand the unique challenges faced by children with dyslexia in class, in order to be able to help them. Furthermore, 59% (n=278) of the participants reported that they were able to diagnose pupils with dyslexia, although 41% disagreed with this statement. On the other hand, around 76.4% (n=360) of the respondents agreed that children could 'grow out of dyslexia'. This is alarming when 66% of the teachers claimed to fully understand dyslexia. Meanwhile, 49.3% (n=232) agreed that dyslexia cannot be identified until a child is eight years old. These responses are proof that the teachers lacked full awareness of the characteristics of dyslexia.

A very high proportion (58.2%, n=274) of the participants, disagreed that pupils with dyslexia always fail to follow instructions that guide them. The teachers' answers were similar to the last statement examined, as about 42% (n=198) agreed and 58% (n=273) disagreed that approximately one in eight children in the classroom were dyslexic. In general, most teachers had a fair knowledge of their pupils with SpLD (dyslexia).

Table 5.1. Teachers' responses concerning understanding pupils with specific learning difficulties (SpLD) (dyslexia)

Statement	Teachers who Agree/ Strongly Agree		Teachers who Disagree/ Strongly disagree	
	n	%	n	%
1. I have enough knowledge of the definition of reading difficulties to support pupils with learning difficulties (dyslexia).	384	81.5	87	18.5
2. I fully understand the definition of dyslexia.	313	66.4	158	33.6
3. I have enough familiarity with the characteristics of pupils with specific learning difficulties (SpLD) (dyslexia) to support them.	273	58	198	42
4. I have enough familiarity with the screening of pupils with SpLD (dyslexia) to support them.	296	62.8	175	37.2
5. I have enough familiarity with the diagnosis of pupils with SpLD (dyslexia) to support them.	278	59	193	41
6. I have enough familiarity with the treatment of pupils with SpLD (dyslexia) to support them.	232	49.3	239	50.7
7. Children can grow out of dyslexia.	360	76.4	111	23.6
8. You cannot identify dyslexia until a child is eight years old.	232	49.3	239	50.7
9. Pupils with dyslexia always fail to follow instructions that guide them.	197	41.8	274	58.2
10. Approximately one in eight children in a classroom has dyslexia.	198	42	273	58

5.2.2 Respondents' Knowledge of Self-concept/Self-esteem amongst Pupils with Special Learning Difficulties (SpLD) (Dyslexia) at School

Table 5.2, below, presents responses regarding the participants' knowledge of the self-concept of pupils with SpLD (dyslexia) at school. Overall, the responses vary regarding their knowledge in this area and as with the previous statement examined, they indicate the teachers' confusion with respect to the problem of dyslexia in children.

The results indicate that 59.8% (n=289) of the participants agreed that pupils with dyslexia have a negative self-concept. Interestingly, 55% (n=259) of the teachers interviewed agreed that pupils with SpLD have low self-esteem and 76.6% (n=361) agreed that pupils with dyslexia suffer from anxiety, which confirms the teachers' observation that anxiety is one of the frequent emotional symptoms of dyslexia. It is also claimed that social immaturity is often encountered in children with dyslexia, which could make them awkward in various social situations (Sako, 2016). Around 59.8% (n=282) of the respondents strongly agreed or agreed that pupils with dyslexia suffer from social isolation. A large majority of the interviewees (72.8%, n=343) also agreed/strongly agreed that pupils with dyslexia suffer from shyness related to social isolation and feel uncomfortable

in social situations. Furthermore, one would expect pupils' low self-esteem to lead to insecurity and failure.

To further compound the above findings, 58.6% (n=276) of the teachers interviewed strongly agreed/agreed that pupils with dyslexia suffer from insecurity, while 71.3% (n=336) of the teachers agreed that pupils with dyslexia feel different from their peers. Moreover, a large proportion of the teachers (72.4%, n=341) agreed that children with SpLD (dyslexia) generally react to their learning difficulties with frustration and around 76.2% (n=359) of the interviewees agreed that pupils with dyslexia worry about what other people think of them. Accordingly, the majority of teachers interviewed (73.4%, n=346) agreed that pupils have a poor self-concept because of delayed intervention and 90.6% (n=427) strongly agreed/agreed that early intervention has an impact on pupils with dyslexia by increasing their self-esteem. Finally, 93% (n=438) of the teachers believed that providing appropriate classroom rewards would increase such pupils' self-concept and self-esteem.

Table 5.2. Teachers' responses concerning knowledge of the self-concept/self-esteem of pupils with specific learning difficulties (SpLD) (dyslexia) at school

Statement	Teachers who Agree/ Strongly Agree		Teachers who Disagree/ Strongly disagree	
	n	%	n	%
1. Pupils with specific learning difficulties (SpLD) (dyslexia) have a negative self-concept.	282	59.8	189	40.2
2. Pupils with SpLD (dyslexia) have negative self-esteem.	259	55	212	45
3. Pupils with SpLD (dyslexia) have anxiety.	361	76.6	110	23.4
4. Pupils with SpLD (dyslexia) suffer from social isolation.	282	59.8	189	40.2
5. Pupils with SpLD (dyslexia) suffer from shyness.	343	72.8	128	27.2
6. Pupils with SpLD (dyslexia) suffer from insecurity.	276	58.6	195	41.4
7. It is hard for pupils with SpLD (dyslexia) to make friends, because of their low self-concept and low self-esteem.	257	54.5	214	45.5
8. Pupils with SpLD (dyslexia) feel different from their peers.	336	71.3	135	28.7
9. Some pupils with SpLD (dyslexia) react badly because they have learning difficulties.	341	72.4	130	27.6
10. Pupils with SpLD (dyslexia) worry about what people think of them.	359	76.2	112	23.8
11. Pupils have poor self-concept because of delayed intervention.	346	73.4	125	26.6
12. The most effective intervention strategies for pupils with SpLD (dyslexia) address their self-concept and self-esteem.	375	79.6	96	20.4
13. Early intervention has an impact on pupils with SpLD (dyslexia) by enhancing their self-concept and self-esteem.	427	90.6	61	9.4
14. Appropriate classroom rewards should be provided to increase self-concept and self-esteem.	438	93	33	7

5.2.3 Educational Issues Related to Early Intervention

A good starting point for developing and implementing an intervention is to understand the relevant educational issues. It is important to choose an effective approach and what professional teachers require is a sound understanding of the principles of interventions and their suitability for children. Table 5.3, below reports responses concerning educational issues related to early intervention.

Table 5.3. Teachers' responses concerning educational issues related to early intervention

Statement	Teachers who Agree/Strongly Agree		Teachers who Disagree/ Strongly disagree	
	n	%	n	%
1. You are familiar with the concept of early intervention.	267	56.7	204	43.3
2. The appropriate age to start early intervention is in grade one.	355	75.4	116	24.6
3. You have the skills to apply early intervention programmes.	204	43.3	267	56.7
4. The family provide useful input in the follow-up and supervision process for early intervention.	345	73.2	126	26.8
5. You have sufficient knowledge of multi-sensory approaches when teaching as a kind of early intervention.	283	56.2	188	45.1
6. There is a scarcity or complete lack of suitable books and resources for early intervention in the school library.	360	76.5	111	23.5
7. The school periodically runs workshops on early intervention.	244	51.8	227	48.2
8. Students are anxious about reading because of delayed intervention.	380	80.7	91	19.3
9. Students are likely to be unmotivated because of delayed intervention.	396	84	75	16
10. Early intervention needs to take place in a separate room from the main classroom.	328	69.7	143	30.3

It can be seen from the above Table that 56.7% (n=267) of the teachers interviewed were familiar with the concept of early intervention and 75.6% (n=355) of the individuals studied consider that the appropriate age at which to start an early intervention is in the first grade. Individuals' responses also vary regarding whether they thought they possessed the skills required for applying an early intervention programme. Accordingly, only 43.3% (n=204) agreed and 56.7% (n=267) disagreed that they had the necessary skills for implementing an early intervention programme. Furthermore, 73.2% (n=345) of the teachers believed that the family provides useful input in the follow-up and supervision process for early intervention and 56.2% (n=283) agreed that they had sufficient knowledge of the multi-sensory approach to teaching as a kind of early intervention.

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However, the majority of the teachers interviewed (76.5%, n=360) agreed that there was a lack of suitable books and resources in the school library for early intervention.

On the other hand, there are some concerns about the next statement, as only half the teachers (52%, n=244) agreed that the school organises regular workshops on early intervention. Furthermore, a high proportion (80.7%, n=380) of the teachers agreed that pupils were anxious about reading because of delayed intervention and an even higher proportion (84%, n=396) considered delayed intervention to be the possible reason for a lack of motivation among learners. Finally, about 69.7% (n=328) agreed that early intervention needs to take place in a separate room from the main classroom.

5.2.4 Obstacles and Barriers that Prevent the Implementation of Early Intervention

Finally, the participants' responses to the sub-topic related to the obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait are reported in Table 5.4, below.

Table 5.4. Teachers' responses concerning the obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait

Statement	Teachers who Agree/Strongly Agree		Teachers who Disagree/ Strongly disagree	
	n	%	n	%
1. The length of the curriculum does not allow me time to include early intervention programmes.	442	93.9	29	6.1
2. The length of the lessons does not allow me to include intervention programmes.	368	78.1	103	21.9
3. The high number of students in the class reduces the opportunity for early intervention.	436	92.6	35	7.4
4. Teachers are not sufficiently aware of early intervention.	408	85.8	63	14.2
5. Teachers are not sufficiently prepared for early intervention through training courses.	438	93	33	7
6. It difficult for teachers to assess pupils using the activities that the textbook recommends.	413	87.7	58	12.3
7. The large amount of work assigned to the Arabic language teachers outside the classroom does not allow time to apply early intervention.	451	95.8	20	4.2
8. The large number of lessons per language teacher is an obstacle to early intervention.	449	95.4	22	4.6
9. The unavailability of appropriate educational aids is an obstacle to early intervention.	430	91.3	41	8.7
10. The unavailability of financial support for the school to implement early intervention is an obstacle.	412	87.5	59	12.5
11. There is a lack of guidance for early intervention in the teachers' handbook.	441	93.6	30	6.4

12. There is a lack of cooperation from parent(s) in delivering early intervention.	428	90.9	43	9.1
13. There is a lack of clarity in the school administration's policy on early intervention.	378	80.3	93	19.7
14. Some language supervisors are concerned with coordination, rather than on objectives, thus reducing the importance of early intervention.	363	77.1	108	22.9

It can be seen from Table 5.4 that the majority of individuals interviewed (93.9%, n=442) strongly agreed or agreed that the length of the curriculum does not allow them enough time to include early intervention programmes. Additionally, 78.1% (n=368) of them consider that the length of the lesson does not allow them to include the intervention programmes and around 92.5% (n=436) strongly agreed that the higher the number of pupils in the class, the greater the reduction in opportunities for early intervention.

Moreover, the majority of the respondents were of the opinion that they were not sufficiently aware of early intervention and they were not prepared for this through training courses. Furthermore, around 85.6% (n=408) considered it difficult to assess pupils using the guidelines found in the teachers' handbook. In addition, 95.8%, n=451 of the teachers strongly agreed that the amount of work generally assigned to Arabic language teachers outside the classroom does not allow enough time to apply an early intervention. Similarly, the majority of teachers interviewed (95.4%, n=449) agreed or strongly agreed that the large number of lessons per language teacher is an obstacle to early intervention.

Besides the above, about 91% (n=428) of the interviewees strongly agreed that there was a lack of cooperation from parents in delivering an early intervention programme and 80.3% (n=378) agreed there was a lack of clarity in the school administration's policy on early intervention. Finally, 77.1% (n=363) of the teachers agreed with the statement that some language supervisors are more interested in coordination rather than objectives, which basically reduces the importance of early intervention. To sum up, most teachers did not appear to be sufficiently aware of the concept of early intervention.

5.3 Establishing Measures - Exploratory Factor Analysis (EFA) and Principal Component Analysis (PCA)

EFA was used to establish the underlying structure of measures, in terms of the items comprising them. A total of 48 manifest variables (items) were specified in Chapter Four, in the form of Likert scale statements: 10 items were specified for teachers' understanding of pupils with SpLD (dyslexia) (TU); 14 items specified for teachers' knowledge of the

self-concept/self-esteem of pupils with SpLD (dyslexia) (TK); 10 items were specified for educational issues related to early intervention (EI), and 14 items were specified for obstacles and barriers (OB). These four domains were used as a starting point for conducting the EFA. Data were analysed dimension-wise or based on the initial four domains.

5.3.1 Questionnaire Section Two (SC2): Teachers' Understanding of Pupils with SpLD

Correlation Matrix

The correlation matrix (see Table 5.5) shows that almost all variables had a correlation of r = 3 or greater, which is considered to be a recommended factorability of 'R' (Tabachnick & Fidel, 2007).

Table 5.5. Correlation matrix for SC2: Teachers' understanding of pupils with SpLD

Components		SC2Q1 Definition of RD	SC2Q2 Understanding the definition of DYS	SC2Q3 Characteristics of SpLD	SC2Q4 Screening for SpLD	SC2Q5 Diagnosing SpLD	SC2Q6 Treatment of SpLD	SC2Q7 Child can grow out of DYS	SC2Q8 Identifying dyslexia	SC2Q9 Failure to follow instruction	SC2Q10 Percentage of days in classroom
SC2Q1	Definition of RD	1									
SC2Q2	Understanding the definition of DYS	0.57	1								
SC2Q3	Characteristics of SpLD	0.55	0.71	1							
SC2Q4	Screening for SpLD	0.43	0.55	0.68	1						
SC2Q5	Diagnosing SpLD	0.47	0.54	0.64	0.67	1					
SC2Q6	Treatment of SpLD	0.45	0.51	0.63	0.59	0.62	1				
SC2Q7	Child can grow out of DYS	0.23	0.28	0.28	0.30	0.26	0.34	1			
SC2Q8	Identifying dyslexia	0.16	0.19	0.25	0.21	0.19	0.26	0.22	1		
SC2Q9	Failure to follow instruction	0.19	0.19	0.23	0.21	0.12	0.20	0.10	0.26	1	
SC2Q10	Percentage of days in the classroom	0.19	0.21	0.25	0.25	0.28	0.25	0.14	0.21	0.34	1

Determinant = .000 (The questionnaire items are identified as SC2Q1, SC2Q2, etc.)

The variables with correlations of less than r = 3 were SC2Q8 (Cannot identify dyslexia until a child is eight years old), and SC2Q9 (Pupils with dyslexia always fail to follow instructions that guide them), which did not have any association with other variables.

It is evident from the matrix that there is a correlation between components, SC2Q1 (Definition of reading difficulties) and SC2Q2 (Understanding the definition of dyslexia), with a correlation of r = 0.57; as well as between SC2Q3 (Characteristics of SpLD) and SC2Q2 (Understanding the definition of dyslexia), with a correlation of r = 0.71, and between SC2Q4 (Screening for SpLD) and SC2Q5 (Diagnosing SpLD), with a correlation of r = 0.67, and so on. However, the correlation matrix shows that the determinant is zero. This signifies that there is no linear relationship between the variables.

Factorability Tests

To assess the suitability of the respondents' data for factor analysis (Williams et al., 2010), the Kaiser-Meyer-Olkin (KMO) Measure of Sampling Adequacy and Bartlett's Test of Sphericity were carried out (see Table 5.6). The KMO index ranges from 0-1 and a minimum value of 0.6 is considered suitable for factor analysis (Tabachnick & Fidell, 2007). Since the KMO value is 0.89 (> 0.6), it is considered ideal for determining factorability. The Bartlett's Test of Sphericity measure should have a significant value of <0.05. Since the value in Table 5.6 is highly significant (p <0.001), it can be determined that there are some relationships between the variables (SC2Q1, SC2Q2 and so on).

Table 5.6. Factorability tests for SC2: Teachers' understanding of pupils with SpLD

KMO and Bartlett's Test[a]		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		0.89
	Approx. Chi-Square	1766.00
Bartlett's Test of Sphericity	Df	45
	Sig.	.000

a. Based on correlations

Factor Extraction

PCA was subsequently used to extract factors and this is considered as a default method when used in SPSS (Williams et al., 2010). PCA enables variables to be reduced into factors. Table 5.7, overleaf, shows the 10 components or variables related to Section 2 of the questionnaire: 'Your (teacher's) understanding of pupils with SpLD (dyslexia)'. The 10 variables are not part of the same construct.

Table 5.7. Extraction Method: Principal Component Analysis for SC2: Teachers' understanding of pupils with SpLD

Total Variance Explained

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	4.36	43.64	43.64	4.36	43.64	43.64	3.93	39.33	39.33
2	1.23	12.30	55.94	1.23	12.30	55.94	1.66	16.62	55.94
3	.92	9.22	65.16						
4	.75	7.53	72.69						
5	.69	6.91	79.60						
6	.62	6.21	85.82						
7	.46	4.59	90.41						
8	.40	3.98	94.39						
9	.32	3.20	97.59						
10	.24	2.41	100.00						

Kaiser's criterion is that all factors above the eigenvalue of one are retained (Osborne & Costello, 2009). The initial eigenvalues show that only one component had a value >1. The rotated sums of squared loadings extracted two factors with eigenvalues >1.

Table 5.8. Commonalities for SC2: Teachers' understanding of pupils with SpLD

Commonalities

	Components	Initial	Extraction
SC2Q1	Definition of reading difficulties	1.00	0.47
SC2Q2	Understanding the definition of dyslexia	1.00	0.65
SC2Q3	Characteristics of SpLD	1.00	0.76
SC2Q4	Screening for SpLD	1.00	0.69
SC2Q5	Diagnosing SpLD	1.00	0.68
SC2Q6	Treatment of SpLD	1.00	0.63
SC2Q7	Child can grow out of dyslexia	1.00	0.19
SC2Q8	Identifying dyslexia	1.00	0.41
SC2Q9	Failure to follow instruction	1.00	0.53
SC2Q10	Percentage of dyslexia in the classroom	1.00	0.59

(The questionnaire items are identified as SC2Q1, SC2Q2, etc.)

The two factors and the variables are shown in Table 5.9, overleaf.

Table 5.9. Component Matrix for SC2: Teachers' understanding of pupils with SpLD

Components Matrix

	Components	Factor	
		1	2
SC2Q1	Definition of reading difficulties	0.67	-0.16
SC2Q2	Understanding the definition of dyslexia	0.78	-0.20
SC2Q3	Characteristics of SpLD	0.86	-0.17
SC2Q4	Screening for SpLD	0.82	-0.15
SC2Q5	Diagnosing SpLD	0.81	-0.14
SC2Q6	Treatment of SpLD	0.79	-0.10
SC2Q7	Child can grow out of dyslexia	0.43	0.05
SC2Q8	Identifying dyslexia	0.38	0.52
SC2Q9	Failure to follow instruction	0.36	0.63
SC2Q10	Percentage of dyslexia in the classroom	0.42	0.64

(The questionnaire items are identified as SC2Q1, SC2Q2, etc.)

Both factors and the variables associated with them were then rotated. The results of the factor analysis are presented in Table 5.10 (Re-ordered Rotated Matrix for SC2).

Table 5.10. Re-ordered Rotated Matrix for SC2

Component		Factor		Teachers who Agree/Strongly Agree	%	Teachers who Disagree/Strongly Disagree	%
		1	2				
SC2Q3	Characteristics of SpLD	**0.86**		273	58	198	42
SC2Q4	Screening for SpLD	**0.82**		296	62.8	175	37.2
SC2Q5	Diagnosing SpLD	**0.81**		278	59	193	41
SC2Q2	Understanding the definition of dyslexia	**0.80**		313	66.4	158	33.6
SC2Q6	Treatment of SpLD	**0.77**		232	49.3	239	50.7
SC2Q1	Definition of reading difficulties	**0.68**		384	81.5	87	18.5
SC2Q7	Child can grow out of dyslexia	**0.38**		360	76.4	111	23.6
SC2Q10	Percentage of dyslexia in the classroom		**0.75**	198	42	273	58
SC2Q9	Failure to follow instruction		**0.72**	197	41.8	274	58.2
SC2Q8	Identifying dyslexia		**0.62**	232	49.3	239	50.7

(The questionnaire items are identified as SC2Q1, SC2Q2, etc.)

In Table 5.10, it may be noted that items with a loading score of < 0.375 have been omitted for ease of interpretation. All loadings higher than 0.375 were marked and the substantial loadings are highlighted in bold. The variables were reordered so that those with higher loadings appear first, followed by the lesser loadings. From the rotated matrix, it is clear that each variable has a substantial loading on only one factor.

Factor 1 is made up of variables, such as: teachers are aware of the 'characteristics of pupils with SpLD' (N=273) and are familiar with 'screening pupils with SpLD' (N=296), 'diagnosing SpLD' (N=278) and 'the definition of dyslexia' (N=313). They also state that they have 'knowledge of the definition of reading difficulties' to support pupils with dyslexia, but at the same time, believe 'children can grow out of dyslexia'. These variables fall under the first factor; referred to as dyslexia '**Awareness**'. Only one of the variables, 'Children can grow out of dyslexia' (N=360) did not fall in the category, 'awareness' (of dyslexia). The variable on teachers being familiar with the 'Treatment of pupils with SpLD', drew mixed reactions, with more teachers disagreeing/strongly disagreeing (N=239; 50.7%) with that statement.

Factor 2 is made up of the variables, 'Approximately one in eight children in the classroom has dyslexia', 'Pupils with dyslexia always fail to follow instructions that guide them', and 'Cannot identify dyslexia until a child is eight years old'. These variables fall under the second factor; referred to as '**Facts and Myths**' (about dyslexia). Most teachers disagreed with all the above statements (58%, 58.2% and 50.7%, respectively). However, they showed a lack of understanding with respect to the statement that pupils with dyslexia do not follow instructions, suggesting a lack of awareness of their pupils' difficulties and/or of the characteristics of such learners.

The variables in Factors 1 and 2 relate to each other, as they relate to teachers' awareness or knowledge of the characteristics of learners with SpLD (dyslexia). However, the difference between the two factors is that Factor 1 mainly concerns teachers' familiarity with the characteristics of learners with SpLD (dyslexia), while Factor 2 pertains more to knowledge of dyslexia.

5.3.2 Questionnaire Section Three (SC3): Teachers' knowledge of Self-concept/Self-esteem of Pupils with SpLD (Dyslexia)

Correlation Matrix

The correlation matrix shows several variables with a correlation of r = 3 or greater.

Table 5.11. Correlation matrix for SC3 Teachers' knowledge about self-concept/ self-esteem of pupils with SpLD (Dyslexia)

Components		SC3Q1 SpLD have negative self-concept	SC3Q2 SpLD have negative self-esteem	SC3Q3 SpLD have anxiety	SC3Q4 SpLD at risk of social isolation	SC3Q5 SpLD suffer from shyness	SC3Q6 SpLD suffer from insecurity	SC3Q7 SpLD have difficulty making friends	SC3Q8 SpLD feel different from peers	SC3Q9 SpLD react badly because of	S3Q10 SpLD worry about what others think of	SC3Q11 SpLD have poor self-concept because	SC3Q12 Most effective intervention	SC3Q13 Early intervention increase self-	SC3Q14 Classroom rewards increase self-
SC3Q1	SpLD have negative self-concept	1													
SC3Q2	SpLD have negative self-esteem	0.80	1												
SC3Q3	SpLD have anxiety	0.44	0.51	1											
SC3Q4	SpLD at risk of social isolation	0.48	0.50	0.44	1										
SC3Q5	SpLD suffer from shyness	0.41	0.39	0.38	0.58	1									
SC3Q6	SpLD suffer from insecurity	0.46	0.50	0.50	0.56	0.59	1								
SC3Q7	SpLD have difficulty making friends	0.44	0.42	0.29	0.57	0.47	0.54	1							
SC3Q8	SpLD feel different from peers	0.37	0.42	0.34	0.44	0.42	0.42	0.53	1						
SC3Q9	SpLD react badly because of learning difficulties	0.34	0.35	0.30	0.39	0.38	0.41	0.48	0.61	1					
SC3Q10	SpLD worry about what others think of them	0.25	0.25	0.37	0.37	0.44	0.43	0.42	0.59	0.57	1				
SC3Q11	SpLD have poor self-concept because delayed intervention	0.41	0.40	0.41	0.44	0.42	0.43	0.45	0.51	0.52	0.56	1			
SC3Q12	Most effective intervention focus on their self-concept and self-esteem	0.39	0.39	0.33	0.29	0.36	0.31	0.30	0.34	0.28	0.31	0.39	1		
SC3Q13	Early intervention increase self-concept and self-esteem	0.23	0.20	0.27	0.30	0.31	0.25	0.22	0.31	0.27	0.29	0.39	0.52	1	
SC3Q14	Classroom rewards increase self-concept and self-esteem	0.15	0.17	0.22	0.22	0.24	0.16	0.15	0.27	0.25	0.27	0.30	0.39	0.62	1

Determinant = 0.0000001823 *(The questionnaire items are identified as SC3Q1, SC3Q2, etc.)*

Some of the variables with 'correlation of r = 3 or greater' values and which are significantly correlated are those between components, SC3Q1 (children with SpLD have a negative self-concept) and SC3Q2 (children with SpLD have negative self-esteem) with a correlation of r = 0.80; between SC3Q3 (children with SpLD have anxiety) and SC3Q2 (children with SpLD have negative self-esteem), with a correlation of r = 0.51, and between SC3Q5 (children suffer from shyness) and SC3Q4 (children with SpLD are at risk of social isolation), with a correlation of r = 0.58, and so on.

Factorability Tests

The KMO value of 0.89 (> .6) and the Bartlett's test score of 0 (<0.05) shows that the data were suitable for factor analysis (Table 5.12).

Table 5.12. Factorability tests for SC3: Teachers' knowledge of the self-concept/ self-esteem of pupils with SpLD (Dyslexia)

KMO and Bartlett's Test[a]		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		0.89
Bartlett's Test of Sphericity	Approx. Chi-Square	3208.89
	Df	91.00
	Sig.	.000

a. Based on correlations

Factor Extraction

PCA enabled the extraction of three factors. Only factors with higher loadings were included. The analysis yielded a three-factor solution in Table 5.13.

Table 5.13. Extraction Method: Principal Component Analysis (PCA) for SC3: Teachers'
knowledge of the self-concept/self-esteem of pupils with SpLD (Dyslexia)

				Total Variance Explained					
	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
Component	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	3041	44.72	44.72	6.12	43.71	43.71	3.40	24.28	24.28
2	0.75	9.90	54.62	1.50	10.68	54.39	3.31	23.61	47.88
3	0.67	8.77	63.39	1.26	9.00	63.39	2.17	15.51	63.39
4	0.48	6.31	69.69						
5	0.38	5.03	74.72						
6	0.32	4.14	78.86						
7	0.28	3.61	82.47						
8	0.27	3.49	85.96						
9	0.27	3.16	89.12						
10	0.24	2.83	910.95						
11	0.22	2.46	94.41						
12	0.16	2.37	96.79						
13	0.15	1.97	98.76						
14	0.10	1.25	100						

The rotated matrix with variables grouped and representing three factors is presented below
(Table 5.14).

Table 5.14. Re-ordered Rotated Matrix for SC3

Component		Factor			Teachers who Agree/Strongly Agree	%	Teachers who Disagree/Strongly Disagree	%
		1	2	3				
SC3Q10	Pupils with SpLD worry about what others think of them	**0.78**			359	76.2	112	23.8
SC3Q9	Pupils with SpLD react badly because of learning difficulties	**0.78**			341	72.4	130	27.6
SC3Q8	Pupils with SpLD feel different from peers	**0.74**			336	71.3	135	28.7
SC3Q7	Persons with SpLD have difficulty making friends	**0.64**			257	54.5	214	45.5
SC3Q11	Persons with SpLD have poor self-concept because of delayed intervention	**0.60**			346	73.4	125	26.6

SC3Q5	Pupils with SpLD suffer from shyness	**0.50**			343	72.8	128	27.2
SC3Q2	Pupils with SpLD have negative self-esteem		**0.87**		259	55	212	45
SC3Q1	Pupils with SpLD have negative self-concept		**0.85**		282	59.8	189	40.2
SC3Q4	Pupils with SpLD are at risk of social isolation		**0.61**		282	59.8	189	40.2
SC3Q6	Pupils with SpLD suffer from insecurity		**0.60**		276	58.6	195	41.4
SC3Q3	Pupils with SpLD have anxiety		**0.58**		361	76.6	110	23.4
SC3Q13	Early interventions increase self-concept and self-esteem			**0.81**	427	90.6	61	9.4
SC3Q14	Classroom rewards increase self-concept and self-esteem			**0.77**	438	93	33	7
SC3Q12	The most effective interventions are concentrated on self-concept and self-esteem			**0.73**	375	79.6	96	20.4

(The questionnaire items are identified as SC3Q1, SC3Q2, etc.)

Six items are loaded onto the first factor. The variables loaded onto this factor were: 'Pupils with SpLD (dyslexia) worry about what others think of them'; '…react badly because of learning difficulties'; '…feel different from their peers'; '…have difficulty making friends'; '…have poor self-concept, because of delayed intervention', and '…are shy'. It is apparent from Table 5.13 (Reordered Rotated Component Matrix) that these six items are related to teachers' knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia). This factor was therefore labelled '**Fear**', namely the teachers' knowledge of pupils' fear of disappointment, or that they are being let down.

The five items loaded onto Factor 2 identified that pupils with SpLD have negative self-esteem and negative self-concept and are at risk of social isolation, suffer from insecurity and experience anxiety. This factor was labelled '**Failure',** which refers to teachers' knowledge of the failure that learners experience due to poor self-esteem and self-concept.

The items loaded onto Factor 3 are related to teachers' beliefs that early intervention increases self-concept and self-esteem; that classroom rewards increase self-concept and self-esteem, and that most effective intervention strategies for pupils with SpLD (dyslexia)

concentrate on their self-concept and self-esteem. This factor was labelled '**Solutions**', or teachers' strategies to overcome learners' difficulties through early interventions.

A comparison of the three factors labelled 'Fear', 'Failure' and 'Solutions' would indicate that they are interrelated. Teachers are of the belief that learners become disappointed because of negative self-esteem and negative self-concept. Fear and anxiety are the basis of low self-esteem. Based on their experiences and thoughts about what others may think of them, learners with SpLD (dyslexia) develop a perspective of how they fit in the world, namely whether they are acceptable, affable, worthy, or capable of learning like others. The teachers' responses suggest that learners are disappointed with themselves and have negative opinions of themselves, thus feeling they cannot overcome this distressing issue of low self-esteem. The overwhelming majority of the teachers seemed to agree (agree/strongly agree) that learners 'fear' of what others think of them (N=359); react badly (for instance, become easily offended, angered, sensitive and provoked) because of their learning difficulties (N=341); believe they are different from other children in class (N=225); feel insecure as they cannot make friends or build self-esteem through social support (N=257); have poor self-concept due to delayed intervention (N=346), and that it is low self-esteem which causes children with dyslexia to become shy and socially withdrawn (N=343).

The responses to the items (variables) clustered together to form the second factor indicate that the learners' 'fear' is the cause of their failure. Most of the teachers seemed to be very aware of their pupils' learning difficulties and felt that it was low self-esteem that drove their emotions in a negative direction. The variables in the first factor, 'It is hard for pupils with SpLD (dyslexia) to make friends because of low self-concept and low self-esteem' (SC3Q7) and 'Pupils with SpLD (dyslexia) worry about what people think of them' (SC3Q10) are related to two variables in the second factor: 'Pupils with SpLD (dyslexia) have feelings of social isolation' (SC3Q4), with a score of N=282 and 'Pupils with SpLD (dyslexia) suffer from insecurity' (SC3Q6), with a score of N=276. Social isolation and insecurity are associated with negative self-esteem (N=259) and negative self-concept (N=282). Overall, the responses to the variables in Factors 1 and 2 show that the teachers were aware that the pupils' feelings of unease may have been triggered by their self-perception that they are worthless.

The responses to the statements grouped together to form Factor 3 provide 'solutions' to students' 'Fear' (Factor 1) of disappointment, and strategies for overcoming learners' sense of 'failure' (Factor 2). The teachers responded overwhelmingly that appropriate classroom

rewards can increase self-concept and self-esteem (N=438). They also confirmed that early intervention can help improve learners' self-concept and self-esteem (N=427) and that intervention strategies must be concentrated on learners' self-concept and self-esteem (N=375). The above responses reveal that the teachers had a good understanding of their pupils' problems and wanted to motivate them to change by offering incentives and providing early intervention, so that the learners could practice new and healthier behaviours.

5.3.3 Questionnaire Section Four (SC4): Teachers' Understanding of Educational Issues Related to Early Intervention

Correlation Matrix

The correlation matrix for questionnaire Section Four (SC4) revealed variables with many coefficients and only items with a correlation greater than r = 3 were considered (Table 5.15). Some of the significant correlations were: 'Familiar with the concept of early intervention' (SC4Q1) and 'Have the skills required to apply early intervention' (SC4Q3); 'Knowledge of the appropriate age for early intervention' (SC4Q2) and 'Have the skills required to apply early intervention' (SC4Q3); 'Familiar with the concept of early intervention' (SC4Q1) and 'Have knowledge of multisensory approaches' (SC4Q5); 'Have the skills required to apply early intervention' (SC4Q3) and 'Have knowledge of multisensory approaches' (SC4Q5); 'Lack of suitable books and resources for early intervention in the school' (SC4Q6) and 'Have knowledge of multisensory approaches' (SC4Q5); 'Lack of suitable books and resources for early intervention in the school' (SC4Q6) and 'School organises workshops about early intervention periodically' (SC4Q7); 'Students are anxious about reading because of delayed intervention' (SC4Q8) and 'Familiar with the concept of early intervention' (SC4Q1),and so on.

Table 5.15. Correlation matrix for SC4: Teachers' understanding of educational issues related to early intervention

Components		SC4Q1 Concept of E.Int.	SC4Q2 Appropriate age for E.Int.	SC4Q3 Skills for E.Int.	SC4Q4 Family and E.Int.	SC4Q5 Knowledge about multi-sensory approaches	SC4Q6 Lack of resources in the school library	SC4Q7 Workshop about early intervention	SC4Q8 Delayed intervention	S42Q9 Students unmotivated	SC4Q10 E.Int. needs a separate room
SC4Q1	Concept of E.Int.	1									
SC4Q2	Appropriate age for E.Int.	0.22	1								
SC4Q3	Skills for E.Int.	0.48	0.30	1							
SC4Q4	Family and E.Int.	0.20	0.28	0.26	1						
SC4Q5	Knowledge about multi-sensory approaches	0.37	0.18	0.54	0.25	1					
SC4Q6	Lack of resources in the school library	0.20	0.15	0.21	0.25	0.39	1				
SC4Q7	Workshop about early intervention	0.21	0.18	0.28	0.26	0.33	0.14	1			
SC4Q8	Delayed intervention	0.31	0.18	0.21	0.18	0.25	0.36	0.29	1		
SC4Q9	Students unmotivated	0.16	0.20	0.14	0.23	0.17	0.30	0.22	0.54	1	
SC4Q10	E.Int. needs a separate room	0.18	0.17	0.19	0.17	0.08	0.15	0.09	0.21	0.23	1

Determinant =.002 *(The questionnaire items are identified as SC4Q1, SC4Q2, etc.)*

Factorability Tests

Before the PCA was undertaken, the suitability of the data for factor analysis was assessed. The KMO value, at 0.77 (> 0.6), and the Bartlett Test score ($p<.05$) indicated the suitability of the data set for factor analysis (see Table 5.16, below).

Table 5.16 Factorability tests for SC4: Teachers' understanding of educational issues related to early intervention

KMO and Bartlett's Test[a]		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		0.77
Bartlett's Test of Sphericity	Approx. Chi-Square	936.79
	Df	45.00
	Sig.	.000

a. Based on correlations

Table 5.17 (Total Variance Explained) illustrates 10 components or variables relating to Section 4 of the questionnaire: 'Educational issues related to early intervention'.

The cumulative percentage of variance and the 'eigenvalue > 1' rule was applied for factor extraction (Williams et al., 2010). The Table below demonstrates a cumulative percentage of variance of 31.66% and a total of 10 factors. Three factors with an eigenvalue > 1 were extracted.

Table 5.17. Extraction Method: Principal Component Analysis for SC4: Teachers' understanding of educational issues related to early intervention

Total Variance Explained

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	2.10	31.66	31.66	3.19	31.90	31.90	2.14	21.44	21.44
2	0.83	12.56	44.23	1.08	10.77	42.67	2.04	20.41	41.86
3	0.69	10.44	54.66	1.05	10.46	53.13	1.13	11.27	53.13
4	0.66	9.89	64.55						
5	0.61	9.28	73.83						
6	0.51	7.73	81.56						
7	0.42	6.40	87.96						
8	0.33	4.99	92.96						
9	0.25	3.77	96.72						
10	0.22	3.28	100						

The three extracted factors before rotation are shown in Table 5.18.

Table 5.18. Component Matrix for SC4: Teachers' understanding of educational issues related to early intervention

Components Matrix

Components		Factor 1	Factor 2	Factor 3
SC4Q1	Concept of E.Int.	0.59	-0.08	-0.41
SC4Q2	Appropriate age for E.Int.	0.48	-0.10	-0.07
SC4Q3	Skills for E.Int.	0.67	-0.20	-0.49
SC4Q4	Family and E.Int.	0.56	0.02	0.18
SC4Q5	Knowledge about multi-sensory approaches	0.67	-0.37	-0.28
SC4Q6	Lack of resources in the school library	0.53	0.07	0.05
SC4Q7	Workshop about early intervention	0.58	-0.37	0.50
SC4Q8	Delayed intervention	0.58	0.18	0.32
SC4Q9	Students unmotivated	0.51	029	0.40
SC4Q10	E.Int. needs separate room	0.41	0.79	-0.13

(The questionnaire items are identified as SC4Q1, SC4Q2, etc.)

The variables were reordered so the rotated factor loadings for each factor are grouped and the rotated matrix with re-ordered components is tabulated below (Table 5.19).

Table 5.19. Re-ordered Rotated Matrix for SC4

Component		Factor 1	2	3	Teachers who Agree/Strongly Agree	%	Teachers who Disagree/Strongly Disagree	%
SC4Q3	Skills for E.Int.	**0.84**			204	43.3	267	56.7
SC4Q5	Knowledge about multi-sensory approaches	**0.76**			283	56.2	188	44.8
SC4Q1	Concept of E.Int.	**0.70**			267	65.7	204	43.3
SC4Q2	Appropriate age for E.Int.	**0.35**			355	75.4	116	24.6
SC4Q7	Workshop about early intervention		**0.75**		244	51.8	227	48.2
SC4Q9	Students unmotivated		**0.65**		396	84	75	16
SC4Q8	Delayed intervention		**0.64**		380	80.7	91	9.3
SC4Q4	Family and E.Int.		**0.52**		345	73.2	126	26.8
SC4Q6	Lack of resources in the school library		**0.41**		360	67.5	111	23.8
SC4Q10	E.Int. needs a separate room			**0.86**	328	69.7	143	30.3

(The questionnaire items are identified as SC4Q1, SC4Q2, etc.)

The principal components were used to find clusters and the Table also shows the responses of teachers for the variables which constitute the clusters. The variables clustered together to form Factor 1 were 'have the skills to apply early intervention programmes', 'have sufficient knowledge of multi-sensory approaches when teaching, as a kind of early intervention', 'familiar with the concept of early intervention', and 'appropriate age to start early intervention is first grade'. As the teachers had knowledge of basic issues (for instance, the significance of early intervention and multi-sensory approaches), but did not have the skills to apply early intervention, this factor was labelled, '**Inadequacy**' (on the part of the teachers).

The second factor, which constitutes variables such as, 'School periodically organises workshops about early intervention', 'Students are likely to be unmotivated because of delayed intervention', 'Students are anxious about reading because of delayed

intervention', 'Family provide useful input in the follow-up and supervision process for early intervention', and 'There is a scarcity or lack of suitable books and resources for early intervention in the school library', were clustered together and labelled, '**Consciousness**' (of critical issues).

The third factor, which comprised only one variable, 'Early intervention needs to take place in a separate room from the main classroom' and was labelled '**Concern for support**'.

In the first cluster (related to Factor 1), all the respondents agreed/strongly agreed that they had a basic understanding of the concepts of dyslexia (knowledge of multi-sensory approaches N=283; early intervention N=267) and the characteristics of learners with SpLD (appropriate age for early intervention N=355), but disagreed/strongly disagreed (56.7%) that they did not have the skills to apply early intervention. A basic understanding of the concepts of dyslexia (evident in Factor 1) seemed to have helped the teachers to assess the situation in their schools. Their responses to statements in the second cluster (Factor 2) reflect that understanding. The variables that helped form the second cluster (related to Factor 2) show that most of the teachers acknowledged that workshops were essential (agreed/strongly agreed that schools organised these regularly N= 244), that early intervention was required to motivate pupils with dyslexia (agreed/strongly agreed N=396), that an increased understanding of the negative effects of delayed intervention was necessary (agreed/strongly agreed N=380), that family involvement in early intervention was important (agreed/strongly agreed N=345), and that schools needed to provide adequate resources (agreed/strongly agreed N=360).

The only variable that helped form the second cluster (related to Factor 3) shows that most respondents (N=328) were concerned that children with dyslexia were not provided with a separate room for reading intervention sessions. Such individualised early interventions can provide the best opportunities for children to achieve their potential.

When comparing the responses from the three groups, it becomes apparent that most of the teachers understood the typical components of early intervention and the issues that were significant for effective implementation of early intervention programmes. The teachers seemed to recognise that their knowledge about SpLD (dyslexia) and early intervention affected the pupils' learning experience in class.

5.3.4 Questionnaire Section Five (SC5): Teachers' Understanding of Obstacles and Barriers that Prevent the Implementation of Early Intervention

Correlation Matrix

It is apparent from the correlation matrix (Table 5.20) that all the variables had a correlation of r = 3 or greater.

Table 5.20. Correlation matrix for SC5: Teachers' understanding of the obstacles and barriers that prevent the implementation of early intervention

Components	SC5Q1 Unavailability of educational aids is an obstacle	SC5Q2 Length of lesson and E.Int.	SC5Q3 High number of pupils in class	SC5Q4 Teachers aware of E.Int.	SC5Q5 Teachers' training courses	SC5Q6 Difficult for teachers to assess pupils	SC5Q7 Workload	SC5Q8 Large number of lesson an obstacle to E.Int.	SC5Q9 Unavailability of educational aids is an obstacle	SC5Q10 Unavailability of financial support is an obstacle	SC5Q11 Lack of guidance in the teachers' handbook	SC5Q12 Lack of cooperation from parents	SC5Q13 Lack of clarity in E.Int. policy	SC5Q14 Supervisors are concerned with coordination, rather than on objectives
SC5Q1 Length of curriculum and E.Int.	1													
SC5Q2 Length of lesson and E.Int.	0.49	1												
SC5Q3 High number of pupils in class	0.56	0.36	1											
SC4Q4 Teachers aware of E.Int.	0.34	0.27	0.40	1										
SC5Q5 Teachers' training courses	0.38	0.22	0.36	0.62	1									
SC5Q6 Difficult for teachers to assess pupils	0.33	0.34	0.32	0.50	0.44	1								
SC5Q7 Workload	0.42	0.31	0.44	0.43	0.39	0.40	1							
SC5Q8 Large number of lessons an obstacle to E.Int.	0.41	0.28	0.44	0.36	0.38	0.29	0.62	1						

Item	Description														
SC5Q9	Unavailability of educational aids is an obstacle	0.35	0.25	0.38	0.28	0.35	0.28	0.41	0.50	1					
SC5Q10	Unavailability of financial support is an obstacle	0.28	0.27	0.35	0.32	0.28	0.32	0.40	.43	0.54	1				
SC5Q11	Lack of guidance in the teachers' handbook	0.36	0.31	0.40	0.37	0.42	0.34	0.46	0.47	0.52	0.59	1			
SC5Q12	Lack of cooperation from parents	0.26	0.19	0.37	0.25	0.26	0.30	0.42	0.38	0.41	0.46	0.51	1		
SC5Q13	Lack of clarity in E.Int. policy	0.23	0.21	0.28	0.37	0.34	0.35	0.19	0.15	0.32	0.44	0.42	0.32	1	
SC5Q14	Supervisors are concerned with coordination, rather than on objectives	0.12	0.25	0.23	0.26	0.22	0.29	0.26	0.24	0.22	0.28	0.32	0.25	0.50	1

(The questionnaire items are identified as SC5Q1, SC5Q2, etc.)

Some of the significant correlations were between 'length of curriculum' (SC5Q1) and 'high number of pupils in the class reduces the opportunity of early intervention' (SC5Q3); 'teachers are not sufficiently prepared through training courses' (SC5Q5) and 'teachers are not sufficiently aware of early intervention' (SC5Q4), and 'large number of lessons per language teacher is an obstacle to early intervention' (SC5Q8) and 'great amount of work assigned to the Arabic language teachers outside the classroom does not allow time to apply early intervention' (SC5Q7), and so on.

Factorability Tests

The Kaiser-Meyer-Olkin (KMO) Measure of Sampling Adequacy indicates a value of 0.88 (>0.6). The Bartlett's Test of Sphericity measure shows a significant value of <0.05. Both tests confirm that the data were suitable for determining factorability (see Table 5.21).

Table 5.21. Factorability tests for SC5: Teachers' understanding of obstacles and barriers that prevent the implementation of early intervention

KMO and Bartlett's Test[a]		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		0.88
Bartlett's Test of Sphericity	Approx. Chi-Square	2535.7
	Df	91.00
	Sig.	.000

a. Based on correlations

Factor Extraction

Table 5.22 shows the 14 components or variables related to Section 5 of the questionnaire: 'Obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait'.

Table 5.22. Extraction Method: Principal Component Analysis for SC5: Teachers' understanding of obstacles and barriers that prevent the implementation of early intervention

	Total Variance Explained								
	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
Component	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	270	39.23	39.23	5.61	40.07	40.07	3.31	23.64	23.64
2	0.72	10.42	49.65	1.26	9.02	49.09	2.37	19.93	40.56
3	0.61	8.87	58.52	1.14	8.11	57.19	1.72	12.28	52.85
4	0.54	7.89	66.41	1.03	7.34	64.53	1.64	11.68	64.53
5	0.38	5.57	71.98						
6	0.33	4.73	76.71						
7	0.30	4.40	81.11						
8	0.25	3.57	84.69						
9	0.23	3.34	88.03						
10	0.20	2.88	90.91						
11	0.18	2.66	93.57						
12	0.16	2.35	95.93						
13	0.15	2.16	98.09						
14	0.13	1.92	100						

The initial eigenvalues show that only one component had a value >1. The rotated sums of squared loadings extracted four factors with eigenvalues >1. The four factors and their

corresponding variables were then rotated. The results of the factor analysis are presented below (Table 5.23).

Table 5.23. Re-ordered Rotated Matrix for SC5

Component		Factor				Teachers who Agree/Strongly Agree	%	Teachers who Disagree/Strongly disagree	%
		1	2	3	4				
SC5Q10	Unavailability of financial support is an obstacle	**0.76**				438	93	33	7
SC5Q9	Unavailability of educational aids is an obstacle	**0.75**				408	85.8	63	14.2
SC5Q12	Lack of cooperation from parents	**0.70**				451	95.8	20	4.2
SC5Q11	Lack of guidance in the teachers' handbook	**0.70**				413	87.7	58	12.3
SC5Q8	Large number of lessons an obstacle to E.Int.	**0.63**				436	92.6	35	7.4
SC5Q7	Workload	**0.54**				368	78.1	103	21.9
SC5Q3	High number of pupils in class	**0.44**				442	93.3	29	6.1
SC5Q4	Teachers aware of E.Int.		**0.85**			449	95.4	22	4.6
SC5Q5	Teachers' training courses		**0.78**			430	91.3	41	8.7
SC5Q6	Difficult for teachers to assess pupils		**0.61**			412	87.5	59	12.5
SC5Q2	Length of lessons and E.Int.			**0.92**		428	90.9	43	9.1

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SC5Q1	Length of the curriculum and E.Int.	**0.62**	441	93.6	30	6.4
SC5Q14	Supervisors are concerned with coordination, rather than objectives	**0.86**	363	77.1	108	22.9
SC5Q13	Lack of clarity in E.Int. policy	**0.76**	378	80.3	93	19.7

(The questionnaire items are identified as SC5Q1, SC5Q2, etc.)

Factor 1 is made up of seven variables clustered together: 'The unavailability of financial support for the school to implement early interventions is an obstacle' the 'unavailability of appropriate educational aids is an obstacle to early intervention', there is 'a lack of cooperation from parent(s) in delivering early interventions', there is a 'lack of guidance for early intervention in the teachers' handbook', the 'large number of lessons per language teacher is an obstacle to early intervention', the 'great amount of work assigned to the Arabic language teachers outside the classroom does not allow time to apply early intervention', and the 'high number of students in the class reduces the opportunity for early intervention'. This factor was referred to as the '**Environment**' of the early intervention.

Factor 2 is made up of three variables clustered together: 'Teachers are not sufficiently aware of early intervention', 'Teachers are not sufficiently prepared through training courses', and 'It is difficult for teachers to assess pupils with the activities that the textbook recommends'. This factor was referred to as the '**Awareness**' of the teachers.

The third factor consists of two variables grouped together: The 'length of lessons does not allow me to include intervention programmes' and 'the length of the curriculum does not allow me time to include early intervention programmes. This factor was referred to as the teachers' '**Dilemma**'.

The fourth factor consists of two variables clustered together: 'Language supervisors are concerned with coordination, rather than on objectives' and 'Lack of clarity in the school administration's policy toward early intervention'. This component was referred to as '**Poor sense of accountability**'.

The vast majority of the teachers agreed/strongly agreed (over 78% to 95%) on all the variables in the first cluster (under Factor 1), referred to as the '**Environment**' of the early intervention. These limitations were compounded by '**Awareness**' (Factor 2), such as the lack of adequate awareness of early intervention, preparation and poor assessment materials. Teachers were in a '**Dilemma**', as the complicated curriculum (agree/strongly agree N=441) and length of lessons (agree/strongly agree N=428) did not permit them to allocate sufficient time for implementing early intervention. Moreover, the teachers agreed/strongly agreed that they did not get adequate support from policy-makers (over 80%) and supervisors (over 77%), thus suggesting that there was a '**Poor sense of accountability**' among stakeholders.

5.4 Discussion

This study investigated the challenges facing teachers regarding the implementation of early intervention for pupils with SpLD (dyslexia) in primary schools in Kuwait. It was aimed at identifying teachers' knowledge/perceptions of SpLD, including dyslexia, the self-concept/self-esteem of pupils with SpLD (dyslexia), teachers' perceptions of the impact of early intervention on the self-concept of pupils with SpLD and the obstacles and barriers that prevent such interventions. This chapter has presented a discussion of the survey's findings and addressed the results vis-a-vis the research questions.

5.4.1 Research Question 1:

What knowledge and understanding do Arabic language teachers in Kuwait currently possess of the concept of SpLD (dyslexia)?

The responses to the first research question show that the teachers were aware of the learning difficulties specifically associated with dyslexia and were familiar with the characteristics of pupils with SpLD. However, these teachers also perceived that they did not have the capability to support these pupils. This implies that the teachers probably need additional training. The literature puts forward the view that a lack of dyslexia training may make early identification and subsequent interventions less possible (Rose, 2009a). The results of this study corroborate the earlier findings of Washburn et al. (2011), which specifically hold the lack of training as one major factor rendering teachers unable to identify pupils with dyslexia. The literature also states that teachers require more information, hands-on experience and theoretical and practical training to support pupils with dyslexia (Wadlington & Wadlington, 2005).

The responses to questionnaire items relating to the role of the teacher in diagnosing pupils with dyslexia show that nearly all the teachers felt that they knew how to identify this learning difficulty. Nevertheless, the results also point to a significant need amongst teachers to engage in training or professional development for dealing with dyslexia. This suggests they felt less able to meet the needs of learners with dyslexia and had insufficient knowledge in those areas which had relevance for teaching them. What is more, the perceived levels of knowledge exceeded what was actually known, indicating unrealistic self-evaluation.

The results show that even though the teachers did not agree with myths, they also disagreed with facts; for instance, with the idea that pupils with dyslexia are unable to follow simple instructions. Such an idea would suggest that children with dyslexia may not be able to access the lesson content, produce assignments, or take notes (Keates, 2013). The reason for failing to follow instructions can be due to difficulties with working memory, or an inability to mentally store information or focus in class (Jeffries &Everatt, 2004). If teachers are unaware of these problems, then it may be assumed that they are in fact largely unaware of learning difficulties.

5.4.2 Research Question 2:

What are Arabic teachers' perceptions of the effect of dyslexia on the self-concept/self-esteem of pupils with SpLD (dyslexia)?

The literature claims that teachers' lack of awareness of dyslexia can lead to misconceptions about the learning difficulty, which will in turn have a negative effect on the pupils affected (Wadlington & Wadlington, 2005). For example, negative effects may include a failure to progress academically, as well as reduced self-esteem, the misinterpretation of social cues, and even depression and anxiety. In spite of a lack of awareness, however, the teachers studied also argued in favour of expectations, so if pupils with dyslexia fail, they are inadvertently discouraged. On the other hand, pupils with dyslexia can feel depressed due to poor self-concept and low self-esteem. The responses to the question regarding knowledge of the self-concept/self-esteem of pupils with SpLD show that the teachers were divided in their responses and could not actually identify poor self-concept/self-esteem amongst their pupils. If teachers fail to do this, such pupils may feel devalued at school and resort to deviant behaviour (Scott, 2004). It is argued that "frustration leads very often to antisocial or deviant behaviour" in pupils with dyslexia, especially if they have low self-esteem (Peer & Reid, 2001, p.5). Teachers can improve a

pupil's self-esteem by making improvements in literacy and bridging the gap or difference between them and their peers (Scott, 2004).

The teachers' perceptions of a negative self-concept are most likely to be based on confusion over what constitutes such beliefs in the pupils. This notion is a further example of confusion over what is meant by self-esteem (Dennis, 2009). Yet another perception was that not all children with dyslexia have problems with social competence and self-esteem. This view must be based on the belief that pupils with dyslexia have similar levels of self-esteem as their peers without dyslexia. In reality, there are pupils with learning difficulties who do feel they are incompetent (Carroll & Iles, 2006; Burden, 2008a; Singer, 2008). The literature shows that some pupils equate academic achievement with positive attitudes and abilities that they do not feel they have (Burden, 2008a; Singer, 2008). Pupils with dyslexia also often demonstrate more problems with social competence than do their peers without learning difficulties (Humphrey, 2003; Carroll & Iles, 2006; Burden, 2008b; Singer, 2008). There is no doubt that this reduced social competence, whether actual or perceived, will lead to emotional concerns amongst these children (Semrud-Clikeman, 2007).

There is qualitative evidence of students' efforts being undermined by teachers and of negative reactions from other students, as well as anxiety being experienced when placed in situations where learning difficulties are exposed (Glazzard, 2012). However, the quantitative results in this study establish that teachers are aware of how pupils with dyslexia suffer from anxiety, insecurity, social isolation and shyness. These results are significant because the research also supports early recognition and referral to qualified professionals for evidence-based evaluations and treatments as being necessary for achieving the optimal outcome (Handler & Fierson, 2011). Besides early intervention, the teachers also perceived that by providing appropriate rewards, pupils' self-concept and self-esteem could be maintained, protected and enhanced. However, it is argued that protecting pupils from experiencing any difficulties by merely overlooking their errors, or offering them rewards or praise for incorrect or inadequate work will not ultimately alleviate their negative self-perceptions (Chapman & Tunmer, 2003).

The responses of the participants reveal that most of the teachers were aware of the self-concept/self-esteem of pupils with SpLD (dyslexia) (for example: negative self-concept, anxiety, social isolation, shyness, insecurity, the inability to make friends, feeling different from peers, the fear of others reacting badly, the worry over what others might think, and poor self-concept are caused by delayed intervention and effective intervention strategies

should concentrate on self-concept and self-esteem. Moreover, that early intervention increases self-concept and self-esteem and classroom rewards can increase self-concept and self-esteem).

The results would suggest that self-perceptions, including any notions of self-esteem or self-concept continue to be of great interest within the field of educational psychology. The responses indicate that teachers' understanding of dyslexia is important and could have significant effects on children's academic self-esteem. The results also show that few teachers have negative attitudes to failure amongst pupils with SpLD (dyslexia). An awareness of pupils' self-concept would enable teachers to protect the former from failure, but the problem is not the failure of the pupil, so much as the attitudes of the teacher. Moreover, assessing self-concept is complex.

This research argues that the understanding of the teacher is essential and is something that may be addressed and assessed through teacher training programmes. Ensuring that teachers have adequate awareness of dyslexia could contribute to the provision of appropriate intervention, including counselling, to deal with problems surrounding self-confidence, self-esteem, anxiety, and any other related issues arising.

5.4.3 Research Question 3:

What are Arabic teachers' perceptions of the impact of early intervention on the self-concept/self-esteem of pupils with SpLD (dyslexia)?

In the majority of cases, if teachers are unable to spot at-risk children at an early enough stage in their development, or to provide high quality intervention before children start to underachieve, it becomes more difficult to address and resolve issues relating to reading ability. Responses to the question on teachers' perceptions of the impact of early intervention on the self-concept of pupils with SpLD (dyslexia) would indicate that the teachers under study were familiar with the concept of early intervention. This is significant, because if teachers are unaware of the importance of early intervention, children with dyslexia who are entrusted to their care may develop anxiety and low self-esteem. The research would also suggest that this sense of inferiority was either self-imposed or inadvertently caused by well-meaning others very early on in the pupils' lives (Tillotson, 2011). Once a child reaches the age of ten, it becomes more difficult to help them develop a more positive self-image and this is therefore another powerful argument in favour of early intervention (Glazzard, 2012; International Dyslexia Association, 2013).

The teachers were also of the opinion that early intervention should ideally start when the child is 5-6 years old and in the first grade. This overwhelming response could be based on the belief that teachers are responsible for detecting warning signs for learning difficulties as early as possible in children's lives, so that timely evaluation and intervention could be considered. This agrees with the view that delayed intervention can have adverse effects, which is evident from the literature reviewed for the present study; for example Shaywitz (2003) and Handler and Fierson (2011), who claim that most students end up carrying their learning difficulties into high school.

Most of the teachers surveyed felt that they did not have the necessary skills to implement an early intervention programme, which corroborates previous findings, whereby teachers cited their limited access to information, training and support. In such a case, both teachers and pupils may develop a sense of learned helplessness (Kerr, 2001). Ironically, this then adversely affects the level of support teachers can provide for pupils with SpLD (Ade-Ojo, 2011). On the other hand, teachers with appropriate skills may be able to identify early indications of dyslexia, as well as supporting the learning of children with dyslexia. As a result, the capacity to instil purposeful and necessary skills from evidence-based interventions, combined with a positive outlook, will amount to a brighter future for both the pupil and the teacher.

Another finding was that most of the teachers felt that pupils were anxious about reading as a result of delayed intervention and considered this delayed intervention as having led to a lack of motivation among pupils. They were also of the belief that a child's family can provide useful input in the follow-up and supervision process for early intervention. Parental input, such as their understanding of behavioural events and knowledge of what constitutes developmentally appropriate behaviour are the key to successfully recognising dyslexia in children. This contribution from parents/family, which also takes into account the individual characteristics and needs of the learner, as well as difficulties in memorisation and speech patterns, are central to early intervention. The literature reviewed earlier for this study also identifies parent involvement as very important for effective developmental intervention (Mahoney & Wiggers, 2007; Kellar-Guenther et al., 2014).

The responses of the participants show that the teachers' responses were homogenous; for example, teachers' familiarity with the concept of early intervention; their perceptions of the appropriate age to start early intervention; their perceptions of their ability to apply early intervention; their perceptions of the significance of family input; their knowledge of multi-sensory approaches; the lack of suitable books and resources; the importance of

periodical workshops; the fact that delayed intervention causes anxiety in pupils; the lack of motivation, and the separation of early intervention from the regular classroom. These findings are crucial, because they imply that it is necessary to have a clear profile of the child's difficulties and strengths during the early stages of his/her life, in order to provide necessary interventions for literacy development.

5.4.4 Research Question 4:

What are Arabic language teachers' perspectives with regard to the implementation of early intervention?

This question was formulated on the assumption that teachers have positive perceptions of early intervention, as they are more accustomed to accommodating the individual needs of pupils. What is paramount is to be able and willing to act early on in the lives of children who are at risk (Shaywitz, 2003). Very often, it is the child's teachers who will be the first to identify the problem (Wadlington &Wadlington, 2005).

One of the findings associated with this research question is that the length of the curriculum does not allow teachers enough time to include an early intervention programme. This situation led one teacher to suggest that a shorter curriculum would be helpful for pupils with learning difficulties. Student progress is determined by the length of the intervention and not the curriculum. Therefore, the above result would seem to emphasise the importance of intervention. Studies have also found that pupils' overall progress is significantly positively correlated with the length of the intervention (Sim et al., 2015).

Similarly, most of the teachers considered that the length of the lesson does not give them adequate time to include intervention programmes. This result illustrates how a lengthy, unstimulating and excessively demanding curriculum can have an adverse effect on learners, who already lack adequate working memory and so have difficulty in remembering what is taught in the classroom (Hodge, 2000). Moreover, the existing workload in the lessons may not allow enough time to incorporate intervention programmes. Additionally, longer lessons could result in longer school hours, which could include sport and other activities. These results illustrate how a demanding curriculum and extended classes can result in stress, anguish and trauma for children with dyslexia (Hodge, 2000).

The findings that large class sizes can have an adverse effect on early intervention validates previous observations that smaller class sizes not only permit better quality teaching but also enable teachers to allocate more time supporting individual children (Elias, 2014). The literature claims that larger classes are detrimental for learners with dyslexia, as teachers may not be able to consistently help and encourage their students (Humphrey, 2002).

In response to the questionnaire item about the usefulness of a teachers' handbook, most of the participants considered the prescribed recommendations to be impractical. This may have been based on the assumption that more practical strategies are required to develop and encourage learning in the classroom. This finding would indicate that teaching pupils with dyslexia is too important to be left to theoretical, but unproven, practices and methods. The study argues that there is therefore a need for more evidence-based practice.

The findings related to the amount of time currently available to apply early intervention indicate that time constraints do pose serious challenges. Previous studies validate this and results have shown that teachers lack adequate time for planning, preparing and assessing lessons (DfE, 2010, 2011). Further demands on teachers' time, namely in the preparation of early interventions, would exert considerable pressure on them, given the many tasks they already have to accomplish (Reid, 2005).

Another finding was that teachers were assigned too many lessons in a day and were therefore unable to implement early intervention. Earlier studies, such as one undertaken by MacBeath et al. (2004), have already found that additional workload exerts pressure on teachers, as they also find themselves having to cope with these special learning needs against a backdrop of deteriorating classroom behaviour and a rise in hostility towards school and learning amongst pupils in general. However, pressures on teachers' time could to some extent be relieved if schools appoint teaching assistants and other support staff (MacBeath et al., 2006).

Other factors which have hindered teachers in their contribution to the development of intervention programmes or their provision of support for pupils with dyslexia in schools in Kuwait are a lack of training and work overload. The United Nations Development Programme (UNDP) Kuwait (UNDP, 2012) has also raised concerns about the lack of teacher preparation and training programmes, making it difficult for educators to identify and teach pupils with learning difficulties, or to take preventive measures for early intervention. This is compounded by the lack of technical assistance to develop Arabic-based curriculum materials for intervention in SpLD. As a result, a considerable number

of pupils with SpLD (dyslexia) face countless difficulties and pressures, forcing some of them to withdraw from school.

One major finding of the survey, drawn from teachers' perceptions, was that there was a lack of cooperation from parents in delivering early intervention. Parental input is required for successfully identifying children with dyslexia and the effective delivery of early intervention is dependent on parental support. The research indicates that parents have an essential gate-keeping role to play, by identifying the problem early enough for professional assessment and interventions to subsequently be initiated (Keung, 2008). Therefore, in order to increase parental involvement in delivering early intervention, it is crucial that parents and teachers develop relationships (Norwich et al., 2005). To sum up, effective school-home collaboration is essential for ensuring that the educational and emotional needs of the child are successfully met.

Most teachers shared the same perceptions with regard to questions related to the obstacles and barriers that prevent the implementation of early intervention (for example: the length of the lessons, large class sizes, a lack of awareness of early intervention; difficulties in assessing pupils; increased workload; the lack of appropriate educational aids; a lack of financial support; the lack of guidance for early intervention in the teachers' handbook; the lack of cooperation from parents; the lack of clarity in the school administration's policy, and are concerned with coordination, rather than objectives).

Most of the teachers did not differ in their opinion that there is a lack of clarity in school policy related to early intervention. Comprehensive and transparent policies could help in strengthening parent-school relationships. However, previous research has shown that there is very little clarity where schools lack financial resources and the appropriate materials for helping pupils to progress (Mackay, 2005; Rose, 2009a). The problem facing teachers is that school policies only discuss the learning environment which directly relates to children with SpLD, but do not always acknowledge secondary symptoms, such as low self-esteem. Therefore, this result once more highlights the importance of teachers being well-informed and nurturing children with special requirements.

Finally, it was found that most of the teachers surveyed agreed that some of their supervisors were more concerned about coordination than objectives and so the significance of early intervention was often impaired. Earlier studies have already revealed that teachers need to concentrate on the innate strengths of pupils with dyslexia (for

example, their logic, reasoning and visual perceptions) and the conditions under which learning is enabled, rather than homing in on their pupils' deficits (Fiester, 2012).

It may be surmised that through training or professional development, teachers will be able to create a more realistic view of their own knowledge of dyslexia. This remark on teachers' perceived knowledge may well be based on speculation, but it is nevertheless borne out by research. Studies which have examined knowledge levels amongst teachers in the UK, have found that training and capabilities of teachers are crucial (for example, Wadlington & Wadlington, 2005; Bell et al., 2011).

5.5 Conclusion

The key purpose of this chapter was to analyse teachers' understanding of pupils with dyslexia; evaluate their knowledge of the self-concept/self-esteem of pupils with dyslexia; examine the educational issues related to early interventions, and identify some of the obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait. Several conclusions and recommendations can be extracted after analysing the teachers' interview data.

The data gathered through the quantitative survey support the claim that more work needs to be done to educate professionals working with students with dyslexia at an elementary stage of their education. The first section of the survey was concerned with obtaining descriptive data, to be used to analyse the varying beliefs surrounding dyslexia. The second part of the survey was concerned with factor analysis and determining whether there was any factorial structure in the measurement., EFA, applied to the data. The Kaiser-Meyer-Olkin (KMO) measure then verified whether the sampling was adequate for analysis.

The results of the factor analysis and PCA showed that most of the teachers were aware of the characteristics of pupils with SpLD (dyslexia), and understood the importance of early diagnosis and screening to some extent. The teachers also had knowledge of the effects of negative self-esteem and negative self-concept on pupils with SpLD but did not know how to overcome their difficulties through early intervention.

Throughout the past 50 years, there has been increasing awareness and understanding of dyslexia. This has arisen from advances in research, media portrayal and the lifting of social taboos. Academic debate persists over defining the term, 'dyslexia' and its usefulness for explaining language-related developmental problems (for example, Kerr, 2001), but the current findings suggest that the public tend to be well-informed of

dyslexia's constituent symptoms these days. The overall findings of the quantitative survey stress that teachers are aware of dyslexia and the importance of early intervention. However, the results demonstrate that there are many misperceptions about this awareness of dyslexia. The study has major implications for teachers, as awareness of the need and benefits of early intervention can help alleviate problems with reading for the majority of children and significantly reduce disability in this area.

The finding that participants differ in their views of the causes of dyslexia, or at best, are unsure of them, indicates general ignorance of the evidence uncovered by scientific research and reported over recent years. On the other hand, the majority of the participants in the present study were all of the opinion that dyslexia should be identified early on in a child's life, in order to allow for the successful implementation of intervention programmes. Another finding was that the participants lacked training in administering an intervention. In general, the teachers' responses varied in accordance with the questions, which might indicate confusion amongst them regarding pupils with dyslexia and additional information (for example, qualitative interviews) might be needed in order to fully understand the concept.

The teachers' responses concerning the obstacles and barriers that prevent early intervention programmes show that the majority of the participants believed teachers were insufficiently aware of early intervention and that additional training was s required in how to implement such programmes for the benefit of children. The differences between responses associated with understanding pupils with dyslexia reveal that the Ministry of Education needs to provide clear guidance for teachers regarding learning difficulties, especially dyslexia.

Chapter Six: Findings and Discussion of the Study's Main Qualitative Interviews

6.1 Introduction

This qualitative phase of the study examines the perspectives of Arabic language teachers and supervisors in primary schools in Kuwait, concerning how they overcome the challenges facing the application of early intervention for pupils with SpLD (dyslexia). Exploring teachers' experiences of interventions is essential, because their previous experience can guide future decision-making in a practical rather than theoretical way (Kam & Midgely, 2006). However, there is a lack of research examining teachers' perceptions of the effectiveness of interventions used to help pupils with SpLD in Kuwait and other nations in the region.

Interviews and focus group sessions were carried out during this phase of the study. The two research questions forming the basis for the interviews and focus groups were:

1. What are the perspectives of Arabic language teachers and educators of how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

2. What are the strategies adopted by supervisors and decision-makers, as ways of overcoming any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

The qualitative interviews were conducted from December 2014 - January 2015, in the respective teachers' schools and in educational districts where there are Arabic language supervisors. All the interviews were recorded with a mobile phone and iPod Nano and then transcribed verbatim. The interviews ran smoothly and lasted for approximately 20 minutes each. A series of open–ended, semi-structured questions were asked during the interviews. The informants were given the choice of either answering the questions in English or Arabic. However, the teachers and supervisors chose to respond in Arabic.

6.2 Thematic Analysis

The analysis of qualitative data involves identifying, coding and categorising patterns or themes found in the data. Gibbs (2007) describes coding as the means by which the data

being analysed are defined. It consists of identifying and recording text or other items of data, such as details from images, which, in some way exemplify the same theoretical or descriptive idea. Coding is a method of indexing or categorising text, in order to create a framework of thematic ideas. Themes are then generated by looking for repeated patterns in the participants' responses.

Moreover, thematic analysis is a way of looking at a topic and not just a process of coding qualitative information. Braun and Clarke (2006) define it as "a method for identifying, analysing and reporting patterns within data" (p.79). The rationale underpinning this approach was that it allows for a detailed description of data. The strengths associated with thematic analysis are that it is flexible across various methods, with the potential to produce a rich, detailed and complex account of data (Braun & Clarke, 2006). In addition, it is independent of prevailing theories and is therefore an original approach to data analysis (Braun & Clarke, 2006). As it is not that complex, it is even appropriate for novice qualitative researchers (Holloway & Todres, 2003). Most importantly, it permits subjective analysis, taking into account the participants' subjective circumstances and viewpoints.

There are in fact many types of software programme for use in Computer-Assisted Qualitative Data Analysis (CAQDAS) and these can assist the researcher greatly with data-coding, management and analysis; for example, MAXQDA and ATLAS. In this study, NVivo (Version 11) was used; this being software that supports qualitative and mixed-method research. NVivo allows researchers to create nodes/codes and to organise, manage and categorise data, so that they can start to find insights within them (QSR International, 2015).

6.3 Data Analysis

The phases suggested by Braun and Clarke (2006), as listed below were followed in the thematic analysis of the semi-structured and focus group interviews in the present study:

> (a) Familiarisation with the data: The audio-recordings were transcribed after each interview. The information provided by the respondents was then read repeatedly and the most salient and noteworthy points highlighted. This process was the result of immersion in and familiarity with the data, coupled with note-taking for the initial generation of ideas.

> (b) The coding of data: Nodes were created using NVivo (version 11), followed by the creation of initial codes. This consisted of key features of the data being

labelled, according to their relevance to the research/interview questions directing the analysis.

(c) The identification of key themes: Possible themes and significant and coherent patterns were identified in the data, by closely scrutinising the transcripts. This was achieved by organising nodes/codes under potential themes.

(d) The reviewing of themes which related to the interview and broader research questions.

(e) The definition, naming and refining of themes: The themes were subsequently outlined and each category or interview question was succinctly labelled.

(f) Drafting the report: Excerpts were selected from the rich text or examples and these were analysed in relation to the research questions.

The process of drawing out themes was facilitated using the qualitative data analysis software, NVivo. This took place following the creation of nodes or codes, established for specific research or interview questions after repeatedly reading all the interviews.

6.3.1 Semi-structured Interviews

6.3.1.1 Arabic Language Teachers' Responses to the Interview Questions

The teachers' responses were related to the research question:

What are the perspectives of Arabic language teachers and educators of how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

The first two questions directed at teachers were to collect purely demographic data. The responses were not analysed thematically, but mentioned in certain parts of the analysis (for example the teachers' training). The descriptive data are summarised below.

- 20 teachers with over 10 years' experience
- 6 teachers with less than 10 years' experience
- 2 teachers with a diploma in special education
- 6 teachers with special education training or preparation programmes

Thematic analysis using NVivo yielded 92 nodes. The texts were coded in NVivo and hierarchical structures were created. However, the software was not used to generate

reports. This was done by exporting the lists to an Excel spreadsheet and thereafter, initial themes were developed based on the responses and codes (nodes and child nodes). 16 themes emerged after the codes were categorised, based on the interview questions. The question numbers, codes created (nodes/child nodes) and themes are presented in Table 6.1. The themes that emerged are discussed below.

Theme 1 – Preparing and empowering teachers:

In response to views on training and its appropriateness, the general consensus was that most teachers had not undertaken preparation programmes. However, the teachers felt that

> *"training can improve expectations",*

and

> *"reduce the disadvantages faced by learners with dyslexia".*

One respondent commented that training would make teachers:

> *"feel competent in their abilities,",*

while another opined that it would allow them to take

> *"control over their own work".*

A teacher simply responded that training would give them opportunities to

> *"learn new skills to increase student learning".*

Another expressed that teachers would be

> *"able to develop and gain more confidence"*

in implementing early intervention programmes. One teacher responded that teachers are:

> *"responsible for screening pupils with SpLD and as we do not have training we do not fully understand how we can contribute to early intervention programmes."*

When asked about workshops, the feeling was that they were not

> *"appropriate and cannot be compared to training".*

Table 6.1. Teachers' responses - NVivo nodes/codes and themes generated

Questions	No. of Nodes	Codes (Nodes) *Child nodes in italics*	Themes
Q.3	1	**Training**	**Prepares and empowers teachers; optimal timing of training**
	2	Learn new skills to increase student learning	
	3	*Reduce the disadvantages faced by learners with dyslexia*	
	4	*Screen pupils with SpLD*	
	5	Feel competent in their abilities	
	6	*Have control over their own work*	
	7	Develop and gain more confidence	
	8	*Gain confidence in implementing early intervention programmes*	
	9	Training can improve expectations	
	10	*Training session at the beginning of the school year*	
	11	Workshops cannot be compared to training	
Q.4	12	**Teaching sessions**	**Delivery of feasible and acceptable intervention sessions**
	13	Teachers exert too much effort	
	14	*Too many Arabic language sessions*	
	15	*Pressure caused by long teaching hours*	
	16	Cumbersome and demanding	
	17	*Declining enthusiasm*	
Q.5	18	**Time constraints**	**Intensifying intervention delivery**
	19	More time required for early intervention programmes	
	20	*Too many pupils*	
	21	Lesson duration	
	22	*Ill-prepared supervision plan*	
	23	*Short lesson duration*	
	24	*Unable to monitor and follow-up pupils*	
Q.6	25	**Added responsibilities**	**Competing interests and commitments**
	26	Caused by new curriculum	
	27	*Curriculum- related responsibilities*	
	28	*Integration and Coordination of Curriculum*	
	29	Daily monitoring	
	30	Distracts teachers	
	31	Multiple roles	
Q.7	32	**Arabic language curriculum**	**Traditional teaching approaches and obsolete curriculum**
	33	Outdated course books	
	34	Poor lesson plans	
	35	*Teachers' suggestions*	
	36	*Teacher participation*	
	37	*Modify the curriculum*	
	38	Inclusive curriculum	
	39	Ill-planned curriculum	
Q.8	40	**Resources**	**Eclectic approaches**
	41	Teachers' suggestions	
	42	*Ease pupils into learning*	
	43	*Using available resources*	
Q.9	44	**Parents' awareness**	**Parental responsibility and commitment**
	45	Hindrance	
	46	The importance of communication and interaction	
	47	The importance of information	
	48	Lack of awareness and its impact	
	49	Lack of cooperation	
	50	Lack of interest	
	51	Social stigma	

Q.10	52	**Financial constraints**	**Monetary**
	53	Crucial for student support	**bottleneck**
	54	Crucial for motivating teachers	
	55	No constraints	
	56	Forces teachers to buy resources	
	57	Seeking funding from policy-makers	
Q.11	58	**Effect of current educational preparation programmes**	**Obsolete and**
	59	Awareness issues	**outmoded**
	60	Lack of training	**programmes**
	61	Poor supervision plan	
	62	Teachers' suggestions	
	63	*The larger policy question*	
	64	*Learning from experts*	
	65	*Joint strategy formulation*	
	66	More input from policy-makers	
	67	*Collaboration*	
Q.12	68	**Teachers' workload**	**Multiple**
	69	Adverse effects	**demands on**
	70	Seeking assistance	**teachers' time**
Q.13	71	**Difficulties faced when implementing early intervention strategies**	**Absence of student-**
	72	Not paying heed to teachers' suggestions	**centred**
	73	Pupils' progress and behaviour	**policies;**
	74	Family-related issues	**teachers**
	75	*Parental support*	**feeling**
	76	Teachers' freedom	**threatened**
	77	Teaching hours	
	78	Poor curriculum and supervision	
	79	Poor support from supervisors	
	80	*Supervision plan*	
	81	Teachers feel threatened	
Q.14	82	**Identifying areas of change**	**Teachers' role**
	83	Changes in supervisor's role	**expansion;**
	84	Recognising the teacher's role	**strengthening**
	85	Respecting teachers' beliefs	**specific**
	86	Changes in teaching process	**competencies**
	87	Changing parents' perceptions	**of teachers;**
	88	Giving priority to teachers' professional development	**elevating**
	89	Making teachers responsible	**teachers'**
	90	Classroom - student ratio	**voice in**
	91	Inclusive curriculum	**shaping**
	92	Recruiting teaching assistants	**special**
			education
			policies and
			facilitating
			early
			intervention

Interestingly, the teachers understood the significance of training, although they had not experienced it. Their responses show that if teachers are to solve SpLD (dyslexia)-related issues through intervention, they should have training. The value of training cannot be understated, as it would enhance practice. What can be inferred from these responses is

that the empowerment of teachers through appropriate training can be considered as a way forward in addressing dyslexia-related issues.

Theme 2 - Optimal timing of training:

This theme emanates from the first. In response to views on how to improve the issue of a lack of training, the teachers believed that the timing of the training sessions was crucial and should take place:

"*at the beginning of the school year,*"

or at a convenient time for the teachers. The suggestion was to avoid organising training during school days.

Theme 3 - Delivery of feasible and acceptable intervention sessions:

When the teachers were asked about the impact of the number of language lessons (teaching sessions) on the implementation of early intervention, they felt that long language teaching sessions were a:

"*major obstacle,*"

which did not allow them to get fully involved in the

"*process of early intervention*".

Some teachers responded that having long teaching hours

"*puts a lot of pressure on the teacher*",

as they also had to deal with the behavioural problems of pupils with dyslexia. This signifies that too many teaching sessions mean too much effort required from teachers. An excessive number of working hours will therefore be:

"*cumbersome and demanding.*"

According to one teacher, a

"*large number of teaching hours is considered an obstacle for teachers of Arabic to carry out the process of early intervention*".

This does not mean that the teachers interviewed were not committed; it was simply because their initial

"enthusiasm and focus gradually decrease as lessons increase".

Theme 4 – Intensifying the delivery of intervention:

On the issue of the short duration of language lessons, most respondents felt that they did not have

"enough time for early intervention".

They expressed that they had time constraints because the

"time allocated for early intervention programmes"

was:

"not sufficient"

and therefore, they found it very

"difficult to manage instructional time and routines".

The suggestions they put forward to improve the situation included a

"reduction of the number of pupils per class"

and

"reducing the contents of the pupil textbooks".

Theme 5 - Competing interests and commitments:

In response to the question of whether added responsibilities in the school prevented them from being involved in early intervention implementation, teachers were of the belief that tasks such as the daily monitoring of pupils, the

"continuous assessment of pupils' progress",

the curriculum, coordinating programmes, and also the procuring of

"instructional materials and supplies"

were exacting. One teacher commented on the pressures of:

> *"...keeping current with the growing body of curricular materials, which is time-consuming. This undermines early intervention."*

Another teacher stated that the new

> *"curriculum has added to the responsibilities"*

and the increasing responsibilities have distracted

> *"the teacher away from the teaching environment".*

According to the teachers interviewed, these responsibilities prevented them from getting fully involved with the implementation of early intervention.

Theme 6 - Traditional teaching approaches and an obsolete curriculum:

When asked if the Arabic language curriculum helped the implementation of early intervention, the teachers complained that the curriculum and instructional materials used were inadequate. One respondent claimed that:

> *"[the] Arabic language curriculum does not meet the needs of the pupils,"*

as there are too many course books. Another teacher reported:

> *"Some lessons do not seem to fit with the pupils' environment, because linking this environment with the lesson affects the pupils' understanding and how they interact with the information they receive."*

One teacher lamented that they were forced to teach *"all the alphabet in the first five weeks"* which is *"a race against time".* In other words, the teachers have

> *"...to follow the curriculum schedule without any personal intervention or modifications, which does not help in the implementation of early intervention".*

In short, the curriculum

> *"does not really take into account pupils with SpLD (dyslexia)".*

The teachers' suggestions included:

> *"...content taught must be drawn from the environment in which the pupil lives."*

In view of this, one teacher stated that teachers have to be given:

> *"...the chance to contribute to the formulation of the teaching plan and to*

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suggest what [they deem] appropriate in order to enhance and develop the teaching process."

And to:

"...reduce the content of the curriculum and... [introduce] a coursework that fits the level of the pupils."

The above responses would imply that schools have retained an obsolete curriculum and teaching materials.

Theme 7 - Eclectic approaches:

Early intervention requires governments and schools to provide the necessary resources in meeting their goals. Almost all the teachers questioned about the availability of resources responded that they were inadequate. They did not want to overwork pupils

"by using the materials associated with the curriculum".

They suggested that pupils should be eased into learning using the available resources. One teacher proposed:

"...using the simplest and easiest methods within very light coursework, allowing the teacher to convey the information and skill in a flowing and understandable manner."

Teachers felt disempowered and expressed a desire for:

"...ample room to be creative so that it is possible for [them] to help pupils with SpLD (dyslexia), rather than make [them] stick to a particular prescriptive plan that cannot be altered."

Further suggestions included:

"Reducing the number of pupils per class, as mentioned earlier, will increase the effectiveness of the implementation of early intervention."

Resources require the allocation of reasonable budgets and one teacher recommended that a

"special budget" be *"set up for each department to spend after the approval of the school principal".*

In order for resources to be used efficiently and wisely, it was also urged that teachers:

"...use other methods to replace the traditional means, such as acting out a theatre scene, telling a meaningful story or going on an educational journey that serves the subject of the lesson."

<u>Theme 8 - Parental responsibility and commitment:</u>

Parental awareness is crucial, because dyslexia is a hidden disability associated with social stigma and misunderstanding. The teachers taking part were well aware that:

> *"Parents' lack of knowledge and awareness of learning difficulties (dyslexia) affects early intervention for teachers."*

One teacher opined that parents should be provided with

> *"accurate information"*

so that they can

> *"better understand, and make appropriate decisions about their children's education".*

However, this entails:

> *"...communication between the parent and the teacher to determine the pupil's performance in general, and more interaction with the parents of pupils with SpLD (dyslexia) in the presence of a social worker or psychologist, because of their experience in dealing with this group of pupils."*

If parents are ignorant or not ably assisted by teachers and specialists, early intervention cannot be applied

> *"leading to a drastic delay in the treatment process".*

Creating awareness among parents is not an easy task, as is evident from one teacher's remarks:

> *"Parents are not on the same level in terms of cooperation and awareness, because some do understand but others seem to be uncooperative… They only want to look at their children's marks. In this school, I always ask parents to keep in touch with the teacher and the school administration, but the parents of pupils with SpLD (dyslexia), they do not cooperate with the school, nor do they attend parent meetings or enquire about their children's progress."*

The reasons behind parents' lack of cooperation stem from a lack of interest and they:

> *"...do not attend school or make enquiries about their children's progress, unlike the parents of gifted pupils."*

Another reason is social stigma:

> *"Parents do not want to accept the label of learning difficulties attached to their children for fear of the social or family misconceptions."*

If pupils with SpLD (dyslexia) are to be given early interventions with regard to their key skills, this will involve some commitment from parents, who should recognise their responsibility and cooperate with the teachers.

Theme 9 - Monetary bottleneck:

Financial constraints affect the implementation of early intervention and this can delay the provision of services and support for pupils. Most teachers were of the belief that financial support was inadequate and suggested that the Ministry of Education should be more proactive. The importance of funding was amplified by one teacher, who stated:

> "*If there is more support, schools will be able to appoint specialists and teachers will be motivated.*"

Some were of the view that there was:

> "*...adequate and on-time financial support for the implementation of early intervention.*"

However, there was some contradiction, whereby one teacher bluntly remarked:

> "*...teachers spend from their own money according to their financial situation.*"

This illustrates that there was inadequate financial support from the government for the implementation of early intervention.

Theme 10 - Obsolete and outmoded programmes:

The effectiveness of current educational preparation programmes in Kuwait is hampered by the lack of awareness of parents and teachers, poor supervision plans, and an absence of training. Teachers believe that some professionals amongst them attribute the learning difficulties of pupils to academic weakness and rely on:

> "*...conventional methods, whether these methods have been proven successful or not.*"

Therefore, the teachers expressed a need for:

> "*…training so that they possess the appropriate skills needed to provide a service in a comprehensive, and culturally competent manner.*"

One teacher stressed that:

> "*Staff preparation in the field of early intervention has to become a national*

effort."

This suggestion was seconded by another teacher who recommended that:

> *"The Ministry of Education should provide a full and comprehensive preparation for teachers, school administration, curricula, and the teaching environment, which should be made attractive."*

However, another respondent claimed that teachers need to make individual effort and exchange information, experience and skills with other teachers:

> *"...especially those who have sufficient expertise for early intervention. This should be done during the weekly meetings of the department or by means of bringing in a specialist in this field."*

If the government or the Ministry is obliged to make efforts, then they should look more closely at the general supervision plans of supervisors assigned to schools. One teacher declared that the current plans are*:*

> *"...not well thought out and disjointed in a manner unconducive to the application of early intervention."*

There were also suggestions that teachers and supervisors should jointly formulate

> *"...a plan to teach the Arabic language module, because teachers have hands-on experience and are the closest people to the pupils."*

According to one respondent,

> *"the best action plan is to establish a joint committee or action group made up of the school principal, social psychologist and some teachers with expertise in special education… constant follow-up of the educational preparation process in all its aspects and stages".*

Theme 11 - Multiple demands on teachers' time:

Teachers experience heavy workloads when they are confronted with early interventions, demands for training, and a new curriculum to put into effect. According to one teacher, the multiple tasks:

> *"…put a lot of pressure on teachers and waste some of the time that can be dedicated or spared for the sake of pupils with specific learning difficulties."*

In order to accomplish these tasks, one teacher expressed a need for:

> *"...more help and suggest [the] appointment of assistant teachers so I can focus on early intervention."*

<u>Theme 12 – The absence of student-centred policies</u>:

In response to the question of whether they faced difficulties when implementing early intervention strategies, the teachers studied made several claims and these were coded and classified into three themes. One of them pointed to the absence of student-centred policies and more specifically, to the absence of supervision plans and a lack of a proper curriculum. According to one teacher, the:

> *"...supervision plan does not support the implementation of early intervention because it does not take special education into consideration."*

One teacher identified flaws in the curriculum, heightened by the tall orders of the supervisors:

> *"The lack of proper curriculum planning for pupils with SpLD (dyslexia) and the second issue relates to the lack of attention given by supervisors to early intervention, in particular. All supervisors request is to identify weaker pupils and provide follow-up, without taking into account the basics of early intervention for this group of pupils."*

<u>Theme 13 - Teachers feel threatened</u>:

Another major difficulty faced by teachers was the feeling that they were being threatened:

> *"If I do not apply this mechanism which was recommended by the supervisor, then I am considered an incompetent teacher… This plan does really put me under so much pressure, and this affects the implementation of early intervention…if the teacher does not abide by this plan, this will affect the appraisal and evaluation given to him by the supervisory team."*

<u>Theme 14 - Teachers' role expansion</u>:

Teachers' workload (for example, a large number of teaching hours) and the multiple roles they have to play have an adverse effect on the implementation of early intervention, such as:

> *"...not giving the teacher enough space for the application of early intervention; and the large number of teaching lessons and the insufficient time given for each lesson, especially when there is a large number of pupils in the classroom."*

This response was expressed in a different way by another teacher:

> *"I have too much work and I would like to eliminate as many tasks as possible so that I can focus on early intervention. However, I feel that more specialist teachers are required."*

Teachers' expanded roles can affect the quality of early intervention services and student outcomes. However, this may need increased staffing or require the services of teaching assistants, an issue discussed earlier (Theme 12).

Theme 15 – Strengthening the specific competencies of teachers:

The teachers studied felt that their competencies needed to be developed. In order to strengthen the professional profile of teachers, the respondents proposed that:

> *"...there should be ongoing training courses and workshops in the field of special education."*

A teacher quite honestly responded that while teachers' awareness should be enhanced, they should also be made aware that

> *"...this is a humanitarian issue in the first place and not only a salaried job".*

Theme 16 – Elevating the teachers' voice in shaping special education policies and facilitating early intervention

The teachers in this case felt that they needed to make their opinions heard, as their views on teaching approaches differed from those of their supervisors. These teachers were not against their supervisors and were willing to cooperate, but felt that:

> *"...there should be changes in the way technical supervision of the Arabic language is assigned. Their role affects the application of early intervention because teachers are forced to adhere to plans set by the supervisors. One day I said to the supervisor that the skill was a bit difficult for pupils, but she replied that it did not matter whether pupils understood or not as long as I reached the appraisal stage."*

Another teacher upheld the views expressed by the previous respondent, saying that:

> *"Teachers should be given the chance to identify the most appropriate method of teaching because it is him/her who has to pass the information [on] to pupils and to achieve the outcomes of the coursework."*

The key suggestion teachers wished their supervisors and decision-makers to accept related to the manner in which pupils with SpLD (dyslexia) can be assisted:

> *"The processes of teaching should start with the simplest and most basic aspects, moving to the most complex ones."*

6.3.1.2 Arabic Language Supervisors' Responses to the Interview Questions

The supervisors' responses related to the research question:

What are the strategies adopted by supervisors and decision-makers, as ways of overcoming any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?

NVivo yielded 41 nodes (Table 6.2). 15 themes emerged after the codes were categorised, based on the interview questions. The question numbers, codes created (nodes/child nodes), and themes are presented below.

Table 6.2. Supervisors' responses - NVivo nodes/codes and themes generated

Questions	No. of Nodes	Codes (Nodes)	Themes
Q.1	1	**Inappropriate diagnostic approaches**	**Improper identification and remediation**
	2	Lack of clarity	
Q.2	3	**Best possible start**	**Early start**
	4	Between 3 and 4 years	
Q.3	5	**Early intervention specialists**	**A lack of specialist remedial teaching**
	6	Lack of specialist support	
	7	Psychologists as specialists	
Q.4	8	**Supervisors' expertise**	**Absence of reciprocal knowledge exchange; the blame game**
	9	Inadequate experience	
	10	Accusations	
Q.5	11	**Financial support**	**A lack of government dedication and interest**
	12	Lack of adequate funding	
	13	Bias in financial decisions	
Q.6	14	**Cooperation within the school**	**Need for active collaboration**
	15	Lack of cooperation	
	16	Limited cooperation	
Q.7	17	**School services**	**The absence of innovative approaches**
	18	Lack of resources	
	19	Need for new approaches	
	20	Need for technology	
Q.8	21	**Workshops**	**Mandated attendance**
	22	Not regular	
	23	Not useful	
Q.9	24	**Teachers' guidebook**	**Ineffectual**
	25	Ill-defined	
	26	Need for clarity	
Q.10	27	**Design of teaching programmes**	**Theory-based approaches**
	28	No emphasis	
	29	Not practical	
Q.11	30	**Seeking expertise from external organisations**	**A lack of interaction**
	31	Individual efforts	
Q.12	32	**Challenges**	**Teachers' professional awareness and lack of support; negative perspectives of parents**
	33	Lack of specialists	
	34	Teacher awareness	
	35	Social stigma	

Q.13	36	**Identifying areas for change**	
	37	Government's role	
	38	Student assessment	**Demanding policy-makers to be ever more responsive to the needs of pupils by shifting priorities**
	39	Recruitment specialists	
	40	Preparing supervisors	
	41	Use of innovative approaches	

The following are the themes generated after coding and classifying the supervisors' responses to the interview questions.

Theme 1 - Improper identification and remediation:

The interview question related to this theme was meant to elicit responses from supervisors as to how they perceived their schools identified and diagnosed learners with SpLD. One supervisor emphasised that:

> *"The diagnostic process for pupils with specific learning difficulties is not appropriate as some pupils are classified as having learning difficulties, but they may be struggling with their studies for other reasons… So, there is no accuracy in diagnosis."*

This remark was supported by another respondent who elaborated by stating that:

> *"Many teachers do not have adequate scientific knowledge in terms of identifying and diagnosing pupils with specific learning difficulties in primary schools… though a few teachers have acquired a certain knowledge through individual effort and personal experience. This means that the majority of teachers do not have clear steps or academic strategies in the process of diagnosis."*

Theme 2 – Early start:

When asked for their opinions as to when early intervention should start, there was a general consensus amongst the supervisors. All unanimously suggested that there should be no delay and interventions should begin as early as possible. Some were of the belief that they should start as early as the first year in school, while others claimed that mediation should start when the learners are in year three or four. One teacher stated that delayed interventions can affect learners:

> *"psychologically, the pupil can get worse if there is a delay in treatment."*

Theme 3 – A lack of specialist remedial teaching:

The question related to this theme was directed at respondents, in order to find out if the schools had specialised dyslexia teachers. Eight out of the nine supervisors acknowledged the lack of early intervention specialists. A few supervisors stated that the schools had psychologists but admitted that these professionals lacked

"*knowledge and experience in learning difficulties*".

However, the supervisors recognised the importance of specialist teachers. One respondent expressed:

"*I feel that specialists are required to monitor the progress of pupils using early intervention procedures and make adjustments to determine the success or failure of the intervention.*"

The responses show that specialist teaching is crucial for pupils with SpLD (dyslexia) as it involves multi-sensory approaches and the development of phonological skills.

Theme 4 - Absence of reciprocal knowledge exchange:

In response to the question 'Do supervisors have sufficient experience to apply early intervention measures and explain/transmit such information to teachers?' the respondents stated that they did not have adequate experience in early intervention and therefore would not necessarily be of great help to teachers. One supervisor responded:

"*Adequate experience depends on the supervisor's individual efforts… If he has the experience, then he will be able to pass it on, but to my knowledge, not all supervisors have sufficient experience in early intervention to transfer to teachers.*"

Theme 5 – The blame game:

Another theme that emerged from the question related to supervisor expertise was the 'blame game'. This implies that false accusations are the order of the day when identifying pupils with learning difficulties. One supervisor alleged:

"*If teachers identify cases of learning difficulties, they must inform their supervisors, who will then guide them towards the best approach for dealing with this category of pupil.*"

<u>Theme 6 – A lack of government dedication and interest:</u>

When asked if the Ministry of Education provided appropriate financial support for early intervention programmes, most supervisors were not satisfied with the support their schools received. One of the supervisors stated:

> *"There are no guidelines or legislation from the Ministry of Education towards specific financial support for the implementation of early intervention, compared to the adequate support provided for the pupils with Down syndrome and slow learning."*

The responses also reveal that policy-makers were not aware of SpLD. A supervisor elaborated:

> *"There is financial support from the Ministry of Education, but it is not sufficient. The government has to be made aware that early interventions have much higher economic returns."*

Another supervisor further expanded this claim by revealing that there was bias in the financial decisions made by policy-makers:

> *"There is no adequate financial support for early intervention from the Ministry of Education to provide services that will help implement early intervention, such as the provision of courses, especially for teachers and supervisors."*

<u>Theme 7 - Need for active collaboration:</u>

In response to the question about inter-departmental cooperation in schools (for instance, the school administration and Arabic language supervision department), regarding the implementation of early intervention, the supervisors responded negatively by stating that there was a lack of active collaboration. One supervisor clarified:

> *"There is no cooperation between the school administration and supervisors… It is the case for me at least because the school where I work does not take the subject of early intervention seriously… as I said earlier, the Ministry does not have a uniform principle regarding the implementation of early intervention."*

However, another respondent claimed there was minimal cooperation between the school departments and supervisors,

> *"while cooperation with the psychologist is frequent"*.

These responses pertain to collaboration and cooperation within schools, but this is also necessary between schools, policy-makers and the wider society. Nevertheless,

collaboration and cooperation are essential for the successful implementation of early interventions.

Theme 8 - The absence of innovative approaches:

This theme emerged when supervisors responded to the question of whether schools provided adequate services for early intervention programmes. The supervisors claimed that the amenities were very limited. One supervisor complained there were:

> *"No resource rooms or assistive technologies for children with dyslexia. Arrangements have to be made to provide the required resources and a place where they can focus on their learning."*

The supervisors were aware that better facilities and services were required and some recommended the use of new and creative approaches. According to one:

> *"I would like to advocate the use of multi-sensory teaching and use of differentiated materials."*

There were also suggestions that technology should be integrated:

> *"I understand that technologies such as Livescribe smartpens could be used to engage the children in special rooms."*

The above-mentioned quotes indicate that innovative approaches and technology are crucial and have been identified as a major contributing factor in alleviating the learning difficulties of pupils with dyslexia.

Theme 9 - Mandated attendance:

The supervisors stated that they did not organise workshops regularly, as they did not consider them to be useful. However, some of the teachers attended them, not out of necessity, but due to pressure exerted on them to attend. One supervisor remarked:

> *"There was little benefit because of the lack of practical and applied aspects… Some teachers attended only to make their presence felt and not because these sessions give practical insights… This is probably due to the large amount of pressure in their schools."*

The supervisors seemed to propose that schools/supervisors should organise regular workshops and motivate teachers to attend by offering incentives without compelling them. The workshops and training sessions should be teacher-directed.

<u>Theme 10 – Ineffectual:</u>

The guidebooks developed for the teachers and used in schools were ill-prepared and the supervisors commented that these materials did not provide useful guidelines for how early interventions could be effectively implemented. According to one supervisor, there is:

> *"No guidance or information in the teachers' guidebook about how to apply early intervention. It is suggested that a chapter is included about learning difficulties in the teachers' guidebook, which should include tips on how to identify, detect, diagnose and treat children with dyslexia."*

However, another supervisor was conciliatory:

> *"The current guidebook which is being prepared… there are what we call support programmes to be adopted as a plan at the end of each lesson."*

Nevertheless, the responses reveal a need for a guidebook which is well-defined and very clear.

<u>Theme 11 - Theory-based approaches:</u>

The responses relating to the design of the teaching programmes imply that they were generally impractical. One supervisor remarked:

> *"Training programmes do not provide adequate information related to learning difficulties (dyslexia)… The reason is that the emphasis is always on teaching methods and curriculum distribution."*

Another supervisor had similar views:

> *"General training programmes focus only on the theoretical aspects of early intervention and are therefore of no practical use."*

<u>Theme 12 - A lack of interaction:</u>

Although the supervisors claimed they did not have the expertise to train teachers or ably assist them, they still did not seek external expertise. According to one supervisor:

> *"Some do contact these institutions as an individual effort because there are no supervisory guidelines directing the communication process… For me, personally, I contacted the Kuwait Dyslexia Association and attended courses in the evening which I paid for from my own pocket, in order to give the best service for this group of pupils."*

<u>Theme 13 - Teachers' professional awareness and lack of support:</u>

Supervisors were of the opinion that some of the challenges they faced when implementing early intervention strategies were the lack of specialists and lack of awareness amongst teachers. One of the supervisors stated:

> *"If the school has 400 pupils, but only one psychologist and assuming that learning difficulties account for only 15%, it is still difficult to follow up 60 pupils with specific learning difficulties, in addition to the other cases he/she is in charge of."*

The teachers' responses (during earlier interviews) suggest that they were aware of dyslexia but wanted more help from specialists. However, one supervisor alleged that there was a:

> *"...lack of awareness amongst a number of teachers about learning difficulties."*

<u>Theme 14 – Negative perspectives of parents:</u>

This theme is related to the question on the challenges facing the supervisors and the codes created illustrate how social stigma is attached to learning difficulties (dyslexia) and hence, a feeling of shame amongst parents who do not do much to help alleviate their children's problems. According to one supervisor:

> *"There is a lack of knowledge and cultural awareness in the community of the topic of learning difficulties and [there are] misconceptions held by some parents regarding the concept of learning difficulties, which they do not want attached to their children."*

The response reveals that the parents' negative perspectives need to be addressed through increased awareness campaigns.

<u>Theme 15 - Demanding that policy-makers are ever more responsive to the needs of pupils by shifting priorities:</u>

When supervisors were asked to identify areas of change to improve the implementation of early intervention, they responded that the government should play a key role by shifting priorities and creating policies that improve teaching methods or assessment. Moreover, schools should recruit specialists and prepare supervisors for early intervention, while teachers should use innovative teaching approaches.

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One supervisor suggested that:

> *"Changes that are essential can be brought about by the government. The government should make this issue a priority by requiring the Ministry of Education to pay more attention to special education, especially learning difficulties (dyslexia)."*

With regard to the need for specialists, the suggestion was:

> *"Skills development teachers who are familiar with early intervention should be recruited… and their task should be to give pupils with specific learning difficulties individual lessons in the skills they have previously failed in."*

Most importantly, the supervisors stated a desire to receive training, as in:

> *"Preparing supervisors so as to ensure they have adequate knowledge and experience in special education."*

Finally, impetus was given to the integration of technology and use of innovative approaches, mentioning:

> *"The use of technology, as well as modern and suitable educational approaches."*

These responses emphasise that a difference in approach to dyslexia is desired.

6.3.2 Focus Group Sessions

6.3.2.1 Focus-group Interviews with Teachers

Focus groups were also completed with teachers to obtain their feedback on the challenges facing them when implementing early intervention. The focus groups were analysed separately as the participants exchanged feelings, views and ideas about SplD (dyslexia) as part a group. Moroever, the focus groups unlike the semi-structured face-to-face interviews illuminated the differences in perspective between groups of individuals.

The teachers who consented to take part in the focus groups wanted to be part a homogenous group, to engage in discussion, and to identify issues. Four teachers took part in the focus group interview. The same schedule of questions as had been prepared for the interviews was used for the focus groups. Some of the questions were also the same as those used in the questionnaire, as the aim was to promote discussion on those topics. The teachers' focus groups lasted one hour and the sessions were audio-taped. Notes were also taken. The transcribed data were then analysed thematically using NVivo, thus generating 39 nodes and 14 themes (Table 6.3).

Table 6.3. Teachers' Focus Groups - NVivo nodes/codes and themes generated

Questions	No. of Nodes	Codes (Nodes)	Themes
Q.1	1	**Training**	
	2	Lack of training	**Empowering teachers**
	3	Timing of training	
Q.2	4	**The effect of long teaching sessions**	**Strengthening teachers' self-efficacy**
	5	Declining performance	
Q.3	6	**Time constraints and lengthy lessons**	
	7	Less emphasis on early interventions	**Being bogged down by issues of time**
	8	Too many skills to learn	
	9	Suggestion to separate pupils	
Q.4	10	**Added responsibilities**	
	11	Affects early intervention	**Competing interests and commitments**
	12	Pressure and strain	
Q.5	13	**Arabic language curriculum**	**The crisis of redesigning the curriculum**
	14	Inadequate	
	15	Too many lessons	
Q.6	16	**Resources**	**No constraints**
	17	Availability	
Q.7	18	**Parents' awareness**	
	19	Adamant	**Unyielding parents**
	20	Lack of awareness	
Q.8	21	**Financial constraints**	**Policy-makers need to be ever more responsive to the needs of pupils**
	22	Hindrances	
	23	Inadequate	
Q.9	24	**Preparation programmes**	
	25	Hopelessness	**Frustrated teachers**
	26	Need for intense training	
	27	Limitations	
Q.10	28	**Teachers' workload**	**Expansion of the teacher's role; balancing work pressure, stress, supervisors' attitudes, and suffering from self-doubt**
	29	Multiple roles	
	30	The need for assistants	
	31	Balancing roles	
Q.11	32	**Difficulties faced when implementing early intervention strategies**	**The absence of student-centred policies; frustration with parents**
	33	Poor supervision	
	34	Poor lesson plans	
	35	Lack of parental awareness	
Q.12	36	**Identifying areas of change**	
	37	Pooling teachers	**Innovative practices**
	38	Modifying textbooks	
	39	Hiring additional teachers	

The teachers in this instance were of the opinion that they lacked training in the implementation of early intervention and one suggested there was a:

> "*need for training related to evidence-based interventions, so that they can be delivered in the intended manner.*"

However, it was suggested that they needed:

"autonomy to schedule such training activities, so that time can be used efficiently."

There was in fact a consensus that teachers' performance was declining due to long teaching sessions. Therefore, in order to implement early intervention strategies, the teachers suggested a need to strengthen self-efficacy. They were also bogged down by issues of time and unable to engage in early intervention, because:

"the time allocated for the session is not sufficient"

and they had to teach too many skills to their classes. This prompted them to exclude pupils with SpLD (dyslexia) and

"separate them from all classes after their initial diagnosis".

One of the interesting themes that fits with the interview data was competing interests and commitments. Teachers had to cope with added responsibilities, which caused:

"mental strain,"

thus affecting early intervention. Another theme was the crisis of redesigning the curriculum, as current practices are inadequate and include many lessons. One of the teachers suggested modifying the curriculum:

"a reduction in the number of lessons and the required skills for all stages."

As part of a group, the teachers did not complain about a lack of resources and there was a consensus that the

"school provides educational materials".

However, the teachers were obliged to confront unyielding parents, who adamantly refused

"to accept that their children are referred to as having learning difficulties".

This indicates a lack of awareness amongst parents.

The teachers in the group felt that the Ministry of Education should do more and be ever more responsive to the needs of pupils. They suggested that the Ministry was not adequately funding schools and financial constraints hindered early intervention. One teacher opined:

"Financial support provided by the school is not sufficient and very limited, which can be considered as one of the obstacles facing the implementation of early intervention."

The teachers were frustrated with the preparation programmes, which were:

> *"limited to normal teaching and do not include physical therapy, speech-language pathology, and occupational therapy."*

They felt they were in a hopeless situation and this dissatisfaction was articulated by one teacher as follows:

> *"The status of professional education programmes in early intervention is appalling. Programmes are required so that teachers become psychologically and mentally prepared before joining the teaching profession."*

The suggestion was that they needed:

> *"intense teacher training."*

The teachers' responses indicate they were willing to accept heavy workloads, as long as they were able to find a

> *"balance between administrative and technical work",*

failing which they could suffer from self-doubt. Another theme that emerged was the expansion of the teacher's role, as the teachers had to enact multiple roles:

> *"Besides maintaining my own expertise in the field of teaching, I have to perform the role of a specialist."*

To address this concern, the participants proposed appointing assistants

> *"to take some of the teacher's workload".*

Complaints about the quality of supervision and poor lesson plans were also expressed by the teachers in the group. As a result, they pointed to an absence of student-centred policies. They were also frustrated with parents who lacked awareness of dyslexia and the importance of early intervention. In order to meet the challenges, the teachers identified areas of change and recommended the use of innovative practices; for example, pooling teachers, modifying textbooks, and hiring additional teachers. One teacher elaborated on how teachers could be pooled:

> *"Schools should make joint decisions and share teachers in a balanced way...because some schools may have more than the required number, while others may have severe staff shortage. In this manner, teachers could have extra hours which can be used for early intervention programmes."*

6.3.2.2 Focus Group Interviews with Supervisors

Four supervisors took part in the focus group interview. Data analysis of the focus group responses generated 35 nodes and 14 themes (Table 6.4).

Table 6.4. Supervisors' Focus Groups - NVivo nodes/codes and themes generated

Questions	No. of Nodes	Codes (Nodes)	Themes
Q.1	1	**Inappropriate diagnostic approaches**	**Improper identification and remediation**
	2	Incorrect approaches	
	3	Crucial for planning budgets	
Q.2	4	**Best possible start**	**Timely remediation**
	5	Early start	
Q.3	6	**Intervention specialists**	**A lack of specialist remedial teaching**
	7	Crucial for early intervention	
	8	Essential for educating teachers	
Q.4	9	**Supervisors' expertise**	**The absence of reciprocal knowledge exchange**
	10	Not specialists	
	11	Lack of experience	
Q.5	12	**Financial support**	**A lack of government dedication and interest**
	13	Awareness is crucial for support	
	14	Making the government aware	
Q.6	15	**Cooperation within the school**	**Need for active collaboration**
	16	Interest in preceding cooperation	
Q.7	17	**School amenities and services**	**The absence of innovative approaches**
	18	Ill-equipped	
	19	Inadequate services	
Q.8	20	**Workshops**	**The absence of professional development activities**
	21	Lack of training and development	
Q.9	22	**Teachers' handbook**	**Ineffectual**
	23	Not useful and requires modification	
Q.10	24	**Design of teaching programmes**	**Not practical**
	25	Ineffectual	
Q.11	26	**Seeking expertise from external organisations**	**A lack of interaction**
	27	Not evidence-based	
Q.12	28	**Challenges**	**A lack of direction; flawed perspectives**
	29	Lack of interest from supervisors	
	30	Societal awareness	
	31	Frequent changes in the curriculum	
Q.13	32	**Identifying areas for change**	**Demanding policy-makers to be ever more responsive to the needs of pupils; shifting priorities**
	33	Needs-based curriculum for teacher training	
	34	Modifying the existing curriculum	
	35	New lesson structure	

The themes that emerged from the supervisors' responses were the same as those generated for the semi-structured interviews. The supervisors were of the opinion that there were no suitable approaches for diagnosing pupils with SpLD. According to one respondent, the diagnosis depended on an individual interpretation from the teacher, but such methods

> *"are not scientifically or academically proven."*

The participants in the groups were of the opinion that early intervention should start in either the third or fourth school year. This is because this is:

> *"appropriate to start the process of early intervention, as the pupils have a number of skills that can be observed and measured."*

The supervisors admitted that the absence of specialists in the schools

> *"may not help improve implementation procedures for pupils with learning difficulties and subsequently increasing student achievement"*.

With regard to the support provided by the Ministry of Education, one of the respondents claimed that the

> *"lack of adequate funding for schools affects the implementation of early intervention programmes"*.

There were concerns among the respondents and all individuals in the group overwhelmingly responded that there were financial constraints and the support the school received was inadequate.

6.4 Discussion

This section discusses the results of the qualitative phase of this study. In the first part, the findings relating to the challenges faced by Arabic language teachers when implementing early interventions for pupils with dyslexia are discussed. The second part discusses the findings related to the challenges facing teaching supervisors.

6.4.1 Findings Related to Arabic Language Teachers

In the following paragraphs, the challenges faced by teachers and how they are trying to overcome them are explored in detail. The themes that emerged during the narrative process provide a rich description of teachers' perspectives. These initial themes were developed by categorising the codes (Table 6.5). There were common themes in both the interview and focus group transcripts and these were consolidated, so that only those representing important concepts in the data are discussed. As an inductive approach was used to identify the themes in the analysis, the emphasis was on searching for meaning and not on what the participants had narrated.

Table 6.5. Additional themes: Teachers' interviews and focus groups

Initial Categories		Initial Themes from the Interviews		Initial Themes from the Focus Group		Final Master List of Themes	
1	Training	1	Prepares and empowers teachers	1	Empowering teachers	1	Preparing and empowering teachers
		2	Optimal timing of training				
2	The effect of long teaching sessions	3	Delivery of feasible and acceptable intervention sessions	2	Strengthening teachers' self-efficacy	2	Strengthening teachers' self-efficacy
3	Time constraints and lengthy lessons	4	Intensifying the delivery of interventions	3	Bogged down by issues of time		
4	Added responsibilities	5	Competing interests and commitments	4	Competing interests and commitments	3	Competing interests and commitments
5	Arabic language curriculum	6	Traditional teaching approaches and an obsolete curriculum	5	The crisis of redesigning the curriculum	4	The crisis of redesigning the curriculum
6	Resources	7	Eclectic approaches	6	No constraints		
7	Parents' awareness	8	Parents' responsibilities and commitments	7	Unyielding parents	5	Unyielding parents
8	Financial constraints	9	Monetary bottleneck	8	Policy-makers to be ever more responsive to the needs of pupils	6	More responsiveness to pupils' needs
9	Preparation programmes	10	Obsolete and outmoded programmes	9	Frustrated teachers		
10	Teachers' workload	11	Multiple demands on teachers' time	10	The expansion of the teacher's role		
11	Difficulties faced when implementing early intervention strategies	12	The absence of student-centred policies	11	The absence of student-centred policies		

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12	Identifying areas of change	13	Expansion of the teacher's role	12	Expansion of the teacher's role		
		14	Teachers feel threatened	13	Achieving a balance between work pressure, stress, supervisors' attitudes and suffering from self-doubt		
		15	Strengthening teachers' specific competencies	14	Innovative practices	7	Innovative practices
		16	Elevating the teacher's voice in shaping special education policies and facilitating early intervention				

Theme 1: Preparing and empowering teachers

It is apparent from the responses (leading to the development of this theme) that the teachers were aware of the significance of early diagnosis; for instance, the type and level of the children's learning difficulty. The teachers implied that they wanted to reduce the disadvantages faced by learners with dyslexia. It is not certain if they were aware that teachers could contribute to low self-esteem in children with dyslexia (Humphrey, 2003). However, they perceived that early diagnosis could enable symptoms to be identified (Woodcock et al., 2001; Humphrey & Mullins, 2002a; Fuchs & Fuchs, 2006) and a positive self-concept and locus of control to be established (Glazzard, 2010).

The teachers presumably had no experience in administering tests, for example psychometric tests, or cognitive tests (such as the Dyslexia Screening Test or Phonological Abilities Test). One could also infer from the responses that the teachers not only wanted to learn how to establish whether children with poor reading abilities had specific difficulties; for example, by screening and evaluating automaticity, but they also wished to shape their self-concept and self-esteem. Training teachers to address the issue of dyslexia and its relationship with self-concept and self-esteem not only increases awareness, but also enables a process of reflection, where they are better equipped to understand how to deal with pupils with dyslexia (Glazzard & Dale, 2013). Incidentally,

none of the teachers in the focus groups had received any training or attained special education qualifications.

The need for training was emphasised by most of the teachers, as they wanted to learn new skills to increase their pupils' learning. Nevertheless, the teachers in the focus groups stated that they preferred excluding pupils with SpLD (dyslexia) and keeping them

"separate…from all classes after their initial diagnosis".

The teachers persisted in their view that such children should be placed in separate classes and seemed to assume that they could be given highly individualised and closely supervised interventions. These perspectives made it clear that the respective teachers had limited general knowledge of SpLD (dyslexia), which can be explained as a lack of training. This finding shows that policy-makers have been unable to promote the inclusion of students with SpLD (dyslexia). This also implies that schools in Kuwait have not adopted a social model approach to inclusion, whereby a distinction could be made between the learning difficulty and the underlying impairment (Riddick, 2006). Moreover, it is quite contrary to the approaches adopted in the UK or other countries in the West.

The teachers desired training that was effective and which would enable them to determine the most effective prevention and early intervention strategies for pupils with SpLD (dyslexia). One teacher remarked there was an urgent *"need for training related to evidence-based interventions".* However, interventions that are evidence–based may not be warmly welcomed by policy-makers (Little & Sodha, 2012). Moreover, there is a lack of research into evidence-based intervention and practices in Kuwait. Although there are claims that Kuwait has met the needs of all pupils requiring special needs education, there has been little research or openness to inclusive education (Weber & City, 2012). All this must have compelled the teachers to voice their opinions on the significance of training - not just practical training, but the need to engage with theory. Their responses suggest a need for more support and encouragement. Empowering teachers to cater for the needs of pupils with SpLD (dyslexia) should begin with awareness and training and this awareness must start at the level of national policy.

Training is all the more important for the teachers described above, as the current teacher preparation programmes are obsolete and outmoded. The teachers studied appeared frustrated and stated that they felt hopeless, pointing to their need for intensive training. It is claimed that teachers graduating from Kuwait University, or the College of Basic Education are taught courses which only consist of basic concepts of special education and

teaching methods (Al Shammari, 2006). This implies that teachers are not taught how to identify pupils with SpLD (dyslexia), or how to deal with such children, their parents, or the authorities concerned. Therefore, teachers need adequate training in how to respond to children who require special education, prior to starting their career (Avramidis & Norwich, 2002).

However, the teachers require intensive training, but not an intensification of their daily work, which leaves them with little time to prepare and deliver interventions. What they actually need is knowledge, essential skills, and a good balance between theory and practice to improve teaching quality (Robinson, 2006). These findings therefore raise the question of professional development. Specific training opportunities for those working in the field of Special Educational Needs were provided for teachers in Kuwait by the Ministry of Education about 10 years ago, following the establishment of the Dyslexia Higher Education Committee. This was to raise awareness of dyslexia in mainstream Kuwaiti schools (Aladwani & Al Shaye, 2012). Nevertheless, it may be argued that training and professional development has not been systematically offered to teachers.

The findings also substantiate the results of previous studies (for example, Gwernan-Jones & Burden, 2010), which have established that while teachers may be aware of dyslexia and understand the significance of early interventions, the efficacy of training is subject to the readiness of policy-makers to provide adequate support.

Theme 2: Strengthening teachers' self-efficacy

The theme 'strengthening teachers' self-efficacy' was developed after categorising the codes: 'teachers exert too much effort'; 'too many Arabic language sessions'; 'pressure caused by long teaching hours and longer lessons'; 'more time required for early intervention programmes'; 'too many pupils' (or class sizes too large); 'unable to monitor and follow-up pupils'; 'ill-prepared supervision plan'; 'cumbersome and demanding', and 'declining enthusiasm'. These codes were derived from the respective teachers' responses, such as complaints about longer classes or teaching hours, caused by extended language teaching sessions, all of which hamper the delivery of interventions.

Too many language sessions and excessive class sizes appeared to prevent teachers from delivering early intervention. The teachers declared a preference for separating pupils with SpLD (dyslexia) from their peers, instead of opting for smaller classes. On the other hand, smaller classes would allow them to give more individual attention to individual pupils

and could encourage positive behaviour and attitudes, creating safe environments for children with SpLD (dyslexia). Here, interaction would be easier for them and they would be likely to feel more self-assured and less embarrassed in front of their peers and teacher (Humphrey, 2002; Wilson, 2002; Casserly, 2013). In such environments, teachers can teach children how to learn differently (Brooks, 2007). According to Elias (2014), teachers tend not to enjoy working with large class sizes if they also have to offer support to pupils with dyslexia. Moreover, large class sizes can impede teaching opportunities, where pupils are trying to master or build on concepts. Training programmes help educate teachers and make them realise that smaller classes will surely result in more attention being given to individual learners, rather than separating children to provide them with individualised interventions.

According to the teachers taking part in the study, long teaching hours can also negatively impact their performance, because they may be extremely weary towards the end of the school day. The respondents claimed that long hours can increase pressure and potentially affect early intervention. Moreover, the literature states that children with poor short-term auditory memory cannot absorb what they are taught (Hodge, 2000).

It is apparent from the previous literature that teachers with higher levels of self-efficacy also have greater capacity to work with pupils who have difficulties (Gibson & Dembo, 1984, cited in Rodriguez et al., 2014). Therefore, one could argue that pupils with dyslexia may benefit from having teachers with high self-efficacy. The literature also states that self-efficacy brings with it the confidence required by teachers to effectively develop the curriculum, while also responding to their students' social needs and desire for emotional well-being (Hoy & Spero, 2005; Bandura, 2007). Bandura (1997) states that self-efficacy may be defined as the belief "in one's capabilities to organize and execute the courses of action required to produce given attainments" (p.3). It is claimed that teachers who have confidence in their abilities may be able to better promote student learning (Bandura, 2007; Hoy, 2000).

The lack of self-efficacy among teachers and the time constraints which beset them have cast doubts on their capabilities. Such beliefs indicate that they do not have any control over their own work and need external help; for example, training or better support from supervisors, the school management and policy-makers. If they are given support, they may be able to give more attention to what they do in their classrooms, have more control and be less inclined to blame others.

The codes relating to this theme also reveal that the teachers participating in the study have a positive attitude. They want to see themselves as confident and competent individuals who are keen to improve their teaching practices and to support children with dyslexia. In a nutshell, they have a vision of what it is to be a professional.

These findings are correlated with the literature on teachers' self-efficacy, whereby teachers who perceive themselves as confident in their teaching practice are more capable of creating engaging learning environments for their pupils (Goddard et al., 2004; Gwernan-Jones & Burden, 2010; Bordelon et al., 2012).

Theme 3: Competing interests and commitments

The teachers reported during the interviews that they had to manage the implementation of the new curriculum, taking on additional responsibilities, besides their daily monitoring of pupils. The argument is that the new curriculum and the Ministry of Educations' policies could have resulted in teachers experiencing overload. Literature from the UK (DfE, 2010, 2011) explains that teachers do not have sufficient time for planning, preparation and assessment in UK schools. They also appear to be without professional autonomy. They experience intensification rather than increased professionalisation in their lives and work (Apple, 2004). This suggests that the situation is not unique to Kuwait alone.

The increased burden of work on teachers seems to distract them and as a result, they are unable to implement early intervention programmes. These competing interests have made it difficult for them to fulfil their duties to a reasonable standard. Besides, the interview data show that the teachers' workload and added responsibilities have intensified their working hours, not permitting them to spend adequate time on implementing early intervention programmes.

The daily requirements seem to take up much of teachers' time. Too much work and not enough time not only pose a problem for teachers, but can also affect their attitudes to inclusion. With no clear delineation of their responsibilities, teachers are obliged to undertake multiple tasks within a limited timeframe, thus leading to conflict in their roles. To make matters worse, supervisors' attitudes, reflected in poor supervision and feedback have also contributed to increased frustration amongst teachers, who feel threatened and forced to comply with their supervisors. If one were to dissect the hidden meanings behind the teachers' responses, it could be interpreted that the focus is more on the curriculum and the supervisors' lesson plans, rather than on the children's difficulties. This conflict

between the teachers and their supervisors also appears to be another source of stress, added to the long working hours. A lack of support from supervisors and policy-makers may have led to increased anxiety and frustration amongst the teachers. This is further compounded by the fact most supervisors lack experience and may have poor or inadequate knowledge of SpLD (dyslexia). As a result, they will not have much idea of proper and relevant early intervention approaches.

As a result, the teachers interviewed realised there was a gap between theory and practice and expressed a need for more support that would help explain this gap and how to bridge it. Nevertheless, they were willing to continue carrying out these tasks if they were provided with teaching assistants. However, despite the multiple demands on teachers' time caused by the new curriculum and the expansion of the teacher's role, the above-mentioned teachers were committed.

Theme 4: The crisis of redesigning the curriculum

This theme emerged from the accounts of those teachers who were interviewed, as well as from the focus groups. The initial theme, 'Traditional teaching approaches and an obsolete curriculum', which was developed in consideration of the codes relating to the Arabic language curriculum, such as outdated course books, poor lesson plans and an ill-planned curriculum, was later merged with the theme 'Eclectic approaches'. As a result, the theme: 'The crisis of redesigning the curriculum' emerged, which also includes the availability of 'resources'.

The teachers were not only concerned about curriculum shortfalls, but also about the lack of adequate resources made available to schools. They were anxious that there was no policy to support pupils with dyslexia. As one teacher mentioned,

> *"there are no educational materials and equipment for the implementation of early intervention".*

In the absence of infrastructural facilities, more pressure is placed on teachers, which can lead to teachers becoming cautious about inclusion (Koutrouba et al., 2006). Such an attitude was also evident when teachers' responses were coded to develop the previous theme, 'Competing interests and commitments'. The teachers wanted more resources so that pupils could be eased into learning, using new approaches and the available resources. There was also the apprehension that the current educational policies were not directed towards fostering student-centred learning.

In the face of the rigid centralised curriculum introduced by the Ministry of Education, the teachers' professional confidence had grown weaker and their morale was lower, leaving them uncertain about their ability to cope and their right to make major decisions over the curriculum. The teachers appeared to believe that the responsibility for the curriculum design ought to be in their hands, rather than being controlled by policy-makers (external stakeholders) who were not conversant with the problems they were dealing with each day.

According to the teachers' responses, schools are still using traditional approaches to deal with dyslexia. However, although conventional methods may have their own value, there is a need to employ a wider range of pedagogies and strategies; for instance, a multi-sensory learning approach and differentiation in the regular curriculum, or an adaptation of instruction, according to differences between pupils (Berninger & May, 2011). The teachers' responses clarify that they would only be content with *"an eclectic mix of strategies and approaches"* that meets the needs of the students and their preferences (Reid, 2012).

Theme 5: Unyielding parents

The teachers in this instance stated that they found it difficult to deal effectively with parents who were adamant and did not want to label their child as dyslexic. Instead of contributing to their child's development and differentiating between thriving and failing, the parents tended to direct their frustration and anger at the teachers (Perryman, 2005). The failure of parents to recognise their children's learning difficulties is likely to further increase teachers' stress levels (Shin et al., 2008). It would also add to the pressure they already endure due to increased workload and longer teaching sessions. This finding supports the results of previous studies that have demonstrated how parents' attitudes can cause stress among teachers (for example, Shin et al., 2008; Rogers, 2011). Research also shows that parents' attitudes are influenced by cultural factors, which puts them in a state of perpetual denial to cover their anxiety (Ho & Keiley, 2003; Shin et al., 2008). The teachers' responses here propose that parents depend on teachers to intervene and avoid becoming stigmatised by members of the community, or considering SpLD (dyslexia) as shameful and a source of social embarrassment.

The teachers' lack of training, as elaborated on earlier (Theme 1), is compounded by the parents' lack of parental involvement. The teachers also seemed to be frustrated by the lack of parental cooperation. As stated previously, teachers usually have to work under stressful conditions and consequently, may not always be able to shape positive attitudes amongst

parents, especially when they lack appropriate experience of responding in such situations. It is apparent from the teachers' responses that communication and interaction are necessary to convey as much information as possible; making parents aware of their child's learning difficulty. Such interactions may increase parental interest, cooperation, and also responsibility and commitment. It could moreover contribute to increasing trust and understanding amongst teachers and parents. The research shows that collaboration between parents and teachers is essential for what could be described as 'good practice'. This means many things, such as multi-sensory teaching, supporting self-esteem, and robust assessment (Brown & Bell, 2014).

Theme 6: Being more responsive to pupils' needs

Most of the responses to the question of whether financial constraints have an impact on early interventions drew negative responses from most of the teachers. The Ministry of Education, responsible for funding schools has not provided adequate support. Therefore, schools have not been able to fund their Arabic language departments. The responses show that finance is crucial for motivating teachers and for providing student support. However, this funding needs to be decentralised, if schools are to provide better support for pupils with dyslexia. In the UK, the government has responded to Rose's (2009a) recommendations and provided additional financial resources for training teachers and raising dyslexia awareness (Bell et al., 2011). Similar efforts may be required in Kuwait to alleviate the burdens and anxiety affecting teachers.

Schools also have a responsibility to use funds appropriately. If each school's management could make decisions about the use of funds, it would not necessarily help teachers to implement intervention strategies. Judging by the overall responses of the teachers studied, funding should be based on the priorities of all stakeholders, including teachers. Instead of putting teachers in the position where they are obliged to spend their own money to purchase educational resources, policy-makers need to be more responsive to pupil's needs.

Theme 7: The teacher's voice and innovative practices

This theme was developed from the initial themes generated in the face-to-face interviews with the teachers and the focus groups, namely strengthening the specific competencies of teachers, elevating their voice in shaping special education policies, and facilitating early intervention and innovative practices.

The responses that generated this theme suggest that if early interventions are to be successfully applied in schools, there should be frameworks in place to support teachers' competence. However, a framework of teaching competences is not a solution, because although such a framework could support teachers' professional development and promote quality in education, it would not especially enable teachers to organise and improve their professional competences. Pupils with dyslexia, who need specialised instruction outside their regular classes, can only develop their skills if teachers are competent and can deliver early interventions. Furthermore, the competences involved in classroom teaching practice may need to be innovative to reduce the impact of the learning difficulty and help the pupil overcome and manage their more debilitating symptoms. In order to strengthen teachers' specific competences in this regard, training might be required to emphasise the study of the development of reading skills and discern what it is to learn in diverse ways. In addition, teachers require supervised practice opportunities, if they want to be successful, especially if they are assigned responsibility for pupils with dyslexia or other reading difficulties.

The teachers interviewed did not have any specialist qualifications or training and therefore, the quality of learning and teaching was not very high. In order to identify pupils with dyslexia at an earlier stage, the teachers reported that they needed appropriate learning resources. They had already voiced their opinions on needing more support to engage in innovative practices and approaches. For example, the methods supported in the existing research are explicit, systematic, cumulative and multi-sensory, in that they integrate all the main language skills. It is to this effect that almost all the teachers interviewed consistently insisted that they needed training. They felt that training could make them feel more confident and competent in their ability to think and understand, as well as being innovative and reflective in their teaching approach.

The responses related to this theme suggest that teachers not only facilitate learning, but their opinion is critical to shaping special education policies and in schools in general. In order to address the challenges they face when attempting to implement early intervention programmes, the teachers wanted more participation and decision-making powers to modify the curriculum and make it more inclusive. They perhaps sought these powers because Kuwait's education system is highly centralised and controlled by the Ministry of Education, which suppressed their personal feelings and views. This discrepancy led to frustration and the teachers did not feel they had a voice, thus adding to their stress. However, their responses indicate that the teachers had not given up and they did not

complain that they had lost interest in teaching their pupils. They also perceived their decisions were important for the development of pupils with learning difficulties and were willing to accept responsibility for such decisions. Some of the suggestions they put forward to implement early intervention involved pooling teachers; modifying textbooks; hiring more teachers and teaching assistants; respecting teachers' beliefs; changing parents' perceptions, and holding teachers responsible. The responses related to this theme indicate that all stakeholders, whether on the school or policy-making side may have to make more serious efforts to increase the voice and influence of teachers, by working to expand the teacher's role in decision-making beyond the classroom.

6.4.2 Findings Related to Arabic Language Supervisors

The codes from which the initial themes emerged were read repeatedly. This enabled a thorough examination of the themes, whereby 15 were initially found. This iterative process continued until the final master list of themes was created, with some of these themes being merged (Table 6.6). Data reduction brought down the number of final themes to eight.

Table 6.6. Additional themes: Supervisors' interviews and focus groups

Initial Categories	Initial Themes from the Interviews	Initial Themes from Focus Group	Final Master List of Themes	
Inappropriate diagnostic approaches	Improper identification and remediation	Improper identification and remediation	1	Early identification and timely intervention
Best possible start	Early start	Timely remediation		
Early intervention specialists	Lack of specialist remedial teaching	Lack of specialist remedial teaching	2	Conventional remediation
Supervisors' expertise	Absence of reciprocal knowledge exchange	Absence of reciprocal knowledge exchange	3	Need for collaboration, co-production and reciprocal relationships
	Blame game			
Cooperation within the school	Need for active collaboration	Need for active collaboration		
School services	Absence of innovative approaches	Absence of innovative approaches	4	Need for innovative strategies and approaches
Teachers' guidebook	Ineffectual	Ineffectual		
Seeking expertise from external organisations	Lack of interaction	Lack of interaction	5	Significance of external support
Challenges	Teachers' professional awareness and lack of support	Lack of direction	6	The need to build professional expertise
Design of teaching programmes	Theory-based approaches	Not practical		

Workshops	Mandated attendance	Absence of professional development activities		
Parents	Defective perspective of parents	Defective perspective of parents	7	Social stigma
Identifying areas of change	Demanding policy-makers to be ever more responsive to the needs of pupils by shifting priorities	Demanding policy-makers to be ever more responsive to the needs of pupils by shifting priorities	8	Disempowering children with dyslexia
Financial support	Lack of government dedication and interest	Lack of government dedication and interest		

Theme 1: Early identification and timely intervention

The initial themes, 'improper identification and remediation', 'early start' and 'timely remediation' were merged to form this final theme: 'early identification and timely intervention'. The questions that led to the development of this master theme were: 'Do you think that the methods for identification and diagnosis of pupils with SpLD are appropriate? Please explain' and, 'In your opinion, from which grade should the implementation of early intervention begin and why?'

It is evident from the research that pupils with dyslexia should be identified as early as kindergarten (Fielding-Barnsley & Purdie, 2003; Elbro & Petersen, 2004; Eleveld, 2005; Hindson et al., 2005; van Otterloo et al., 2009). However, despite the fact the literature has stressed the importance of early identification and timely intervention (Fletcher & Currie, 2011; Snowling & Hulme, 2012), the responses to the interviews and focus groups indicate that supervisors lack the professional knowledge to educate teachers in how to recognise the signs or use early screening on a routine basis. Moreover, the schools the supervisors were involved in did not in fact appear to be 'dyslexia-friendly' and therefore, may not have been providing effective reading interventions for affected pupils, or have been using assistive technology, such as voice-to-text software.

The supervisors' responses reveal they were aware of the fact the optimal age for beginning an intervention was between three and four years old (kindergarten or first grade in school), but they were unaware of appropriate diagnostic approaches. Motor ability increases around the age of three. This is accompanied by the development of language skills, where considerable advancement may be experienced. Children then start forming short sentences, using just a few words, but the child's sense of humour will even emerge (Zucker, 2010). In terms of emotion, the fear of separation and strong emotional reactions also begin to surface.

Theme 2: Conventional remediation

This theme was developed from responses to the question, 'Do you have specialists for early intervention in your school?' These responses were coded, leading to the emergence of the initial codes: 'Lack of specialist remedial teaching'.

The lack of early intervention specialists or specialist support and the use of psychologists as specialists show an absence of specialist remedial teaching. Under such circumstances, the instruction provided is conventional and pupils may continue to fail (Joshi et al., 2002; Adeniyi & Lawal, 2012). This would create situations where pupils with dyslexia are not reviewed for their educational strengths and weaknesses to determine any specific difficulties they may exhibit.

The supervisors interviewed were of the opinion that the lack of specialists was compounded by the teachers' lack of expertise in providing adequate instruction for pupils. Although they were aware that the condition requires specialised instruction to moderate its effects on a student's educational and social endeavours, these supervisors admitted they did not have sufficient experience in early intervention. Therefore, supervisors who are expected to train or educate teachers do not seem to have any knowledge of the exact nature of the pupils' learning difficulties, for example, auditory perception, or the ability to distinguish similarities and differences between sounds.

Teachers who are ably guided by supervisors could help pupils with such problems with perception to differentiate between sounds and establish phonemic awareness, as without this kind of instruction, pupils may not be able to hear, identify or manipulate individual sounds. Although instilling phonemic or phonological awareness form part of conventional educational programmes, there was no mention of the precise methods used by the supervisors or teachers in this instance. This finding is significant, because several studies have established that Arab children with dyslexia are considered to have relative difficulty with phonemic awareness and require timely interventions to remediate the reading difficulty (Mannai & Everatt, 2005; Ashour, 2011; Bari, 2011; Halebah, 2013; Zayed et al., 2013). Although there is a paucity of research from Kuwait on phonological awareness interventions, it is essential for supervisors and teachers to have the necessary knowledge and skill in structuring their own native language and maintain positive perceptions of the role of systematic instruction in the development of phonological awareness, if they are to develop intervention programmes.

Theme 3: Need for collaboration, co-production and reciprocal relationships

This theme was created by merging three of the initial themes, referring to the absence of reciprocal knowledge exchange, the 'blame game' and the need for active collaboration. The interview questions were tied to the themes which finally emerged: 'Do supervisors have sufficient experience to apply early intervention measures and explain/transmit such information to teachers?' and 'Is there cooperation between the school administration and Arabic language supervision department regarding the implementation of early intervention?'

One of the initial themes leading to the creation of these master themes was the 'blame game'. For instance, one of the supervisors complained:

> "*It is teachers, and not supervisors, who are supposed to be experienced in the subject... If teachers identify cases of learning difficulties, they must inform their supervisors who will then guide them towards an approach on how to best deal with this category of pupil.*"

By levelling accusations at teachers, supervisors seem to be playing the 'blame game', pointing to a lack of professionalism on their part. Besides forming collaborative partnerships and establishing positive and reciprocal relationships, supervisors may need to engage in co-production to meaningfully deliver services to pupils with SpLD. Co-production is a critical aspect of an effective commissioning system, as it can allow supervisors and teachers to improve the well-being of students by building and supporting social networks (Osborne & Strokosch, 2013). Co-production can thus help build the existing capabilities of those involved, contributing to the rebuilding and promotion of reciprocity and mutuality (Boyle et al., 2010). Supervisors and teachers may also need to start believing that the time is ripe for co-production to become a mainstream approach in the delivery of services to pupils with dyslexia. By co-producing early intervention activities, they become more effective agents of change. To sum up, co-production, combined with supervisor and teacher engagement is crucial for early intervention, whereby strong communities can be created, with investment in deep-value relationships, the generation of social capital, and ensuring everyone has the support they need.

The responses to the second question tied to this theme suggest that a positive professional environment is missing from schools. There is consequently a need to further improve collaborative relationships between supervisors, teachers and the school administration in order to implement early intervention strategies. Supervisors were in agreement over the need for more reciprocal collaboration and communication between teachers, supervisors

and school administrators. By working in professional collaborative cultures, they can perform more effectively than educators who work alone (Hargreaves & Fullan, 2012). According to Cook and Collinson (2013), the key element blocking collaboration in schools is the lack of time, in the sense of unscheduled, discretionary and common time for sharing ideas with peers, as well as a lack of time specifically set aside for sharing. However, the supervisors did not express such feelings during the interviews.

Theme 4: The need for innovative strategies and approaches

This theme emerged after a decision was made by the researcher to bring together the earlier themes: the 'Absence of innovative approaches', being 'Ineffectual' and the 'Need for clear guidelines'. The interview questions were tied to the master themes: 'Does the school provide services that help with the implementation of early intervention, such as private rooms and equipment? If not, do you have any suggestions on improving the situation?' and 'Is there information or guidance in the Arabic language teachers' handbook on how to apply early intervention measures? If not, do you have any suggestions to improve this?'

According to the supervisors, the respective schools do not have resource rooms and do not use any technology to provide support for pupils with SpLD. Compounding this, there is inadequate infrastructure and expertise, as well as a lack of services. Failure to address these issues can have a major impact on pupils. Moreover, schools are reluctant to provide assistive technologies within their systems and the findings indicate a lack of inclusive teaching techniques, particularly for pupils with SpLD, with no innovative approaches evident in the classroom to address the different needs of the students. This absence of specific teaching strategies prompted one supervisor to comment:

> *"I would like to advocate the use of multi-sensory teaching and use of differentiated materials – the use of which makes students satisfied."*

Multi-sensory teaching strategies and a structured approach to teaching reading and phonics, perhaps using letters and sounds, were not considered. However, some of the services which the teachers failed to mention, but which are significant, include age-appropriate skills support, providing social support to improve self-esteem and confidence, and anxiety management. Pupils with SpLD (dyslexia) with inadequate or unsuitable support may feel worthless at school and resort to misbehaviour. Such misbehaviour is the result of low self-esteem, induced by the school environment (Scott, 2004). Frustrated

pupils with dyslexia, especially those with low self-esteem, often display antisocial or deviant behaviour (Riddick et al., 1999).

Yet another initial theme which emerged was the 'Need for clear guidelines', pointing to a lack of clarity in the teachers' handbook. A handbook with clear guidelines would provide supervisors and teachers with knowledge on how to teach in a more 'dyslexia-friendly' way and on the implementation of early intervention programmes. The supervisors' responses reveal they need tips and techniques on how to help pupils with SpLD (dyslexia) and to improve their teaching methods, but the current handbook was described as 'ill-defined' and therefore 'ineffectual'. It does not provide information illuminating the strengths of those with dyslexia, hence the theme, the 'Need for clear guidelines'.

A handbook that incorporates articles from leading experts on the subject and containing resources and guidelines drawn from evidence-based research would offer insights and ideas for teachers and supervisors. Research evidence, mainly from the UK and US, can help provide some understanding of the effectiveness of literacy interventions and when these should take place, as well as on how to prevent reading difficulties, outlining the key elements of early intervention (Rose, 2009b). Ideally, such a handbook would define dyslexia, its characteristics and the impact it has on pupils in an educational learning environment. It would additionally give an overview of any laws and regulations concerning dyslexia, associated terms and details of other publications on the topic. In short, a handbook of this nature would help teachers identify signs of dyslexia; understand how to test pupils for dyslexia; learn how to encourage pupils to read aloud; read pupils' body language to identify if may have a dyslexic difficulty; understand how to build pupils' self-esteem, and learn how to form partnerships with parents.

Theme 5: Significance of external support

The supervisors' responses to the question, 'Do you have a direct connection with educational institutions such as the Centre for Child Evaluation and Teaching or Kuwaiti Dyslexia Association, so that you could take advantage of their expertise in the field of special education?' were coded to generate the initial theme: 'Lack of interaction'. It became clear that the supervisors under study had not sought expertise from external organisations, or did not have time, which would imply that they were not interested, or were not taking the initiative to better support pupils with SpLD (dyslexia). Keeping in touch with professionals in the field who state that they have the relevant qualifications

and demonstrate expertise in the field of SpLD could help improve services for pupils with dyslexia. As the schools did not have specialist teachers, supervisors could be obliged to seek external help in identifying pupils with SpLD (dyslexia). The schools in question did in fact employ psychologists, but the responses from the supervisors indicate a need for more support. However, the option of discussion with an external agency was not something they had entertained.

Nevertheless, supervisors, who are professionals, are obliged to deal with complex problems and should consult external agencies. The capacity to work with external agencies on complex problems, such as early intervention, is referred to as relational expertise (Edwards, 2007, 2010). By working with others in this way, supervisors can acquire common knowledge. Common knowledge refers to how different stakeholders understand what matters to other stakeholders (Edwards, 2010). "Know-how involves information about who knows what and who knows to do what. But especially it involves the social capability to establish relationships to specialised groups in order to draw upon their expertise" (Lundvall, 1998, p.6). Moreover, supervisors with relational expertise are open to collaboration and strive hard to make such relationships possible. In short, supervisors as experts in their areas ought to expand their knowledge by "building links and trying to integrate what they know with what others want to, or should know and do" (Nowotny, 2003, p.155).

Theme 6: The need to build professional expertise

In order to formulate this theme, six broad themes which initially emerged, such as 'Teachers' professional awareness and lack of support'; 'Lack of direction'; 'Theory based approaches' which are 'Not practical'; 'Mandated workshop attendance', and the 'Absence of professional development activities', were merged. These themes came from language supervisors' responses to three different questions: 'Does the supervision department periodically organise workshops on early intervention for teachers?'; 'Do you think that general teacher training programmes are designed, keeping in mind the principles of specialist teaching programmes for children with dyslexia?' and 'In your opinion, what are the main challenges that you face in implementing early intervention?' The various themes discussed in the earlier sections highlight the fact that the supervisors in question do not have the professional knowledge to be able to educate teachers; they also lack professional competences in how to teach pupils reading and writing skills and fail to demonstrate

appropriate professional behaviour. All of this suggests that the schools they represent may not be positive professional environments.

Teachers' lack of professional awareness, poor support from schools and policy-makers, and an absence of workshops/training programmes constitute the main challenges facing supervisors when implementing early intervention programmes. Schools are expected to provide support by way of appointing specialists to increase teachers' awareness of dyslexia and early interventions. Given that teachers are arguably the first adults, apart from parents, to recognise the signs of dyslexia in children, it is vital they understand its nature and how interventions should be administered. Moreover, the supervisors in this instance were not fully informed, either through training or professional development programmes that there is promising evidence that pupils with dyslexia can make gains in reading accuracy and fluency when they receive early intervention (Shaywitz, 2003). In other words, to understand effective instruction for pupils with dyslexia, supervisors and teachers need to draw on research involving pupils with SpLD (dyslexia) (Ness & Southall, 2010).

The importance of teacher preparation programmes has been pointed out by several researchers (Lyon & Weiser, 2009; Joshi et al., 2009). Effective language teaching, including the teaching of reading and writing and particularly to pupils suffering from SpLD demands substantial knowledge and skill (Moats et al., 2010). Regrettably, the supervisors' professional development practices in this instance appeared to be inadequate to prepare and support teachers and specialists. According to Ness and Southall (2010), teacher preparation programmes should take into account the current definitions and characteristics of individuals with learning disabilities and how these affect pupils' development and educational performance. However, preparation programmes for supervisors and teachers tend not to have rich content and often lack the academic rigour anticipated for certification. Moreover, they were not designed with the needs of children with SpLD in mind; instead, the emphasis is theory-based, rather than practical. Preparation programmes should include insights into how the mind of a child with dyslexia works; information on how children use language; knowledge of Arabic and English linguistic systems; practical experience of teaching pupils; classroom observations when specialists and experienced teachers are teaching, and information on diagnostics and research (Moats, 2004; Joshi et al., 2009; Kormos & Smith, 2011). The findings from this study corroborate the results of previous research, namely that supervisors and teachers seem to only have a basic understanding of dyslexia (Ness & Southall, 2010).

One of the findings of this study is that the supervisors who were expected to guide the teachers did not know anything about research-based, effective practices. In other words, the supervisors in question were not aligned with current research on effective instruction for pupils with SpLD. The findings related to the theme, 'The need to build professional expertise' are thus expected to inform schools and policy-makers that preparation programmes for supervisors and teachers must be aligned with scientific research, while at the same time being culturally appropriate. Only then will the Ministry of Education be in a position to deal with these gaps and endorse more rigorous, meaningful and effective programmes for preparing teachers and providing professional development. In other words, professional development programmes and professional practices need to adapt to changing social expectations and challenges.

Theme 7: Social stigma

When questioned about the challenges facing them, the supervisors in this study responded that the 'Defective perspective of parents' and 'Social stigma' were a major concern affecting the implementation of early intervention programmes. In other words, parents' attitudes towards initiating dyslexia remediation were amongst the main challenges facing supervisors and schools.

On the other hand, research has shown that parental involvement is a key factor in implementing successful interventions (Mahoney & Wiggers, 2007; Al-Zyoud, 2011; Kellar-Guenther et al., 2014). In the current study, parents' fear of social stigma, caused by their own misconceptions of SpLD, was the main reason for them not wanting their children to be labelled as dyslexic. It was this which dissuaded them from cooperating with supervisors/schools when early intervention programmes were being implemented. According to Joachim and Acorn (2000), stigma is referred to as a mark of shame and can be either mental or physical in nature. In the case of SpLD (dyslexia), the misconception is that it is a mental stigma. There are a number of reasons which may account for the development and perpetuation of such stigmatisation and discrimination against individuals with SpLD. These reasons may include a lack of knowledge and cultural awareness amongst parents, concerning the subject of learning difficulties, coupled with the invisibility of disability cues (Ahmad, 2015).

For much of the time, parents of children with SpLD (dyslexia) are uncomfortable about accepting their child's learning difficulty and frequently lack knowledge of appropriate educational approaches to remedy learning difficulties. The lack of awareness of SpLD

(dyslexia) in the community at large, as well as amongst parents and teachers and together with ignorance of the provision available for them, is yet another issue. While supervisors and teachers do seem to be aware of the accompanying social stigma and the flawed perspectives of parents, they do not know how to use early intervention strategies to debunk parents' misconceptions.

Therefore, it is argued that culturally appropriate remediation programmes are required to overcome parents' negative attitudes (Almaazmi, 2013). It is in fact proposed in the literature that early interventions should ideally be planned by parents, teachers and specialists before implementation (Al-Zyoud, 2011). This requires an effective partnership between schools and parents, nurtured by regular consultation and the building of trust (Rogers, 2011).

Theme 8: Disempowering children with dyslexia

This last theme was formed by merging the initial themes, a 'Lack of government dedication and interest', 'Demanding policy-makers to be ever more responsive to the needs of pupils by shifting priorities', and the 'Need to change attitudes'. The rationale for merging these initial themes was that they are interconnected; for instance, financial support and government responsiveness can contribute a great deal to the empowerment of pupils with SpLD (dyslexia).

The supervisors interviewed highlighted the lack of financial support and were concerned that the Ministry of Education was not adequately funding early intervention programmes. They were also of the opinion that there was bias in financial decisions, as more importance was attached to Down syndrome and slow learning or the inability to learn necessary academic skills at the same rate and depth as peers. One of the initial themes was a 'Lack of government dedication and interest', generated by drawing inferences from responses which suggested the government needed to play a greater role and be more responsive, by assisting in student assessment; recruiting specialists; preparing supervisors, and identifying and enabling schools to use innovative approaches.

From the responses, it is clear that there is a lack of understanding, support and compassion for pupils with dyslexia. The supervisors in this study felt that it was unacceptable to continue treating pupils with dyslexia in this way and declared that policy-makers have a responsibility to recognise and adequately educate all pupils with SpLD (dyslexia). However, by failing to make resources available, as a result of insufficient funding, policy-

makers are knowingly creating an unfair disadvantage for children with dyslexia, whether directly or indirectly. This lack of support could have a predominantly negative affect on pupils' lives and serves only to dis-empower them, in what is already an underfunded area.

One of the major findings of this study is that supervisors are aware of the need for more government support and through their remarks, are putting considerable pressure on the Ministry of Education to make positive changes for children with dyslexia. They recognise that it is only by changing public policy that they can help children with dyslexia. These same supervisors believe that policy initiatives should be aimed at creating efficient service-delivery mechanisms, negating an attitude of charity and monitoring implementation at grassroots level. They seem to support the idea that the government should allocate funds and spend them meaningfully on making schools more dyslexia-friendly; providing adequate resources and materials; teacher-training; monitoring the implementation of sensitised curricula, and constantly evaluating the performance of supervisors. However, it all starts by identifying pupils with SpLD (dyslexia), in order to raise awareness and prepare teachers through appropriate programmes.

In other words, the above-mentioned supervisors are proposing interventions that adopt a broad, multi-pronged approach to enhancing early detection. However, it is ultimately a question of willingness on the part of the government to provide comprehensive and holistic education for pupils with SpLD (dyslexia), without any form of discrimination. The supervisors in question expressed a desire to change the attitude of the Ministry of Education and raise awareness, so that policy-makers work more in line with supervisors and teachers. Therefore, the call for a policy change is a step in the right direction.

6.5 Integrating Qualitative and Quantitative Data

The themes from the interview analysis were compared and contrasted with the data from the quantitative analysis, in order to present the information in a triangulated format. The integration was initiated by comparing the responses and themes from the interviews with teachers and supervisors, which Figure 4 illustrates below.
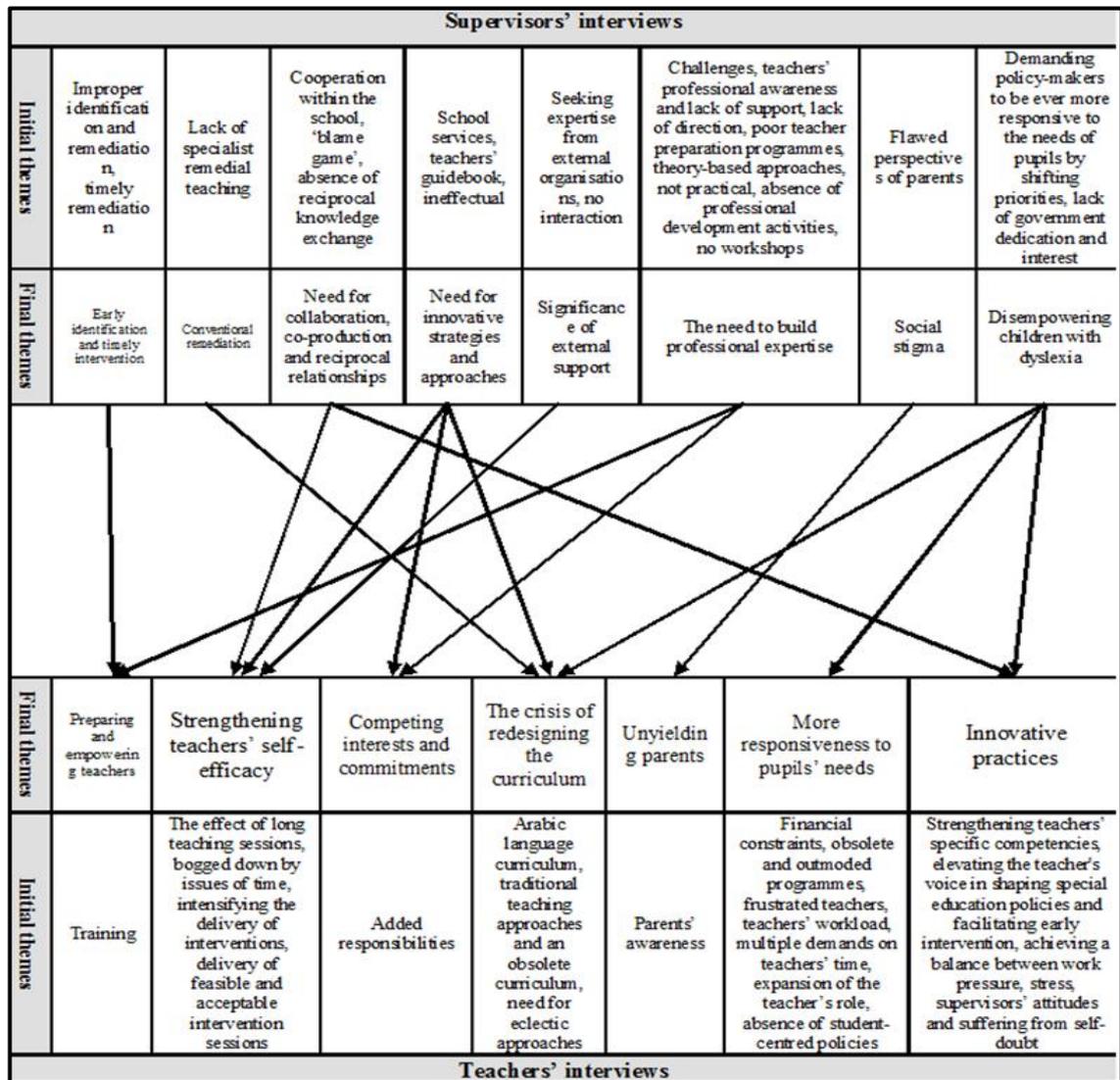
Figure 4. Comparing responses and themes from the interviews with teachers and supervisors

The integration of mixed data was enabled by a process of triangulation. The meanings of themes emerging from the interview data analysis were compared with the factors extracted and named. In order to triangulate the data, the findings from each study component were listed on the same page and it was determined where findings from each method agreed (convergence), offered complementary information on the same issue (a complementary), or appeared to contradict each order (discrepancy or dissonance) (O'Cathain et al., 2010). In most cases, the data from the interviews and questionnaires

either converged with complemented each other. There were no instances where the data contradicted each order.

Table 6.7. Integrating questionnaire (factors) and interview (themes) findings

Questionnaire findings – Teachers' responses (Factors extracted and named)		Interview/focus group findings - Teachers' and supervisors' responses (Themes)
Teachers' understanding of pupils with SpLD	'Awareness' or teachers' familiarity with the definition and characteristics of learners with SpLD/dyslexia	Creating a collaborative environment in schools where teachers and supervisors co-produce and exchange knowledge through reciprocal relationships; Supervisors felt that there was a need to make teachers understand the significance of external support
	'Facts and myths', or unproven or false collective beliefs used to identify and distinguish pupils with SpLD/dyslexia.	
Teachers' knowledge of the self-concept/self-esteem of pupils with SpLD/dyslexia	'Fear' related to teachers' knowledge of the negative self-concept or negative self-esteem of pupils with SpLD	Strengthening teachers' self-efficacy; building professional expertise; positive attitudes toward intervention can be developed; innovative practices; strengthening teachers' specific competencies; elevating the teacher's voice in shaping special education policies and facilitating early intervention; achieving a balance between work pressure, stress, supervisors' attitudes and suffering from self-doubt
	'Failure', referring to teachers' knowledge of the failure that students experience due to poor self-esteem and self-concept	
	'Solutions' or teachers' strategies to overcome students' difficulties through early interventions	
Teachers' understanding of educational issues related to early intervention	'Inadequacy' of teachers' knowledge of basic issues (for instance, the significance of early intervention, multi-sensory approaches) and a lack of the required skills to apply early intervention.	Solution: Preparing and empowering teachers through professional development and training
	'Consciousness', or teachers' awareness of critical issues related to early intervention; for instance, the significance of workshops, the detrimental effects of delayed intervention and a lack of resources	
	'Concern for support', and teachers' concern that more importance should be given to individualised interventions provided outside the classroom	

Teachers' understanding of the obstacles and barriers that prevent the implementation of early intervention	'Environment', such as packed classrooms, increased workload, lack of educational aids, financial constraints, poor guidelines, and parental non-involvement	The challenges that the teachers faced were competing interests and commitments, a lack of innovative strategies and approaches, a lack of professional awareness and a lack of support and direction; poor teacher preparation programmes, exclusively theory-based, not practical, approaches, an absence of professional development activities and infrequent workshops, an ineffectual teachers' guidebook, unyielding parents, social stigma, negative consequences and flawed perspectives from parents
	'Awareness', such as unprepared teachers and a lack of awareness of early intervention.	
	The 'dilemma' of not having the time to apply early intervention, due to the length of the curriculum and lessons	The crisis of redesigning the curriculum, conventional remediation/a lack of specialist remedial teaching, poor school services
	A 'poor sense of accountability' on the part of policy-makers and supervisors, whose objectives do not match the needs of children with SpLD/dyslexia	More responsiveness to pupils' needs, policies disempowering children with dyslexia, teachers demanding policy-makers to be ever more responsive to the needs of pupils by shifting priorities, a lack of government dedication and interest

The questionnaire and interview findings that were compared (Table 6.7) are presented as answers to the research questions.

Research question 1: *What knowledge and understanding do Arabic language teachers in Kuwait currently possess of the concept of SpLD (dyslexia)?*

Findings from the data collected and analysed quantitatively show that the teachers were to some extent aware of dyslexia, its definition and the characteristics of learners with SpLD (dyslexia). However, the findings also show that there was some confusion over the way they conceptualised dyslexia, in that they were confusing facts with myths. Another finding was that the teachers lacked training and this corroborates the qualitative results.

The solutions provided by the supervisors during the interviews would involve the teachers being trained and engaged in professional development. They suggest creating a collaborative environment in schools, where teachers and supervisors can work together; sharing and exchanging information through mutual relationships, and devising approaches for supporting students more effectively. The findings also imply the importance of external agencies in clarifying the conceptual understanding of SpLD (dyslexia) and furthering teachers' existing knowledge.

Research question 2: *What are Arabic language teachers' perceptions of the effect of dyslexia on the self-concept/self-esteem of pupils with a SpLD (dyslexia)?*

The teachers perceived that their pupils developed the fear of failure as a result of their learning difficulties. The pupils were frustrated by their learning difficulties and therefore, could not achieve either academically or socially. Moreover, the teachers were fully aware that their pupils were to some extent suffering due to poor self-esteem and self-concept and their responses indicate that these pupils' fear of failure probably arose from their fear of disappointing themselves and the people depending on them to succeed. However, the teachers also proposed strategies for pupils to overcome their difficulties; for instance, offering incentives and providing early intervention and the responses to the interview questions clarified these proposed solutions. During the face-to-face interviews, the teachers claimed that although they understood the pupils' negative self-concept, they lacked professional expertise in this area and needed training to develop positive attitudes towards early intervention. The results also indicate that the teachers lacked competence, but they also felt that in order to improve pupils' self-concept, they would need to strike a balance between work pressure, stress, supervisors' attitudes and the centralised policies on special education, formulated by the Ministry of Education.

Research question 3: *What are Arabic language teachers' perceptions of the impact of early intervention on the self-concept/self-esteem of pupils with SpLD (dyslexia)?*

The results of the quantitative data analysis reveal that early interventions can improve learners' self-concept. However, the teachers felt that they did not have adequate knowledge of basic issues; for instance, the significance of early intervention, or the use of multi-sensory approaches. Moreover, they lacked skills in applying early intervention. The findings also show that the teachers were concerned that pupils with SpLD (dyslexia) were not being provided with individualised intervention outside the classroom, such as in special rooms, since facilities of this kind were absent in schools. The interview data show that if teachers are to improve the self-concept of pupils with SpLD (dyslexia), they need professional development and training.

Research question 4: *What are Arabic language teachers' perspectives with regard to the implementation of early intervention?*

The results indicate that the teachers were facing challenges when applying early intervention for pupils with SpLD (dyslexia) in schools. They were unable to provide

remediation because of large class sizes; increased workload; the lack of educational aids; financial constraints; poor guidelines, and the lack of parental involvement. More importantly, the teachers were not prepared for or aware of early intervention. They were faced with the dilemma of not having the time to apply it, due to the scale of the curriculum and length of the lessons. The results also show that there was a poor sense of accountability on the part of policy-makers and supervisors, whose objectives did not match the needs of children with SpLD (dyslexia).

Other challenges that the teachers faced were competing interests and commitments (workload, expanded roles); the lack of innovative strategies and approaches; the lack of professional awareness and support; the lack of direction; poor teacher preparation programmes (theory-based approaches, which were not practical); unyielding parents who were unable to overlook social stigma; the absence of professional development activities (infrequent workshops), and an ineffectual teachers' guidebook.

Research question 5: *What are the perspectives of Arabic language teachers and educators on how to overcome the challenges facing the application of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?*

The findings suggest that the interventions were of longer duration and this had an adverse effect on the teachers. Their responses indicated that although there was a need to improve the delivery of the intervention, the teachers were unable to allocate enough time to provide feasible and suitable interventions. The implementation of early intervention programmes had in fact increased the teachers' responsibilities. They were subjected to increasing pressure and as a result, had too many tasks and duties at hand. Another finding was that the curriculum was outdated and not student-centred. The teachers were concerned that eclectic approaches were being used, instead of specialised, individualised teaching that was structured and that involved multi-sensory approaches, as well as the development of phonological skills.

It was also evident from the results that parents' awareness had to be increased and that they had to become more involved and committed to their children's success. The teachers perceived that schools had difficulty obtaining adequate funding from the Ministry of Education to support students and also pointed out that the policy-makers needed to take the initiative more often in this regard.

Educational preparation programmes for teachers subsequently appeared to be outmoded failing to address the needs of students with dyslexia. In other words, the teachers were not prepared for evidence-based intervention. The lack of support from policy-makers, combined with the lack of preparation and training for them as practitioners, left the teachers feeling disempowered. This information conveyed by the qualitative data complements the data generated earlier from the quantitative data; for instance, the inadequacy of teachers' knowledge of the significance of early intervention and a lack of the required skills to apply it. What can be inferred from these findings is that the empowerment of teachers through appropriate training and the strengthening their competencies may be considered as a way forward in addressing dyslexia-related issues.

Research question 6: *What are the strategies adopted by supervisors and decision-makers to try and overcome any related challenges with regard to the implementation of early intervention programmes for pupils with SpLD (dyslexia) in primary schools in Kuwait?*

The teachers' and supervisors' responses suggest that the challenges facing the application of early intervention for pupils with SpLD (dyslexia) can be overcome by preparing and empowering teachers through professional development and training. Teachers' self-efficacy can also be strengthened by creating a collaborative environment in schools, whereby teachers and supervisors co-produce and exchange knowledge through reciprocal relationships. The respondents were unable to use innovative approaches when implementing early intervention, even though the existing curriculum was inappropriate, because of the inadequate services provided by their schools and the lack of specialist remedial teaching. The supervisors felt that there was a need to make teachers understand the significance of external support. In other words, the respondents appeared to believe that by strengthening teachers' self-efficacy and building professional expertise, positive attitudes toward intervention could be developed.

The questionnaire and interview data also appeared to complement each other. This is evident in the findings, which are compared and elaborated on below:

Although the supervisors and teachers were able to articulate the challenges and also suggest strategies for overcoming them, the teachers did not seem to have a sense of self-efficacy or to believe that they were able to apply early intervention for pupils with SpLD (dyslexia). The teachers' self-efficacy had an impact on their practices, commitment and job satisfaction (Schleicher, 2015). In this case, they did not seem to experience job

satisfaction, as they stated they were burdened by their workload, large class sizes and long classroom sessions. Under such circumstances, they were perhaps not in a position to apply early intervention. Moreover, this research proposes that in order to enhance self-efficacy, there needs to be increased provision of professional development opportunities for special education (Viel-Ruma et al., 2010). On the other hand, effective professional development is vital for improving pupils' self-concept and provides ongoing learning activities for teachers (Viel-Ruma et al., 2010). Strong, positive teacher efficacy creates more positive attitudes toward intervention and motivates teachers to persist in educating and problem-solving, in order to be able to successfully teach every child, regardless of obstacles (Sadler, 2005; Jull & Minnes, 2007)

Moreover, the relationship between the teachers and their supervisors did not appear to be harmonious. A good relationship in this area is however crucial for boosting teacher self-efficacy. In other words, collaboration and cooperation were missing. Collaboration between the teachers themselves, whether through professional development or collaborative practices, also relates to higher levels of self-efficacy and job satisfaction (Schleicher, 2015). Positive interpersonal relationships will in fact mitigate otherwise detrimental factors that present a challenge for classrooms (pupils with negative self-concept, large class sizes, long classroom sessions, and so forth) and can affect a teacher's sense of self-efficacy. The interview responses indicate that many supervisors play a 'blame game' and transfer responsibility to teachers, whereas the results show that social interaction and interpersonal relationships are crucial for the implementation of early intervention. The literature also shows that social interaction between colleagues supports teachers' self-efficacy (Gebbie et al., 2012).

6.6 Summary and Conclusion

To summarise, the issues confronting school teachers include a lack of training and expertise to deal with pupils who have SpLD (dyslexia); the current curriculum; the nature and quality of support available, and the impact on the balance of teachers' workload. In this study, there has also been a great deal of discussion of the role of parents and their impact on early intervention.

The findings reveal that the teachers and supervisors interviewed did in fact understand the significance of early intervention programmes, but there was also an issue over time, as the time allocated for early intervention activities was insufficient, given the pressure to use it for other school-related work. Nevertheless, there were no misconceptions of SpLD

(dyslexia) and it was not confused with other learning difficulties. On the other hand, the teachers and supervisors concerned did not refer to any particular intervention method they were using and it was not possible within the interviews to ask them to elaborate on this, due to insufficient time to probe for detailed explanations of any of the terms used. For example, they did not use any terms like 'phonological awareness', 'phonemic awareness', or 'phonology' and were unaware of multi-sensory instructional approaches or the need for structured, sequential and direct instructions when teaching pupils with dyslexia. The respective teachers were in fact concerned that they were ill-prepared for implementing early intervention programmes and in any case, also had to work to meet time constraints and other curricular obligations. These responses highlight the need to raise awareness amongst teachers and other academic staff of the requirements of pupils with dyslexia.

Overall, it emerged from the study that the teachers interviewed disagreed with Ministry of Education policies on teacher training and inclusion. They seemed to be implementing policies they did not essentially believe in, but used their own experience, which they considered more effective. In Kuwait, education policy has changed during the past decade, but the way decisions are made by policy-makers has remained political and centralised. It has not moved towards decentralisation, accountability or competition (Wong, 2008). Educational decentralisation, or the process of redistributing power, could further empower teachers and allow them to make more decisions based on the needs of their pupils (Smith & Rowley, 2005). As a result, teachers' professional development was not given high priority; for example, they were unable to develop their professionalism. This was not precisely what the teachers expressed during the interviews. However, they seemed to make it clear that they had no power of decision-making over their roles and responsibilities in the classroom and felt trapped in the system.

From the interviews and focus groups with the teachers, the researcher in this study was able to gain deeper insights into many of the issues facing them when implementing early intervention strategies formulated by external stakeholders. However, one of the problems was that most of the teachers gave one-line responses, which could be due to their uncertainty regarding dyslexia and its impact on children. To conclude, the themes suggest that the early intervention necessary for potentially remediating pupils with SpLD (dyslexia) is out of reach of most schools in terms of finances and resources.

With regard to Arabic language supervisors, the issues confronting them may be summarised as the improper identification of pupils with SpLD and the fact only conventional remediation is applied, due to a lack of expertise, aggravated by poor

collaboration and a dearth of appropriate resources in schools. Combined with this, there is an absence of innovative approaches, with ineffectual guidelines provided and a reluctance to seek help from professionals. Ultimately, teachers do not possess an adequate level of professional awareness to address the needs of children with dyslexia in mainstream education, as they are inadequately prepared and do not receive any support from policy-makers. The supervisors also expressed concern over parents' lack of involvement and flawed perspectives, prevalent in the respective society. The changes they were hoping for would involve greater dedication and support on the part of the government and the need for policy-makers to more appropriately respond to the needs of pupils with dyslexia.

The findings of this study include the absence of inclusive teaching methods designed to improve teaching and learning and a lack of innovative approaches to address the different learning needs of children learning styles of children with SpLD (dyslexia). Moreover, the supervisors who were expected to guide the teachers had low awareness of effective, research-based practices and possessed only a basic understanding of dyslexia supervision. Conversely, a major finding of this study was that the supervisors were aware of the need for government support and asserted that the Ministry of Education should make positive changes in order to better support pupils with dyslexia.

The results of this study could therefore raise greater awareness amongst supervisors, teachers and school administrators of the need for mutual respect. It is to be expected that they would be able to access each other's facilities and share expertise and/or knowledge if they formed collaborative partnerships and established positive and reciprocal relationships.

Chapter Seven: Conclusion and Recommendations

7.1 Introduction – Revisiting the Aims and Methods

The aim of this research was to investigate the importance of early intervention and its implementation for pupils with SpLD (dyslexia) in primary schools in Kuwait, investigated from teachers' perspectives. It therefore examines teachers' knowledge and understanding of dyslexia; the support provided by policy-makers with respect to pupils with learning difficulties; knowledge of the impact of dyslexia on the self-concept of pupils with SpLD; the extent to which early intervention programmes are being implemented in schools; whether teachers are adequately trained to provide appropriate interventions, and the obstacles that hinder teachers from contributing to the development of intervention programmes, or from providing support for pupils with dyslexia. In other words, the aim was to find answers to the main research question: 'What are the challenges facing the teachers regarding the implementation of early intervention amongst pupils with SpLD (dyslexia) in primary schools in Kuwait?' Additionally, the study set out to gather information about teachers' knowledge of early identification of children with SpLD, their exposure to the needs of children coping with dyslexia, and the significance of early intervention. This was so that a better understanding of the participants' perceptions of dyslexia could be provided, along with their responsibilities and role as teachers to offer equal opportunities to children coping with dyslexia.

A mixed-method research design was implemented, bringing together qualitative and quantitative research methods. The mixed methodology approach, based on a philosophy of interpretivism was justified, not simply because qualitative data can strengthen overall findings, but also due to the richness of qualitative information. The participants were primary school teachers from Kuwait, specialised in teaching Arabic and the outcomes of the present study could be recommended as a way forward for school-based research and collaboration between schools and researchers.

7.1.1 The Role of the Researcher

In mixed-method research, the researcher collects both objective and subjective data based on the research questions. However, the researcher must give priority to one or both forms of data. In this thesis, the researcher has given priority to both quantitative and qualitative data collection and analysis.

This study was grounded in assigning essential value to the voice of the respondents (teachers and supervisors), thus also engaging them in the research process. According to Barnes (2003), research should be established in an environmental and cultural setting which will have a meaningful practical outcome and refer directly to the interests and needs of those being researched. The present researcher believes that this study meets these criteria. The important principles that were consequently taken into account included the researcher's own awareness of being privileged with access to schools in Kuwait and in gaining the trust of teachers and supervisors from these schools. The researcher therefore did not push for information or participation, but rather valued the time which was freely offered. Furthermore, the confidentiality and security of the information was assured and this trust was not breached, which was largely achieved by listening to what was actually said and not presuming to re-interpret it.

The researcher's involvement in data collection during both phases of this study differed in terms of the process involved, whether quantitative or qualitative. With the former, the researcher collected data using standardised survey procedures. Data analysis was then performed using commercially available statistical analysis tools. Theoretically speaking, the researcher 'did not exist', but allowed the respondents to act independently. In the qualitative process, the researcher was obliged to assume a different role, namely that of a human instrument. This included face-to-face engagement with the respondents. During data collection, particularly in the in-depth interviews, the researcher developed closer and more supportive relationships with the participants. All the above factors point to the risk of a subjective interpretation of the data, with associated potential for bias. However, triangulating the research methods addressed this issue, with the researcher integrating questionnaire and interview data to validate the overall results. The researcher also attempted to strengthen the thesis by cross-referencing information, in order to increase the credibility and validity of the data.

7.1.1.1. Avoiding Insider Bias

As an insider in the community or culture where the research was carried out it was easy to build relationships with the participants (Mercer, 2007). The researcher was aware of the researcher bias resulting from this involvement, for instance that of being biased, or overly sympathetic to the culture. However, the researcher did not want the insiders' personal beliefs, experiences, and values to influence the research and its results. Therefore the researcher tried to create distance from the research participants (Greene, 2014). Care

was taken to describe the perspectives of the teachers as reported and not as perceived by the researcher.

7.2 Summary of the Findings

7.2.1 Findings from the Quantitative Phase of the Study

The questionnaire data were quantitatively analysed using SPSS software. This was carried out in two phases: descriptive analysis, factor analysis and principal component analysis.

To establish the teachers' understanding of pupils with SpLD, factor analysis and PCA were used to extract two factors from 10 components, constituting Section 2 of the questionnaire. These factors consisted of 'Awareness', or teachers' familiarity with the definition and characteristics of learners with SpLD (dyslexia), and 'Facts and myths', or unproven or false collective beliefs, used to identify and distinguish pupils with SpLD (dyslexia). The results show that although the teachers did not agree with the myths, they disagreed with the facts. For instance, there was a belief that pupils with dyslexia were unable to follow simple instructions.

With regard to the teachers' knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia), three factors were extracted from 14 components, constituting Section 3 of the questionnaire. These factors were 'Fear', which included six components related to the teachers' knowledge of the negative self-concept or negative self-esteem of pupils with SpLD; 'Failure', referring to the teachers' knowledge of the failure experienced by the learners as a result of low self-esteem and poor self-concept, and 'Solutions', which were the teachers' strategies for helping their pupils overcome their difficulties through early interventions. The above three factors are interrelated and illustrate that the teachers had a good understanding of their pupils' problems and wanted to motivate them to change by offering incentives and providing early intervention, so that the learners could practice healthier new behaviours.

The teachers' understanding of educational issues related to early intervention, EFA and FCA, yielded three factors: 'Inadequacy', 'Consciousness' and 'Concern for support'. 'Inadequacy' refers to the teachers' knowledge of basic issues (for instance the significance of early intervention and use of multi-sensory approaches), while at the same time lacking the skills to apply early intervention. On the other hand, 'Consciousness' refers to the teachers' awareness of critical issues related to early intervention; for instance, the significance of workshops, the detrimental effects of delayed intervention, and the lack of

resources. Meanwhile, 'Concern for support' refers to the need for more individualised interventions, to be provided outside the classroom.

When comparing the responses from the four groups (Sections SC2, SC3, SC4 and SC5 of the questionnaire), it is apparent that most of the teachers understood the typical components of early intervention and the issues that are significant for the effective implementation of early intervention programmes. They seemed to recognise that their knowledge of SpLD (dyslexia) and early intervention affected their pupils' learning experience in class.

The teachers' understanding of the obstacles and barriers preventing the implementation of early intervention, EFA and FCA, resulted in the extraction of four factors, namely 'Environment', 'Awareness', 'Dilemma', and 'Poor sense of accountability'. 'Environment', such as packed classrooms, increased workload, the lack of educational aid, financial constraints, poor guidelines, and parental non-involvement, led to 'Awareness' in the form of unprepared teachers and a lack of awareness of early intervention. Teachers are then faced with the 'Dilemma' of not having the time to apply early intervention, due to the length of the curriculum and lessons. The fourth factor points to 'Poor sense of accountability' on the part of policy-makers and supervisors, whose objectives do not match the needs of children with SpLD (dyslexia).

Generally speaking, there was some degree of variability in participants' responses to certain questions on teachers' understanding of pupils with SpLD. The findings indicate that the characteristics of dyslexia may have been confused with those of other learning difficulties and that additional information might be needed for teachers to fully understand the concept.

Although most of the teachers surveyed appeared to be positive about the general construct of dyslexia, the data indicate some uncertainty about the actual nature of dyslexia and the importance of early intervention. The consensus gathered from the data was that the teachers required specific training and further education to be able to address the problem. The vast majority of the participants (n=438) in the present study 'Strongly agreed' with the above. This serves to illustrate how educators feel they have insufficient knowledge, which is potentially a disservice to learners with dyslexia in the classroom.

The teachers' responses regarding their knowledge of the self-concept of pupils with SpLD (dyslexia) indicate some confusion over the nature of the learning difficulties associated with dyslexia. The responses also varied as to whether the teachers possessed the required

skills to apply early intervention programmes. There was no full agreement among the teachers in their responses to this point and again, this would perhaps indicate some failure to understand the condition. On the other hand, it may simply be due to the fact that not all children with SpLD (dyslexia) have problems with social competence and self-esteem. On the other hand, the teachers' responses do seem to emphasise the importance of developing effective communication between pupils with dyslexia and their parents, teachers and peers. This would facilitate the adjustment of these pupils to their environment. Effective mediation could be introduced by endeavouring to build a sense of self-worth and increase confidence in pupils with dyslexia, so that the problem is addressed at an early enough stage in life. If this is not achieved, there is evidence from the research that these difficulties may develop and continue into adulthood.

The majority of individuals studied considered that overall, teachers are not sufficiently aware of early interventions and are not being prepared through training courses. To sum up, there would appear to be certain obstacles and barriers to the implementation of early interventions in primary schools in Kuwait. The majority of the participants did believe that teachers were not sufficiently aware of early intervention and would require additional training to run intervention programmes of benefit to children.

7.2.2 Findings from the Qualitative Phase of the Study

The interviews and focus groups were carried out with Arabic language teachers and supervisors. The interview data were then qualitatively analysed for themes. The initial themes that emerged from the Arabic language teachers' interview transcripts comprised preparing and empowering teachers; the optimal timing of training; the delivery of feasible and acceptable intervention sessions (rather than long, cumbersome lessons and class sessions); intensifying the delivery of intervention (the need for more time and intensive short lessons); competing interests and commitments (added responsibilities); traditional teaching approaches and an obsolete curriculum; eclectic approaches (wide-ranging teaching approaches); parental responsibility and commitment (the need to increase parental awareness and cooperation); a monetary bottleneck (financial constraints); obsolete and outmoded programmes (current educational preparation programmes); multiple demands on teachers' time (workload); the absence of student-centred policies; teachers feeling threatened (a lack of freedom and poor support); the expansion of teachers' roles (multiple roles); strengthening teachers' specific competencies (prioritising

professional development for teachers), and elevating the teacher's voice in shaping special education policies and facilitating early intervention.

The initial themes that emerged from the Arabic language supervisors' interview transcripts consisted of improper identification and remediation (inappropriate diagnostic approaches); early start (for early intervention); a lack of specialist remedial teaching (a lack of specialist support); the absence of reciprocal knowledge exchange (interaction and knowledge-sharing with teachers); the 'blame game' (accusing teachers); a lack of government dedication and interest (a lack of adequate funding); the need for active collaboration (within schools); the absence of innovative approaches (for example, multi-sensory approaches); mandated attendance (for workshops); 'ineffectual' guidelines; 'theory-based approaches' or impractical teaching approaches (applying training programmes that are purely concerned with the theoretical aspects of early intervention); 'a lack of interaction' with external organisations; the level of teachers' professional awareness and support; parents' negative perspectives, and the demand for policy-makers to be increasingly responsive to the needs of pupils by shifting priorities.

The initial themes that emerged from a thematic analysis of the teachers' focus group interview transcripts included empowering teachers (through training); strengthening teachers' self-efficacy (motivating and enhancing teachers' performance); being hindered and burdened by issues of time (less focus on early intervention); competing interests and commitments (additional responsibilities); the crisis of redesigning the curriculum (the inadequacy of the Arabic language curriculum); constraints (resource constraints); unyielding parents (parental non-involvement); policy-makers being increasingly responsive to the needs of pupils (provision of more financial resources); frustrated teachers (a lack of preparation or training); the expansion of teachers' roles (multiple roles); the balance between work pressure, stress, supervisors' attitudes and self-doubt (increased workload); the absence of student-centred policies; frustration with parents (a lack of parental awareness), and the need for 'innovative practices'.

The initial themes that emerged from a thematic analysis of the supervisors' focus group interview transcripts comprised improper identification and remediation (inappropriate diagnostic approaches); timely remediation (early start); a lack of specialist remedial teaching (a shortage of intervention specialists); the absence of reciprocal knowledge exchange (a lack of expertise and experience); the lack of dedication and interest on the part of the government (a lack of financial support); the need for active collaboration (within schools); the absence of professional development activities (a lack of training and

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development opportunities); 'ineffectual' guidelines; a lack of practicality (impractical teaching programmes); the lack of interaction (a failure to seek expertise from external organisations); a lack of direction (a lack of interest amongst supervisors and frequent changes in curriculum); negative perspectives (poor societal awareness); the demand for policy-makers to be ever more responsive to the needs of pupils (modifying the existing curriculum), and a shift in priorities (identifying areas of change).

The initial themes from the teachers' interviews and focus groups were merged and the final themes developed consisted of preparing and empowering teachers; strengthening teachers' self-efficacy; competing interests and commitments; the crisis of redesigning the curriculum; unyielding parents; more responsiveness to pupils' needs, and innovative practices.

The initial themes from the supervisors' interviews and focus groups were merged and the final themes developed consisted of early identification and timely intervention; conventional remediation; the need for collaboration, co-production and reciprocal relationships; the need for innovative strategies and approaches; the significance of external support; the need to build professional expertise; social stigma, and disempowering children with dyslexia.

7.2.3 Summary of the Key Findings

One of the significant findings to emerge from this thesis is that primary school teachers in Kuwait do indeed have some awareness of dyslexia. The present study findings would indicate that the teachers were aware of early interventions needing to begin at around the age of four, given children's abilities and awareness at this age (Zucker, 2010). This would indicate that, if children with dyslexia are not identified early enough, they may face learning difficulties in school, with unintended consequences for individuals and society and so there needs to be clarity with regard to the detection of dyslexia.

The respondents do not currently seem to have sufficient experience, skills or knowledge to teach pupils by understanding their needs or preferences for auditory, visual and/or tactile learning. Such knowledge is essential for identifying whether a pupil is deficient in any of these approaches. A thorough knowledge of a student's individual learning needs can enable supervisors to assist teachers in selecting the appropriate approach. Supervisors will then be in a better position to adopt either a whole language approach, phonetic or multi-sensory language approaches to reading, as they will have identified the pupil's

strengths and weaknesses. Research (for example, Hazoury et al., 2009) shows that Arabic versions of multi-sensory approaches which were adapted from models developed in the West, have helped create audio-visual associations in learning through kinaesthetic activities, thus establishing left-to right progression and encouraging word retrieval from long-term memory. More feedback was also provided for teachers. The results also show that teachers and supervisors lack professional skills in teaching pupils how to acquire reading and writing competences. The teachers surveyed had limited general knowledge of SpLD (dyslexia) and this could be explained by their lack of training in this area. They had never received such training and so were prone to conceptualising dyslexia in behavioural terms, rather than taking into account the underlying difficulties. It could also mean that these teachers were insufficiently informed to plan an appropriate dyslexia assessment for learners. In any case, training programmes and access to the latest information may be of little use if teachers do not have enough time to practise their skills in class.

Yet another finding was that there was a lack of collaboration between teachers and supervisors. The results illustrate how reciprocal relationships can be built if the two parties collaborate and are committed to each other. If all stakeholders work in collaboration, they can exchange valuable ideas through the sharing of resources and teaching strategies.

Empowering teachers to cater to the needs of pupils with SpLD (dyslexia) should begin with awareness and training. The awareness has to start at the level of national policy. Training and professional development are required to increase teachers' confidence and competence, in order to help them demonstrate their expertise (Richards & Farrell, 2005) and improve their expectations of children with dyslexia. Training programmes would help educate teachers and make them realise that smaller classes would surely result in giving more attention to learners, rather than separating children, in order to provide them with individualised interventions. In other words, training and professional development empower teachers to play an active role in the development of pupils with dyslexia.

Another finding was that the teachers appeared to lack self-efficacy. Those teachers who possess a higher degree of self-efficacy are generally found to be receptive to innovative approaches as a means of meeting their pupils' needs (Gwernan-Jones & Burden, 2010). Therefore, empowered teachers with improved self-efficacy may be able to identify, diagnose and support children with dyslexia to learn, using appropriate interventions.

In addition, the study findings highlight some contrasts in the conceptualisation of dyslexia between teachers in Kuwait and their counterparts in the West, who are endeavouring to manage dyslexia and consequently provide support. As a result, a number of issues surrounding the topic of dyslexia come into sharp focus. The discrepancy model of dyslexia, which claims there is a difference between obvious ability and the unexpectedly poor academic performance of the learner, and the medical model, which holds that the problem is located within the child, would appear to prevail in Kuwait. This was also apparent in the responses from teachers who reported that children with SpLD are segregated. Moreover, it is quite contrary to the approaches adopted in the UK and other countries in the West, where the focus is on changing practice to accommodate children with dyslexia, teaching them about the nature of their difficulty where appropriate, including areas of strength and preferred learning styles. The findings here would therefore indicate that the medical model and the discrepancy model remain a valid basis for allocating special educational services for learners with SpLD (dyslexia). It may thus be deduced that Kuwait's schools and policy-makers are using the medical and the discrepancy models as criteria for identifying children with dyslexia. In other words, institutions have hindered most children with dyslexia/SpLD from accessing mainstream education, due to their difficulties in phonological processing, spelling, grammar, reading and writing (Snowling, 2000; Hulme & Snowling, 2009). In order to provide early interventions, schools need to determine the nature of SpLD and refrain from using the 'dyslexia' label (Elliott & Grigorenko, 2014). The credence given to the medical and discrepancy models should therefore be challenged, in order to ensure that any children experiencing difficulties have access to appropriate support. This study reinforces the need for additional education and awareness-raising amongst teachers who work with pupils with dyslexia. The inference is that school administrators should be proactive in sourcing and providing the adequate means and information for early intervention and training. This will help better prepare teachers to educate pupils with dyslexia and undertake appropriate interventions. The present study also intends to raise awareness and minimise misperceptions among teachers and policy-makers.

Moreover, the results show that there is a lack of support from policy-makers. Teachers consequently feel that children are at risk of being discriminated against. Although the Ministry of Education has made attempts to support pupils coping with SpLD (dyslexia), policy-makers have failed to effectively put policy into practice. The teachers were not associated with the curriculum design mandated by the Ministry of Education, which made all the decisions and controlled education through a process of centralisation. However,

the teachers wanted their roles to be recognised and their beliefs to be respected. They were of the opinion that there was a gap between themselves and those supervising them and they were concerned about the Ministry of Education and how the policy-makers imposed their policies and intervention strategies, without engaging them or engaging in mutual discussion with them. There was the sense that centralisation was not only debilitating to teachers' confidence, but also damaging to their professional autonomy, sense of personal fulfilment and sense of ownership of their work.

Furthermore, the results indicate that parental involvement with the student and school, and cooperation with teachers is vital for effectively applying early intervention. The findings would suggest otherwise, as parents do not always want to discuss issues associated with their children. On the other hand, while supervisors seem to consider parents to be the issue, they appear to avoid blaming the cultural institutions that play a key role in legitimising stigma. This defective cultural model attributes children's learning difficulties to characteristics which are often rooted in local culture and communities. This means that pupils with SpLD (dyslexia) become the victims of institutional oppression, as society can negatively stereotype children with dyslexia. It is consequently a perspective that overlooks the root causes of oppression by localising the issue within the children themselves. By viewing SpLD from this flawed perspective, parents and society at large are unable to differentiate between the pupil's strengths and disabilities, although the label has its uses, i.e. with access to provision of early intervention. In order to educate parents and encourage them to have a more positive view of dyslexia, supervisors will need to consistently stress that children with dyslexia are not merely different from non-dyslexics, but some of them are also superior in some ways, for example they perform better in pictorial (nonverbal) memory, auditory and visual memory tasks, and that there were creative (Tafti et al., 2009). Considering the stigma attached to labels associated with learning difficulties, the promotion of positive attitudes could help both supervisors and teachers to deal more constructively with parents. However, eliminating negative attitudes or changing the mind-set of parents in Arab states is a complex process, for example due to the social stigma that is associated with dyslexia. Supervisors may need to encourage and instruct in effective parenting for children with dyslexia. As teachers may be in daily contact with such children and represent the first line of communication with parents, it is essential for parents to engage with them in trying to improve children's reading and learning. However, teachers may also have to take the initiative to form parent-teacher partnerships.

7.2.4 Conclusion

Overall, the findings from this study make a significant contribution to the current literature in this field. It is one of the very few studies from Kuwait on teachers' knowledge concerning early intervention for dyslexia. The data gained through different methods were integrated and a comparison of the results showed that they complement each other.

In conclusion, despite the fact teachers in Kuwait would appear to have some dyslexia awareness and recognise the need for early intervention, the current study found that they lacked a clear understanding of the relationship between an individual learner's profile, the task involved and the environment. Most pupils with dyslexia referred to here had already received some form of support, but the quality of the teaching was questionable. It is essential that dyslexia practitioners receive the right training and gain appropriate experience to conduct detailed and meticulous individual assessment. This will ensure the child's needs are successfully met. For example, teachers of pupils with dyslexia should be able to identify the signs of a phonological processing problem in a learner.

Moreover, in Kuwait, the curriculum has not been adapted to provide opportunities for developing reading and writing strategies. Although there is an emphasis on speech and language acquisition in the curriculum, the current findings imply the curriculum is obsolete and schools do not in fact prioritise language development in terms of phonological awareness. The issue is that insufficient attention has been given to a curriculum design that promotes student-centred and early phonological and phonemic awareness. This could be the reason why the teachers surveyed were concerned about the lack of student-centred approaches to curriculum design.

The Ministry of Education, which controls every aspect of education in Kuwait, does not appear to have radically overhauled educational support for pupils with dyslexia. The emphasis has instead been on a centralised decision-making process and centrally mandated curriculum, rather than children's learning difficulties. Moreover, the teachers have not been assured that they will be provided with training opportunities, for instance in phonic-related skills and multi-sensory approaches. For children with dyslexia to become fluent in their reading, teachers need to be trained in the creation and appropriate assignment of a variety of different tasks. For example, they need to be able to understand fluency-based measures, allocate texts for reading instruction according to the right content and level, encourage pupils' independent reading, and offer systematic fluency interventions for those who need them. Assistive technology (for example, text-to-speech

software) can be used with children in extreme cases of dyslexia and teachers should be trained in the effective use of such technology.

Besides a lack of resources, both financial and learning-related, there has also been lack of proper guidelines. The researcher argues that it is the responsibility of the policy-makers to provide these guidelines through the publication and distribution of handbooks. By making such handbooks available, teachers and supervisors may come to understand procedures for assessing pupils with regard to dyslexia and how pupils with SpLD learn best. However, supervisors need to be cautious, as handbooks alone cannot enhance professional development and should only be used as a supplement to training programmes. In short, they would enable teachers and supervisors to gain more understanding of this potentially challenging area, while at the same time boosting confidence amongst both teachers and pupils.

Supervisors, who are responsible for monitoring and supporting teachers, were described as being unable to implement early intervention, but on the other hand, they did not consult external agencies for guidance. Moreover, these supervisors had not been prepared in sufficient depth to prevent reading problems, or to identify early signs of risk. Neither could they successfully teach pupils with dyslexia or related learning disabilities. In short, they did not seem to understand the importance of discussing their issues with external consultants, who would have been able to help resolve complex problems.

Although Kuwait has some special schools for dyslexic learners, the conditions are very different from those of Western nations, where pupils are taught in mainstream education, with higher levels of individual support so they can improve their basic underlying skills, such as in processing sounds and sequencing (McPhillips & Shelvin, 2009; Everatt & Reid, 2012). These special schools in Kuwait are intended to provide support for children with SpLD (dyslexia), but lack skills improvement programmes, appropriate resources and materials, technology to assist reading and writing, activities to enhance motivation and build confidence, and other early intervention programmes. Moreover, there is a stigma of disabilities in Kuwait which is extended to special education schools.

Aside from the above, parental involvement would seem to be a consistent problem and the teachers in the present study expressed some concern that unyielding family members could have a detrimental effect on children with SpLD, thus impairing or obstructing early intervention. Furthermore, teachers need to realise that the goal of parent involvement is not simply for the sake of involving the parents, but rather to form a link between important

contexts for reinforcing children's learning and development. Therefore, the findings prove that parent-teacher partnerships are essential for applying early intervention.

7.3 Limitations

In terms of limitations, the present author acknowledges the fact that although the study findings bear witness to variable attitudes towards and inconsistent knowledge of dyslexia, the sample tested were composed of teachers in Kuwait. As a result, caution must be exercised when attempting to generalise the present findings to other populations.

Secondly, this study has mixed methods at the point of implementation, sampling and analysis. However, conclusions are best drawn from mixing methods at the point of interpretation, because if methods are mixed at the point of analysis, the results may differ.

Thirdly, this study did not seek the perspectives of children or parents as that was not the intention. However, the views of parents or learners may have been different.

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Fourthly, this study did not seek the perspectives of children or parents as that was not the intention. However, the views of parents or students may have been different.

Finally, this study did not explore all the myths surrounding dyslexia and so it could have been useful to look at traditional beliefs on this topic, in terms of its occurrence, diagnosis, aetiology (causes or origin of the learning difficulty), treatment and so forth. Future research should therefore attempt to replicate this study, in order to clarify whether such dimensions are related, or whether the present results are in any way attributable to limitations of methodology. Revision of the questionnaire may also be warranted, with some items being added or removed.

7.4 Recommendations

The present study offers a unique snapshot of the progress made by educators and policy-makers in providing early intervention programmes for pupils with SpLD (dyslexia) within Kuwaiti primary schools. The findings are used to inform a broad range of recommendations for schools, teachers and parents, who could collaborate to ensure that all pupils with dyslexia receive the support they need.

7.4.1 Recommendations for Schools

Even though they may rather blame the policy-makers, it is the schools themselves which have failed to take initiatives towards implementing early reading intervention programmes. Their first step must therefore be to identify at-risk children and take preventive measures to reduce the incidence or severity of SpLD (dyslexia). The schools in the current study did not provide any training in this area and although the teachers were aware of dyslexia to some extent, they were not in a position to identify these children at an early stage. As a result, the children's early reading difficulties went unnoticed and their need for intervention was not met.

To be able to benefit to the maximum from intervention, schools are recommended to take much earlier steps than usual to identify pupils with SpLD (Schwartz, 2005). Based on the present study findings, schools must consider early diagnosis and intervention, along with general classroom accommodation and specialist one-to-one teaching in literacy. In addition, they need to look at building pupils' self-esteem and adjust literacy teaching in the classroom. In this regard, they could develop strategies to improve children's memory and retention, as well as some aspects related to learning in general, such as metacognition and learning styles.

a) Early Diagnosis

While there are many different definitions and theories on the underlying causes of dyslexia, there is the consensus that early intervention is optimal (Fletcher, 2009; Snowling & Hulme, 2012; Duff et al., 2014). Reading interventions at an early stage can result in greater gains in terms of reading accuracy and fluency. To this effect, an intervention should be implemented before children start in grade one at the age of 5-6 years. Screening procedures therefore need to be in place. The teachers interviewed in this study nevertheless admitted they had no experience in administering tests; for example psychometric tests or cognitive tests, such as the Dyslexia Screening Test or Phonological Abilities Tests. It would therefore be highly beneficial for teachers to receive training on administering these as a way of identifying young children who are in danger of developing dyslexia.

b) Accommodation

The interviews and surveys failed to reveal how accommodation or modifications are introduced into teaching programmes and routines. Characteristics of the physical learning environment should in themselves contribute to learning success as schools need to accommodate their various learners. This accommodation can in fact make a big difference to school life for children with dyslexia, without overburdening the teachers (Smallridge, 2009). General accommodation could involve seating pupils with SpLD (dyslexia) as near to the front of the class as possible and next to a supportive peer. Teachers will especially need to take time to get to know such pupils and ask them about any aspects of a lesson they may have found difficult or stressful. Schools consequently need to encourage teachers to make such changes.

c) Specialist One-to-one Teaching in Literacy

As stated above, the teachers interviewed for this study declared they did not have any specialist qualifications or training in dyslexia assessment and intervention. Therefore, the quality of the learning and teaching was not as high as it should have been in this regard. Schools need specialists to build knowledge and expertise in specific areas, with opportunities for pupils on a one-to-one basis, or at least in small groups, as appropriate.

Moreover, schools should seek assistance from qualified experts. What is required is systematic one-to-one teaching that can target the specific needs of the pupil. Furthermore, it needs to go at a pace which will allow the child to learn, using multi-sensory teaching methods, designed with a thorough understanding of memory enhancement and an awareness of cognitive weaknesses which may lie beneath the dyslexia.

d) Building Self-esteem

Children who fail to successfully acquire literacy skills early enough in their schooling are likely to suffer as a result of their poor reading skills in later years (Francis et al., 2005). It is also argued that compounding this problem will be reduced motivation and low self-esteem (Torgesen, 2004), arising from failure at school. It is typical of pupils with very poor self-esteem to avoid taking risks and so this could also prevent them from achieving their potential. The more failure a pupil experiences, the greater the likelihood they will lose interest in learning and school in general. Therefore, with a view to enhancing learning, current assessment practices need to be reviewed, giving high priority to self-

esteem, engagement and motivation. For example, when spelling is marked, the test or task should exclusively consist of words the pupil has already been taught spellings for. Moreover, pupils should be allowed to choose their preferred learning medium, whether this is speech, essays, comic strips, animated films, slide shows, diagrams, etc. and if possible, the tests should not be strictly timed. These are all suggestions for early intervention to help pupils with SpLD (dyslexia) receive support before reading problems become severe or develop into more complicated self-concept issues.

e) Improving Classroom Literacy

The teachers interviewed for this study did not use terms such as phonological awareness or phonemic awareness. It is not even certain whether they were aware of them. Nevertheless, it is vital for primary schools to establish a proven, systematic phonics teaching programme, with teachers trained to run it; primarily concerned with letter patterns and sound analysis. Within such a framework, each pupil could be given a list of around 10 words to learn every week (Smallridge, 2009) and time should be devoted to spelling, phonics and letter patterns every day in class. In addition, a range of multi-sensory experiences should be used to enhance memory and engagement in learning. Besides the above, computer software designed for pupils with SLpD (dyslexia) would enable spelling words to be conveniently consolidated. For maximum benefit, a synchronised whole-school approach could be adopted to raise phonological awareness and phonics in relation to spelling.

Research in fact shows that phonological awareness and letter sound training have long-term effects (Elbro & Petersen, 2004; Hindson et al., 2005; Moore et al., 2005; van Otterloo et al., 2009; Snowling & Hulme, 2011; van der Leij, 2013). This is also the case in children from the UAE whose performance was evaluated on Phonological awareness tasks in Arabic language (Tibi, 2010). Phonological awareness training actually enables pupils with SpLD (dyslexia) to acquire reading and writing skills (Torgesen, 2005). All this points to phonological awareness being a prerequisite for reading development, with educators needing to clearly understand why phonological processing difficulties persist in pupils with dyslexia, exerting an ongoing impact on their reading and spelling development (Seabrook, 2008). What is more, this should be made a priority in basic teacher training, as well as in continued professional development. More emphasis is required on the regular assessment of children's phonological language skills.

It must be borne in mind that reading is a skill that crosses the entire curriculum and even pertains to maths. It is therefore essential that pupils with dyslexia have every chance to develop their confidence and skill in reading. They will almost certainly benefit from one-to-one reading with a peer or teacher and should be asked to read aloud in one-to-one situations, because this stimulates all the senses, whereby errors and omissions can be checked. The researcher in this study also suggests that one-to-one reading with pupils with dyslexia may be extended to group reading exercises.

f) Supporting Teachers' Competencies

The interview responses recommend that if early interventions are to be successfully applied in schools, there should be frameworks in place that support teachers' competence. However, a framework of teachers' competences is not the solution, because it will not provide a means for teachers to organise and develop their own professional competence, as mentioned earlier. Children with SpLD (dyslexia), who need special attention outside the mainstream classroom, will only be able to develop if teachers are competent and can deliver effective early interventions. It is important to ensure that initially, during ordinary teacher training, student teachers experience several sufficiently long periods of teaching practice in a variety of schools. This would ensure that they do not enter their profession as complete beginners, as they will have developed some classroom competencies by the time they enter the real workplace (Schleicher, 2015). Moreover, any competencies involved in classroom teaching practice will need to be innovative to reduce the effect of any learning difficulties encountered, thus helping the respective learners to overcome and manage the worst of their symptoms. In order to strengthen the specific competencies of teachers, they will need training to emphasise the study of reading development and an understanding of what it is to learn differently. In addition, teachers can greatly benefit from supervised practice opportunities. This will go some way towards ensuring their success in the classroom, especially if they are responsible for pupils with SpLD (dyslexia) or other reading difficulties.

g) Metacognition and Learning Styles

In addressing the needs of children with dyslexia, general aspects of learning should also be considered, such as meta-cognition and diverse needs of learners. Teachers will therefore need to work on improving pupils' meta-memory, using a range of memory-

enhancing strategies, while also explaining how and when these can be used for best effect (Smallridge, 2008).

7.4.2 Recommendations for Teachers

Studies have found that many teachers are inadequately prepared for the identification of pupils with SpLD (dyslexia), as there are no phonological awareness programmes (Tibi, 2005; Handler & Fierson, 2011; Aladwani & Al Shaye, 2012). The findings of such studies suggest that greater awareness and enhanced professional development could help teachers develop early remediation programmes, with timely intervention greatly reducing the number of pupils meeting diagnostic criteria for dyslexia.

To compensate for a loss of self-esteem connected with literacy problems, teachers are recommended to encourage learners with dyslexia to develop other strengths. This could refer to a sport, hobby or other school subject. By developing their strengths, teachers can help improve self-esteem in pupils with SpLD (dyslexia) (Shaywitz, 2003).

Teachers also need to provide training in social skills and this could entail providing special lessons for children who, for example, need to learn and practice good manners and develop a more polite and respectful approach to others. This could also include encouraging acceptable classroom behaviour, as well as ways of dealing with anger, frustration or conflict in a civilised way. Formal training in social skills will highlight the skills that a child currently lacks and needs help with. Small group sessions outside the classroom could be allocated to specifically address these areas, with constant monitoring of behaviour, even when pupils are once more in their usual classes. Success can then be rewarded. All these approaches could prove useful for learners struggling to cope with social situations.

7.4.3 Recommendations for Teacher-training

In order to identify the early warning signs of an SpLD, classroom teachers require appropriate training so they can respond effectively and provide early intervention. The UNDP-Kuwait project (UNDP, 2012) has raised concerns about the lack of teacher preparation programmes, which makes it difficult for educators to identify or teach pupils with learning difficulties, or how to take preventive measures for early intervention.

Providing training for teachers in the detection of dyslexic learning patterns and the provision of effective early intervention is a cost-effective means of addressing dyslexia.

Conversely, teachers who possess such skills and qualifications will be prone to frustration and disappointment if their classes are too large, or if there are obstacles to them appropriately supporting learners, as in a shortage of time. There is no doubt that some teachers are highly intuitive in any case, but this does not mean they do not need to learn and maintain adequate skills and knowledge to respond to individual needs. Such continuing professional development is actually a specification of each stage of the process. Improvement in literacy should be emphasised, with special attention being given to the disadvantaged learner. The most effective way to achieve this is to invest in professional development for teachers.

The conceptualisation of dyslexia takes place on biological, cognitive and behavioural levels. It is now known that the problems experienced by children with dyslexia are far more extensive than reading difficulties, with cultural and environmental factors interacting on all three of the levels indicated above. Teachers therefore need to be proactive in the learning experiences and environments they provide, so that all types of learner can be included.

Teacher training programmes should include sound blending, sound segmenting, reading and spelling activities. Research reveals that the effects of phonemic awareness instruction are enhanced when combined with reading instruction and spelling activities. Teacher training in phonological awareness helps develop reading and spelling skills (Gillon et al., 2004), which implies that training and professional development are crucial for identifying SpLD at an early stage in a child's life.

7.4.4 Building Teachers' Self-efficacy or Effectiveness

The interview findings show that the teachers' sense of self-efficacy or their belief in their own teaching ability, and capacity to engage their pupils and manage a classroom will all impact on their practice, enthusiasm, commitment, job satisfaction and classroom behaviour. A high level of self-efficacy amongst teachers is also linked with student motivation and other positive teacher-learner behaviour. Conversely, lower levels of self-efficacy are associated with increased stress and classroom management issues (Schleicher, 2015). Policy-makers and the schools themselves should therefore support and develop appraisal and feedback systems for teachers, with a view to improving teaching quality. Collaborative practices, which could include peer observation amongst teachers and consequent feedback, or team-teaching in the same class, have a place in schools and should be considered. These activities yield several benefits, such as a form of professional

development for teachers, whereby they receive feedback on their real performance at work. As a further example, schedules could be rendered more flexible by school leaders, to allow for activities such as team-teaching.

7.4.5 Bridging the Gap between Research and Classroom Practice

Evidence from the research continues to challenge existing concepts of dyslexia. One step towards progress could take the form of a shared framework. This would represent a means of bridging the gap between research and classroom practice. The causal modelling framework (Frith, 1997) states that any root causes or difficulties linked with dyslexia primarily lie within the child. However, it can be seen from the current research that great importance is increasingly attached to the environment and its effect on children with dyslexia (Poole, 2003). Even where a learner has difficulties with cognitive processing, the environment can compensate for these and become protective of the child. Environmental effects and the way in which they interact at each level of understanding must therefore be taken into account. A theoretical framework would provide a model around which teachers could develop professionally.

Teachers need the tools for critically evaluating new methodologies, programmes and resources and so these should be provided. Moreover, teachers require a thorough understanding of a conceptual framework, within which they can assimilate evidence from research conducted by the academic community. They would then have the means to question implications for classroom practice in relation to learners with SpLD (dyslexia). Dyslexia can in fact be a major impediment to a child accessing the full curriculum at school. A combination of good teaching and timely intervention, well founded on a clear and informed conceptualisation of dyslexia amongst teachers, will greatly contribute to all children reaching their potential, despite the essential role of literacy in the modern world (Bell et al., 2011, p.189).

7.4.6 Curriculum-related Recommendations

Dyslexia is still not widely known in the Arab world and there is an increasing rate of children with dyslexia in Arab countries who find it difficult to pronounce Arabic letters (Taileb, 2013). Phonological processing skills are claimed to be the key to literacy development (especially reading and spelling) amongst Arab children with dyslexia (Elbeheri et al. 2006; Elbeheri & Everatt, 2007). The results of the studies mentioned above show that it is phonological awareness, rather than other verbal processing skills,

for example, rapid naming and phonological memory, which most strongly influences early Arabic literacy skills. However, the reason why learners find it difficult to process language in Arabic is due to its complex orthography (Abu Rabia et al., 2003; Mahfoudhi et al., 2011). However, in spite of the problems that children face, dyslexia is neither recognised as an SpLD, nor are there any intervention methods specifically used for children with SpLD to help them learn to read and write in Arabic, except in the UAE (Mahfoudhi et al., 2009). Moreover, Arab curricula are not aligned with the needs of these children in mainstream schools, except in Jordan (Mahfoudhi et al., 2009). This would suggest that curriculum-based measures are required to monitor student performance and assessment needs to be linked to the respective intervention, by evaluating the student against the requirements of the classroom or school concerned. For example, if the goal in a lesson is to spell specific words, these measures can be used to assess a pupil's performance in this area. Measures based on the curriculum itself, in a direct and continuous assessment of basic skills, represent a particular type of standardised assessment, enabling the teacher to evaluate a pupil's progress in attaining long-term goals.

Early, evidence-based interventions for pupils at risk will encourage schools to revise their curricula by integrating oral language, reading and writing skills (Bell et al., 2011). However, the interview findings in this thesis imply that the curriculum for pupils with SpLD (dyslexia) in primary schools in Kuwait is obsolete and fails to meet the needs of this type of learner. The literature reviewed for this research also indicates that there is a lack of technical assistance to develop curriculum materials in Arabic for the intervention of SpLD (UNDP, 2012). Nevertheless, curriculum content and the needs of children with dyslexia must correspond (for example, in terms of reading, writing and spelling).

A combination of phonological and phoneme awareness, as well as reading and writing activities are to be considered for inclusion in a curriculum for pupils with SpLD (dyslexia) (Hatcher et al., 2006a, 2006b). There are variants of phoneme awareness and systematic phonics and as none are better than any of the others, they can be combined or embedded within a broader literacy curriculum, in order to yield optimal outcomes. The literature claims that systematic phonics instruction can form part of a curriculum, which is the case in the UK (Snowling & Hulme, 2012). The literacy skills of pupils with SpLD (dyslexia) can clearly be improved with heightened phoneme awareness and systematic phonics methods, providing these interventions are effectively integrated into the school curriculum.

7.4.7 Class Size and the Level of Intensity of the Interventions

The intensity of an academic intervention will correspond to the size of the respective class, as well as the frequency with which the intervention is applied (for example, two to five times per week). It will also relate to the duration of each session (for example, 30–60 minutes) and the overall length of the intervention period (namely the number of weeks or months over which it is provided). Other factors will also come into play, including the nature of the intervention, teachers' knowledge and experience and the way time is used in each session. Finally, the level of intensity necessary for an effective intervention will be dictated by the characteristics and needs of the pupils involved.

In general, pupils with SpLD (dyslexia) show progress when they receive enhanced, intensive and efficient instruction. This must however be complemented by extensive practice opportunities, with or without teacher support (Vaughn et al., 2003). The level of intensity required to accelerate such learning will also be affected by the nature and severity of pupils' learning difficulties.

It has been found that pupils with dyslexia tend to feel more at ease in small classes, because in larger classes they can feel overlooked. In smaller classes, however, differentiated teaching will help them develop their strengths and build self-esteem (Elias, 2014). Teachers should allow pupils time to talk to them and to their peers. This will make it easier for the teacher to assess the emotional state of the pupils before teaching and learning begin. A smaller class lends itself better to this, with individual attention being given to pupils. Here, realistic comparisons may be made by teachers between peers with dyslexia. Smaller classes also represent safer environments, where children can feel freer and more open, with less embarrassment about making mistakes in front of their peers or teacher (Casserly, 2013). In addition, smaller classes (for example, six or seven pupils to a class) permit one-to-one tutoring and multi-sensory teaching, thus providing scope for building self-esteem and motivation for learning (Tibi, 2010). The literature suggests that reducing class sizes can also help teachers (International Dyslexia Association, 2013; Elias, 2014). Under those conditions, early intervention would probably be more successful, but at the same time, pain and emotional distress on the part of learner would be avoided or minimised.

7.4.8 Recommendations for Kuwait University

Kuwait University does not offer any education or training programmes for teachers, but it does organise international conferences on issues related to societal development. These

issues have included the development of societal objectives, requirements and challenges from an educational perspective, emphasising the role of education in leading the change process and societal development to achieve progress and social welfare. The task of educating educators has also been given to Kuwait University, with more emphasis on professional development, essential for professionals working in the field.

To ensure that all pre-service teaching candidates have necessary knowledge and skills for teaching literacy to dyslexic and other at-risk readers, it is proposed that Kuwait University reviews its options for pre-service teacher education programmes. Teachers are not currently being prepared to an adequate extent and so those involved in both special and general education require training, based on converging scientific evidence of how children learn. They need to understand why some pupils experience difficulties and how to respond by identifying and implementing the most effective instructional approaches. In addition, all educators should share a common language defining these basic principles, with a common dedication to meeting the needs of the many and varied pupils who enter their classrooms. In order to achieve this, teachers must be able to distinguish high quality research, differentiating between research which is to be trusted and research which is weak or ill-informed.

The University also has a responsibility to encourage the use of alternative models of teacher preparation and ongoing professional development, although colleges of education in Kuwait are not anticipated to change their current practices for teacher preparation in the near future. Nevertheless, one thing is clear; teachers should have access to the key academic content, pedagogical principles and essential knowledge of learners' characteristics, in order to be able to deliver evidence-based, systematic and informed instruction to their pupils.

7.4.9 Recommendations for the College of Basic Education

The present thesis findings indicate that the professional development practices currently endorsed in schools in Kuwait are inadequate for preparing and supporting teachers and specialists. At all levels, the majority of practitioners remain largely unprepared to successfully address reading problems in any depth. Neither can they recognise early warning signs or teach pupils with SpLD (dyslexia) effectively. In any enquiry into the way teachers are prepared for literacy instruction, a pervasive absence of rich content and academic rigour will be evident and this, even on courses that lead to certification for teachers and specialists alike.

The College of Basic Education, responsible for teacher training, consequently needs to prioritise intensive, multi-sensory and systematic approaches to phonics instruction. These represent the core of dyslexia intervention. Teacher preparation should not only equip teachers to identify at-risk pupils at a very early stage (Rose, 2009a), but should also include techniques that have proved successful in specialist schools in the UK, EU and US. As a result, a new paradigm for literacy instruction would be established in Kuwait.

7.4.10 Recommendations for Policy-makers

The present research findings have given rise to several key recommendations that can inform and/or influence policy in Kuwait. These findings in fact suggest that appropriate policies for identifying pupils with SpLD (dyslexia) and the provision of suitable early intervention programmes should include the following:

The Ministry of Education, the policy-maker in this instance, may need to ensure that the rights of pupils with SpLD (dyslexia) are respected. There should be a regulatory board to monitor teachers and develop assessment tools. Another suggestion is to create a department to administer issues relating to SpLD (dyslexia). This would be staffed by professionals from relevant fields, including those with disabilities themselves, who could act as role models.

The Ministry of Education needs to enact laws to defend the rights of children with dyslexia and meet their needs. Furthermore, criteria are required to motivate teachers and improve their working conditions, especially those who deal with dyslexia sufferers. Part of this would entail adequate remuneration and incentives for teachers, with mechanisms in place to ensure proper teacher-pupil and pupil-classroom ratios. This would in turn have a positive impact on the quality of education. Finally, teachers may need to be evaluated to ensure that their skills are kept up to date.

In addition, policy-makers should examine their own definitions of SpLD and dyslexia, to ensure that these correspond to current knowledge and research. In other words, an evidence-based inclusive definition should be adopted.

What is therefore urgently required is early, intensive and empirically-based intervention for children with dyslexia in general education. In addition, it is clear that pupils who do not benefit from such interventions require more intensive remediation programmes to support their integration into mainstream schools, as they progress through their school lives. In principle, early identification of SpLD (dyslexia) amongst pupils with apparently

severe and intractable difficulties with reading or other academic areas will enable them to access more comprehensive and intensive help at an earlier learning stage and these measures can be better tailored.

Intensive individualised interventions and the measurement of student response to them should form part of the process of diagnosing SpLD (dyslexia). The Ministry of Education needs to discontinue its discrepancy approach to diagnosis and schools are advised to use multi-sensory approaches in their intervention models. Besides, school principals and teachers need to be aware that the use of discrepancy approaches is no longer advised, until additional research has been conducted.

7.5 Funding

Financial support and government responsiveness can contribute significantly to the empowerment of pupils with SpLD (dyslexia). During the interviews, the teachers and supervisors explained there was a lack of financial support and were concerned that the Ministry of Education was not adequately funding early intervention programmes. They were also of the opinion that there was bias in financial decisions, as more importance was attached to Down syndrome and slow learning.

The Ministry of Education needs to increase its budget allocation for teacher training and school equipment, whereby learners with SpLD (dyslexia) can receive specialised instruction. More funds should therefore be allocated to Kuwait University and the College of Basic Education for research into this area. Continued educational research funding would help in exploring the psychological processes involved and how such an understanding of them can help diagnose and address SpLD (dyslexia). Continued funding would also assist with examining the impact of responses to intervention models in the diagnosis and management of dyslexia and other SpLDs.

7.6. Recommendation of seeking parental views and children voice

Children and parents have to be given the opportunity to challenge their beliefs, attitudes and educational approaches as well as identifying barriers to participation and learning (Alborno & Gaad, 2014). Therefore, schools should carry out regular meetings for students with SplD/dyslexia and their parents, which ccould include parents' workshops and individual parent meetings. By organizing meetings, schools can cause parents not to shy away from voicing their concerns and demanding better services.

Schools should simplify the content of specialeducation policies and consult with parents on the content of the policy. The voice of children needs to be strengthened within the system and their progress will have to be routinely tracked and reported through report cards.

7.7 Research Outcomes

Owing to resource constraints, this study was conducted in just a few sampled schools in Kuwait. In order to gain more insight into the extent of the problem of SpLD (dyslexia) amongst affected learners in Kuwait, it is recommended that this study be replicated throughout the country, in order to give a general picture of the nature and prevalence of the issue in that context. A large-scale survey could be conducted with a view to exploring the teaching and learning of students with SpLD (dyslexia) in an inclusive set-up. A study could also be carried out on the perceptions of head teachers and class teachers with regard to learners struggling with SpLD (dyslexia). A comprehensive study would then ensue, highlighting the talents which such learners do possess, but which are not necessarily well represented in the school curriculum. For example, some learners with SpLD (dyslexia) demonstrate superior abilities in other areas, such as music, athletics, or art, which need to be nurtured.

In view of the outcomes of this study, it is recommended to replicate it in future research, or to conduct studies of a similar nature, considering personal contact with the study population as a means of improving the rate of response. If personal connections can be formed through, for example, a short presentation to staff invited to participate, this may increase the number of completed surveys returned. It is also recommended that future studies consider the differences between general and specialist education professionals. A final recommendation for further research could include a consideration of the parent's role, in terms of them providing assistance for their child. If the situation can be investigated from both the parents' and teachers' points of view, this will lead to a deeper understanding of both sides of the coin.

Appendix (A)

THE UNIVERSITY *of York*

Information Sheet

Research Title: Challenges facing the Implementation of early intervention for pupils with specific learning difficulties (Dyslexia) in primary schools in Kuwait.

Dear participant,

My name is Abdulaziz Alawadh and I am a PhD student at the University of York, UK. I am looking for primary school Arabic language teachers to take part in a project exploring the challenges facing the implementation of early intervention for pupils with specific learning difficulties (SpLD) (dyslexia). I would like to invite you to take part by completing a questionnaire and possibly participating in a subsequent interview. There are no criteria (e.g. gender, age, or health) for participating – everyone is welcome to take part as long as they are involved in teaching/training children with learning difficulties/dyslexia.

If you agree to participate, you will be asked to complete the attached questionnaire, which should take no more than 15 minutes. The questionnaire consists of five sections related to general information about yourself and your school, your understanding of pupils with SpLD (dyslexia), your knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia), educational issues related to early intervention, and the obstacles and barriers that prevent the implementation of early intervention in (primary school) education. You are free to complete only those parts of the questionnaire that you are comfortable with, without needing to give any reasons for not completing the whole questionnaire. You can also stop completing the questionnaire at any point. In addition, you will be asked if are happy to take part in an interview lasting approximately 30 minutes, exploring teachers' current perspectives of early intervention and SpLD (dyslexia),

as well as sharing your views on how to overcome the challenges facing the implementation of early intervention. You are free to either answer or refuse to answer any of the interview questions and you can stop the interview at any time. Please note, you do not have to take part in the interview in order to complete the questionnaire.

You do not have to disclose any personal information and the data collected will be anonymised. Your name will be replaced by a participant number and it will not be possible to identify you from the data gathered. All these data will be kept in a secure place, to which only the researcher and his academic supervisors will have access. These will be kept for 5 years and then destroyed. The results may be published in a journal or presented at a conference, without your identity being disclosed.

Please return the completed questionnaire in the envelope enclosed and if you agree to take part in the interview, please complete the form below and return it with the questionnaire. If you are selected for interview, you will be contacted to arrange a time and date.

Thank you for your consideration. If you have any questions please do not hesitate to contact me at:

The Department of Education, Derwent College, University of York, Heslington, York, YO10 5DD,

Email asaa508@york.ac.uk,

Telephone 00447831555161 (UK), or 0096599058095 (Kuwait).

Yours sincerely,

Mr. Abdulaziz Alawadh

Appendix (B)

THE UNIVERSITY *of York*

Department of Education

Dear participants:

Greetings,

I am conducting a study under the title: " Challenges *facing the implementation of early intervention for pupils with specific learning difficulties (Dyslexia) in primary schools in Kuwait"*. This study is part of the requirements for a Doctoral Degree at the University of York in the United Kingdom.

As part of the research, I would like to invite you to complete the following questionnaire, drawing on your experience of working with children with specific learning difficulties (dyslexia).

I hope that I shall benefit from your experience and information. Please respond to questions accurately, honestly and objectively. You may choose not to answer one or more of the questions, or cease completing the questionnaire at any time. Your responses will be dealt with confidentially and will be used purely for research purposes.

Yours faithfully,

Mr. Abdulaziz Alawadh

The questionnaires consists of five sections. Please put a tick in the appropriate box or write in the space provided.

Section One: About you and your school
1. Name:..(Optional)   School:..(Optional)
2. Gender: ☐ Male   ☐ Female
3. Age: ☐ Under 26   ☐ 26-40   ☐ 41-55   ☐ Over 55
4. Ethnicity: ☐ Kuwaiti   ☐ Other, please specify…......………….
5. Grade level(s) you are currently teaching: ☐ First Grade ☐ Second Grade ☐ Third Grade ☐ Fourth Grade ☐ Fifth Grade
6. The highest degree you have received: ☐ Diploma   Bachelo☐   Masters ☐   Doctorate ☐
7. How long have you been teaching.   .... Years

Section Two: Your understanding of pupils with specific learning difficulties (SpLD) (dyslexia) Please tick the appropriate box to indicate how much you agree with the statement next to it. If you are not sure which box to tick, please tick the box which is most closely related to your view.				
Statement	Strongly agree	Agree	Disagree	Strongly disagree
1. I have enough knowledge of the definition of reading difficulties to support pupils with learning difficulties (dyslexia).				
2. I fully understand the definition of dyslexia.				
3. I have enough familiarity with the characteristics of pupils with specific learning difficulties (SpLD)/(dyslexia) to be able to support them.				
4. I have enough familiarity with the screening of pupils with SpLD (dyslexia) to be able to support them.				
5. I have enough familiarity with the diagnosis of pupils with SpLD (dyslexia) to be able to support them.				
6. I have enough familiarity with the treatment of pupils with SpLD (dyslexia) to be able to support them.				
7. Children can grow out of dyslexia.				
8. You cannot identify dyslexia until a child is 8 years old.				
9. Dyslexic pupils always fail to follow instructions that guide them.				
10. Approximately one in eight children in a classroom will say they have dyslexia.				

- Please use this space to make any further comments that you feel are relevant to understanding pupils with specific learning difficulties (dyslexia).

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Section Three: Your knowledge of the self-concept/self-esteem of pupils with SpLD (dyslexia) at school Please tick the appropriate box to indicate how much you agree with the statement next to it. If you are not sure which box to tick, please tick the box which is most closely related to your view.				
Statement	Strongly agree	Agree	Disagree	Strongly disagree
1. Pupils with specific learning difficulties (SpLD) (dyslexia) have negative self-concept.				
2. Pupils with SpLD (dyslexia) have negative self-esteem.				
3. Pupils with SpLD (dyslexia) suffer from anxiety.				
4. Pupils with SpLD (dyslexia) suffer social isolation.				
5. Pupils with SpLD (dyslexia) suffer from shyness.				
6. Pupils with SpLD (dyslexia) suffer from insecurity.				
7. It is hard for pupils with SpLD (dyslexia) to make friends, because of their poor self-concept and low self-esteem.				
8. Pupils with SpLD (dyslexia) feel different from their peers.				
9. Some pupils with SpLD (dyslexia) react badly because they have learning difficulties.				
10. Pupils with SpLD (dyslexia) worry about what people think of them.				
11. Pupils have poor self-concept because of delayed intervention.				
12. The most effective intervention strategies for pupils with SpLD (dyslexia) focus on their self-concept and self-esteem.				
13. Early intervention has an impact on pupils with SpLD (dyslexia) by increasing their self-concept and self-esteem				
14. Appropriate classroom rewards should be provided to enhance self-concept and self-esteem				

- Please use this space to make any further comments that you feel are relevant to about self-concept/self-esteem in children with SpLD (dyslexia).

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Section Four: Educational issues related to early intervention Please tick the appropriate box to indicate how much you agree with the statement next to it. If you are not sure which box to tick, please tick the box which is most closely related to your view.				
Statement	Strongly agree	Agree	Disagree	Strongly disagree
1. You are familiar with the concept of early intervention.				
2. The appropriate age to start early intervention is in first grade.				
3. You have the skills to apply early intervention programmes.				
4. The family provide useful input in the follow-up and supervision process for early intervention.				
5. When teaching, you have sufficient knowledge of multi-sensory approaches as a kind of early intervention.				
6. There is a scarcity or total lack of suitable books and resources for early intervention in the school library.				
7. The school periodically runs workshops on early intervention.				
8. Students are anxious about reading because of delayed intervention.				
9. Students are likely to be unmotivated because of delayed intervention.				
10. Early intervention needs to take place in a separate room from the main classroom.				

- Please use this space to make any further comments that you feel are relevant to educational issues related to early intervention.

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Statement	Strongly agree	Agree	Disagree	Strongly disagree
Section Five: Obstacles and barriers that prevent the implementation of early intervention in primary schools in Kuwait **Please tick the appropriate box to indicate how much you agree with the statement next to it. If you are not sure which box to tick, please tick the box which is most closely related to your view.**				
1. The length of the curriculum does not allow me time to include early intervention programmes.				
2. The length of the lessons does not permit me to include intervention programmes.				
3. The high number of students in the class reduces the opportunity for early intervention.				
4. Teachers are not sufficiently aware of early intervention.				
5. Teachers are not sufficiently prepared through training courses.				
6. It difficult for teachers to assess pupils using the activities that the textbook recommends.				
7. The large amount of work assigned to Arabic language teachers outside the classroom does not allow time to apply early intervention.				
8. The large number of lessons per language teacher is an obstacle to early intervention.				
9. The unavailability of appropriate educational aids is an obstacle to early intervention.				
10. The unavailability of financial support for the school is an obstacle to implementing early intervention.				
11. There is a lack of guidance for early intervention in the teachers' handbook.				
12. There is a lack of cooperation from parent(s) in delivering early intervention.				
13. There is a lack of clarity in the school administration's policy regarding early intervention.				
14. Some language supervisors focus on coordination rather than on objectives, which thus reduces the importance of early intervention.				

- Please use this space to make any further comments that you feel are relevant to the obstacles and barriers preventing the application of early intervention in primary schools in Kuwait.

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- Would you like to take part in the interview? ☐ Yes   ☐ No

* If you have any comments on this questionnaire, or would like to submit any further information for my study, please contact me at asaa508@York.ac.uk

Thank you very much for your cooperation

ورقة المعلومات الخاصة بمشروع البحث

عنوان البحث: التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسلكسيا) في المدارس الابتدائية بدولة الكويت

أعزائي المشاركين:

اسمي عبد العزيز العوض طالب دكتوراه في جامعة يورك بالمملكة المتحدة. أبحث عن معلمين لغة عربية في المدارس الابتدائية للاشتراك في مشروع البحث للتعرف على التحديات التي تواجه تطبيق التدخل المبكر لدى التلاميذ ذوي صعوبات التعلم. يسعدني أن أدعوكم للمشاركة من خلال الإجابة على هذا الاستبيان وربما تحديد موعد مقابلة شخصية معكم فيما بعد. لا توجد أية معايير تتعلق بالنوع أو السن أو الحالة الصحية لأي من المشاركين في هذا الاستبيان، الجميع له الفرصة في المشاركة طالما أنهم يشاركون في العملية التعليمية للتلاميذ ذوي صعوبات التعلم أو الديسلكسيا.

في حالة موافقتكم على المشاركة فالمطلوب منكم استكمال الاستبيان الملحق بهذه الصفحة والذي يجب ألا تستغرق الاجابة عليه مدة عشرون دقيقة. يتكون الاستبيان من خمسة أجزاء متعلقة بالمعلومات العامة عنكم وعن المدرسة التي تعملون بها، وفهمكم لطبيعة التلاميذ ذوي الصعوبات التعلم (الديسلكسيا) بالاضافة إلى معرفتكم عن مفهوم الذات وأحترام الذات لدى التلاميذ ذوي صعوبات التعلم (الديسلكسيا) والقضايا التربوية المتعلقة بالتخدل المبكر والمعوقات والحواجز التي يمكن أن تعيق تطبيق التدخل العلاجي المبكر لدى طلاب المرحلة الابتدائية. لكم الحرية المطلقة في إكمال الجزء الاستبياني الذي ينطبق عليكم ، دون الحاجة إلى إعطاء أي سبب لعدم الانتهاء من الاستبيان ككل. كما يمكنكم التوقف عن استكمال الاستبيان في أي وقت شئتم. كما يمكنكم الادلاء برأيكم إن كنتم موافقون على المشاركة في المقابلة التي سوف تكون مدتها ثلاثون دقيقة. والتي تركز على معرفة وجهات نظر المعلمين والمعلمات حول التدخل المبكر لدى التلاميذ ذوي صعوبات التعلم، وكيفية التقلب على التحديات التي تواجهة تطبيق برامج التدخل المبكر. لكم حرية الاجابة أو عدم الاجابة على أي من الأسئلة التي سوف نطرحها عليكم خلال المقابلة. علما بأنه ليس من الضرورة أن تشاركوا في المقابلة الشخصية حتى وإن شاركتم في حل الاستبيان.

لستم ملزمين بالادلاء بأي معلومات أو بيانات شخصية علما بأن وجميع البيانات التي سيتم جمعها جميعًا ستكون سرية. وسوف ستبدل جميع بياناتكم الشخصية بأرقام ولن يمكن التعرف عليكم أبدًا. جميع المعلومات التي سوف يتم جمعها سوف نضعها في مكان آمن لن يصل إليه أحد فيما عدا الباحث والمشرفين الأكاديميين على رسالته العلمية. كما أنه سوف يتم التخلص من هذه المعلومات بعد مرور 5 سنوات. يمكن أن يتم نشر النتائج في احدى المجلات العلمية أو يتم الاستعانة بها في احدى المؤتمرات دون الكشف عن هويتكم.

من فضلكم بعد الانتهاء من حل الأسئلة أرجعوا الأوراق إلى الظرف الخاص بها وفي حالة اختياركم لاجراء المقابلة الشخصية فسوف يتم الاتصال بكم لتحديد موعد وتاريخ المقابلة الشخصية.

شكرًا لمشاركتكم، للاستفسار أرجوا الاتصال بقسم التربية , كلية ديروينت – جامعة يورك – هيسلنجتون – يورك YO10 5DD، بريد اليكتروني، asaa508@york.ac.uk تليفون 00447831555161 (UK) أو رقم 0096599058095 (الكويت)

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جامعة يورك   كلية التربية

السادة المشاركون

بعد التحية

حاليا أقوم بإجراء دراسة علمية تحت عنوان، " التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الديسلكسيا) في المدارس الابتدائية بدولة الكويت "، فإن هذه الدراسة جزءًا من متطلبات الحصول على درجة الدكتوراة من جامعة يورك في المملكة المتحدة.

كجزء من البحث, أود أن أدعوكم لاستكمال الاستبيان التالي بناءً على خبرتكم في العمل مع التلاميذ ذوي صعوبات التعلم (الديسلكسيا).

أرجو الاجابة على الأسئلة بدقة وأمانة وموضوعية متمنيا الاستفادة من خبرتكم. كما يمكنكم التوقف عن الاجابة عن الأسئلة أو ترك أي منها دون اجابة في أي وقت شئتم. سوف يتم التعامل مع استجاباتكم بشكل سري واستخدامها لأغراض البحث.

مع فائق الاحترام

عبدالعزيز العوض

يتكون الاستبيان من خمس أجزاء، اختر الاجابة الصحيحة أو اكتب الاجابة في الفراغ:

الجزء الأول: المعلومات الخاصة بك وبمدرستك
1. الاسم: .... (اختياري) المدرسة: .... (اختياري)
2. الجنس: ☐ ذكر   ☐ أنثى
3. العمر: ☐ أقل من 26   ☐ 26-40   ☐ 41-55   ☐ فوق 55
4. الجنسية: ☐ كويتي   ☐ غير كويتي (اذكر) ....
5. المرحلة التي تقوم بتدريسها حاليا : ☐ الصف الأول   ☐ الصف الثاني   ☐ الصف الثالث   ☐ الصف الرابع   ☐ الصف الخامس
6. المؤهل العلمي: ☐ دبلوم   ☐ بكالوريوس   ☐ ماجستير   ☐ دكتوراه
7. كم عدد سنوات الخبرة في التدريس   .... سنوات

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من فضلك اختر الاجابة المناسبة أو(الأقرب للإجابة الصحيحة) التي تظهر مدى موافقتك للعبارات التالية

العبارات	أوافق تماما	موافق	غير موافق	غير موافق تماما
1. لديك إلمام كافي بتعريف صعوبات القراءة للتلاميذ الذين يعانون من صعوبات التعلم لتقديم الدعم اللازم لهم.				
2. لديك إلمام كافي بتعريف الديسلكسيا.				
3. لديك إلمام كافي عن خصائص التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.				
4. لديك إلمام كافي بفرز التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.				
5. لديك إلمام كافي بتشخيص التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.				
6. لديك إلمام كافي عن علاج التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.				
7. يمكن للتلاميذ التخلص من الديسلكسيا				
8. لا يمكنك التعرف على الديسلكسيا حتى يكون الطفل ثمان سنوات من العمر.				
9. يفشل الأطفال المصابين بالديسلكسيا دائمًا في متابعة التعليمات التي توجههم				
10. حوالي واحد من كل ثمانية أطفال داخل الفصل الدراسي لديه الديسلكسيا				

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة في معرفتك وفهمك عن التلاميذ ذوي صعوبات التعلم (الديسلكسيا).

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العبارات	أوافق تماما	موافق	غير موافق	غير موافق تماما
الجزء الثالث: معرفتك وإلمامك عن مفهوم الذات واحترام الذات للتلاميذ ذوي صعوبات التعلم (الديسلكسيا) في المدرسة				
من فضلك اختر الاجابة المناسبة أو(الأقرب للإجابة الصحيحة) التي تظهر مدى موافقتك للعبارات التالية				
1. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) مفهوم الذات لديهم سلبي.				
2. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) احترام الذات لديهم سلبي.				
3. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من القلق.				
4. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من العزلة الاجتماعية.				
5. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من الخجل.				
6. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من عدم الأمان.				
7. من الصعب لدى التلاميذ ذوي صعوبات التعلم (الديسلكسيا) تكوين أصدقاء بسبب تدني مفهوم الذات واحترام الذات				
8. يشعر التلاميذ ذوي صعوبات التعلم (الدسلكسيا) أنهم مختلفون عن أقرانهم التلاميذ العاديين.				
9. بعض التلاميذ ذوي صعوبات التعلم (الدسلكسيا) ردة فعلهم سيئة لأنهم يعانون من صعوبات التعلم .				
10. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) لديهم قلق بشأن ما يعتقد الآخرون عنهم.				
11. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) لديهم تدني بمفهوم الذات بسبب التأخر في التدخل المبكر.				

العبارات	أوافق تماماً	موافق	غير موافق	غير موافق تماماً
12. أكثر الاستراتيجيات الفعالة للتدخل المبكر لدى التلاميذ ذوي صعوبات التعلم (الدسلكسيا) تركز على مفهوم الذات واحترام اذات				
13. التدخل المبكر له التأثير بزيادة مفهوم الذات واحترام الذات لدى التلاميذ ذوي صعوبات التعلم (الدسلكسيا)				
14. تقديم المكافآت المناسبة داخل الفصل الدراسي تعمل على زيادة مفهوم الذات واحترام الذات.				

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة في معرفتك وإلمامك عن مفهوم الذات واحترام الذات للتلاميذ ذوي صعوبات التعلم (الديسلكسيا) في المدرسة

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العبارات	أوافق تماما	موافق	غير موافق	غير موافق تماما
الجزء الرابع: القضايا التربوية المتعلقة بالتدخل المبكر				
من فضلك اختر الاجابة المناسبة أو(الأقرب للإجابة الصحيحة) التي تظهر مدى موافقتك للعبارات التالية				
1. لديك إلمام كافي بمفهوم التدخل المبكر.				
2. السن المناسب للبدء في برنامج التدخل المبكر هو الصف الأول				
3. لديك المهارات الكافية لتطبيق برامج التدخل المبكر				
4. تقدم الأسرة مساهمات مفيدة في عملية المتابعة والإشراف لبرامج التدخل المبكر				
5. لديك معرفة كافية باستخدام طريقة الحواس المتعددة في التدريس خلال تطبيق برنامج التدخل المبكر				
6. قلة أو عدم وجود الكتب والمصادر التي تتناول موضوع التدخل المبكر لدى مكتبة المدرسة.				
7. تنظم المدرسة ورش عمل بشكل دوري عن التدخل المبكر				
8. التلاميذ قلقون بالنسبة للقراءة نتيجة تأخر التدخل المبكر.				
9. قد تقل الحوافز والدوافع لدى التلاميذ نتيجة تأخر التدخل المبكر.				
10. من الأفضل أن يتم التدخل المبكر في غرفة منعزلة عن الفصل الدراسي				

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة بالنسبة إلى القضايا التربوية المتعلقة بالتدخل المبكر

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العبارات	أوافق تماما	موافق	غير موافق	غير موافق تماما
الجزء الخامس: العقبات والحواجز التي تحول دون تطبيق التدخل المبكر في المدارس الابتدائية بدولة الكويت من فضلك اختر الاجابة المناسبة أو(الأقرب للإجابة الصحيحة) التي تظهر مدى موافقتك للعبارات التالية				
1. طول المنهج الدراسي لا يسمح لي الوقت لتطبيق برنامج التدخل المبكر.				
2. طول الحصة لا يسمح لي بأن أطبق برنامج التدخل المبكر.				
3. ارتفاع عدد الطلاب في الفصل يقلل فرص تطبيق التدخل المبكر.				
4. المعلمون ليس لديهم الإطلاع الكافي عن التدخل المبكر.				
5. لم يتم تدريب المعلمين بشكل كافي للتدخل المبكر خلال الدورات التدريبية.				
6. من الصعب على المعلمين تقييم التلاميذ باستخدام الأنشطة يوصي بها الكتاب المدرسي				
7. زيادة الأعمال المكلفة لمعلمي اللغة العربية خارج الصف تعيق تطبيق برنامج التدخل المبكر.				
8. ارتفاع عدد الحصص لدى معلمي اللغة العربية عقبة أمام تطبيق التدخل المبكر				
9. عدم توفر الوسائل التعليمية المناسبة تعتبر عقبة لتطبيق التدخل المبكر				
10. عدم توفر الدعم المالي للمدرسة عقبة لتطبيق التدخل المبكر.				
11. عدم وجود تعليمات أو توجيهات حول التدخل المبكر في دليل (كتاب) المعلم				
12. عدم تعاون أولياء الأمور مع المعلمين في تطبيق التدخل المبكر				

العبارات	أوافق تماماً	موافق	غير موافق	غير موافق تماما
13. عدم وضوح سياسة الأدارة المدرسية اتجاه تطبيق التدخل المبكر				
14. بعض موجهين اللغة العربية يركز على المظهر والتنسيق بدلاً من التركيز على الأهداف مما يقلل من أهمية تطبيق التدخل المبكر				

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة بالنسبة للعقبات والحواجز التي تحول دون تطبيق التدخل المبكر في المدارس الابتدائية بدولة الكويت

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هل تود المشاركة في اجراء مقابلة شخصية ☐ نعم ☐ لا

يمكنك الاستفسار حول الاستبيان أو إضافة أي معلومات عن طريق البريد الإلكتروني asaa508@York.ac.uk

شكرًا جزيلا على تعاونكم

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THE UNIVERSITY *of York*

ورقة المعلومات الخاصة بمشروع البحث

عنوان البحث: التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسلكسيا) في المدارس الابتدائية بدولة الكويت

أعزائي المشاركين:

اسمي عبد العزيز العوض طالب دكتوراه في جامعة يورك بالمملكة المتحدة. أبحث عن معلمين لغة عربية في المدارس الابتدائية للاشتراك في مشروع البحث للتعرف على التحديات التي تواجه تطبيق التدخل المبكر لدى التلاميذ ذوي صعوبات التعلم. يسعدني أن أدعوكم للمشاركة من خلال الإجابة على هذا الاستبيان وربما تحديد موعد مقابلة شخصية معكم فيما بعد. لا توجد أية معايير تتعلق بالنوع أو السن أو الحالة الصحية لأي من المشاركين في هذا الاستبيان، الجميع له الفرصة في المشاركة طالما أنهم يشاركون في العملية التعليمية للتلاميذ ذوي صعوبات التعلم أو الديسلكسيا.

في حالة موافقتكم على المشاركة فالمطلوب منكم استكمال الاستبيان الملحق بهذه الصفحة والذي يجب ألا تستغرق الاجابة عليه مدة عشرون دقيقة. يتكون الاستبيان من خمسة أجزاء متعلقة بالمعلومات العامة عنكم وعن المدرسة التي تعملون بها، وفهمكم لطبيعة التلاميذ ذوي الصعوبات التعلم (الديسلكسيا) بالاضافة إلى معرفتكم عن مفهوم الذات وتقدير الذات لدى التلاميذ ذوي صعوبات التعلم (الديسلكسيا) والقضايا التربوية المتعلقة بالتدخل المبكر والمعوقات والحواجز التي يمكن أن تعيق تطبيق التدخل العلاجي المبكر لدى طلاب المرحلة الابتدائية. لكم الحرية المطلقة في إكمال الجزء الاستبياني الذي ينطبق عليكم ، دون الحاجة إلى إعطاء أي سبب لعم الانتهاء من الاستبيان ككل. كما يمكنكم التوقف عن استكمال الاستبيان في أي وقت شئتم. كما يمكنكم الادلاء برأيكم إن كنتم موافقون على المشاركة في المقابلة التي سوف تكون مدتها ثلاثون دقيقة. والتي تركز على معرفة وجهات نظر المعلمين والمعلمات حول التدخل المبكر لدى التلاميذ ذوي صعوبات التعلم، وكيفية التقلب على التحديات التي تواجهة تطبيق برامج التدخل المبكر. لكم حرية الاجابة أو عم الاجابة على أي من الأسئلة التي سوف نطرحها عليكم خلال المقابلة. علما بأنه ليس من الضرورة أن تشاركوا في المقابلة الشخصية حتى وإن شاركتم في حل الاستبيان.

لستم ملزمين بالادلاء بأي معلومات أو بيانات شخصية علما بأن وجميع البيانات التي سيتم جمعها جميعًا ستكون سرية. وسوف ُستبدل جميع بياناتكم الشخصية بأرقام ولن يمكن التعرف عليكم أبدًا. جميع المعلومات التي سوف يتم جمعها سوف نضعها في مكان آمن لن يصل إليه أحد فيما عدا الباحث والمشرفين الأكاديميين على رسالته العلمية. كما أنه سوف يتم التخلص من هذه المعلومات بعد مرور 5 سنوات. يمكن أن يتم نشر النتائج في احدى المجلات العلمية أو يتم الاستعانة بها في احدى المؤتمرات دون الكشف عن هويتكم.

من فضلكم بعد الانتهاء من حل الأسئلة أرجعوا الأوراق إلى الظرف الخاص بها وفي حالة اختياركم لاجراء المقابلة الشخصية فسوف يتم الاتصال بكم لتحديد موعد وتاريخ المقابلة الشخصية.

شكرًا لمشاركتكم، للاستفسار أرجوا الاتصال بقسم التربية , كلية ديروينت – جامعة يورك – هيسلنجتون – يورك YO10 5DD، بريد اليكتروني، asaa508@york.ac.uk تليفون UK) 00447831555161) أو رقم 0096599058095 (الكويت)

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| كلية التربية | جامعة يورك |

السادة المشاركون

تحية طيبة وبعد،،،

حاليا أقوم بإجراء دراسة علمية تحت عنوان، " التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسلكسيا) في المدارس الابتدائية بدولة الكويت "، فإن هذه الدراسة جزءًا من متطلبات الحصول على درجة الدكتوراة من جامعة يورك في المملكة المتحدة.

كجز من البحث, أود أن أدعوكم لاستكمال الاستبيان التالي بناءً على خبرتكم في العمل مع التلاميذ ذوي صعوبات التعلم (الديسلكسيا).

أرجو الاجابة على الأسئلة بدقة وأمانة وموضوعية متمنيا الاستفادة من خبرتكم. كما يمكنكم التوقف عن الاجابة عن الأسئلة أو ترك أي منها دون اجابة في أي وقت شئتم. سوف يتم التعامل مع استجاباتكم بشكل سري واستخدامها لأغراض البحث.

مع فائق الاحترام

عبدالعزيز العوض

يتكون الاستبيان من خمس أجزاء، اختر الاجابة الصحيحة أو اكتب الاجابة في الفراغ:

الجزء الأول: المعلومات الخاصة بك وبمدرستك
1. الاسم: .... (اختياري) المدرسة: علي بن ابي طالب ع ....
2. الجنس: ☑ ذكر ☐ أنثى
3. العمر: ☐ أقل من 26 ☐ 26-40 ☑ 41-55 ☐ فوق 55
4. الجنسية: ☑ كويتي ☐ غير كويتي (اذكر) ....
5. المرحلة التي تقوم بتدريسها حاليا : ☐ الصف الأول ☐ الصف الثاني ☐ الصف الثالث ☑ الصف الرابع ☐ الصف الخامس
6. المؤهل العلمي: ☑ دبلوم ☐ بكالويوس ☐ ماجستير ☐ دكتوراه
7. كم عدد سنوات الخبرة في التدريس اكثر من سبع سنوات........ سنوات ـ ٣ .

غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
			✓	1. لديك إلمام كافي بتعريف صعوبات القراءة للتلاميذ الذين يعانون من صعوبات التعلم لتقديم الدعم اللازم لهم.
			✓	2. لديك إلمام كافي بتعريف الديسلكسيا.
			✓	3. لديك إلمام كافي عن خصائص التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.
		✓		4. لديك إلمام كافي بفرز التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.
			✓	5. لديك إلمام كافي بتشخيص التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.
			✓	6. لديك إلمام كافي عن علاج التلاميذ ذوي صعوبات التعلم (الديسلكسيا) لتقديم الدعم اللازم لهم.
				7. يمكن للتلاميذ التخلص من الديسلكسيا.
		✓		8. لا يمكنك التعرف على الديسلكسيا حتى يكون الطفل ثمان سنوات من العمر.
			✓	9. يفشل الأطفال المصابين بالديسلكسيا دائمًا في متابعة التعليمات التي توجههم.
			✓	10. حوالي واحد من كل ثمانية أطفال داخل الفصل الدراسي لديه الديسلكسيا.

الجزء الثاني: معرفتك وفهمك عن التلاميذ صعوبات التعلم (الديسلكسيا)

من فضلك اختر الاجابة المناسبة التي تظهر مدى موافقتك للعبارات التالية

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة في معرفتك وفهمك عن التلاميذ ذوي صعوبات التعلم (الديسلكسيا).

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لا توجد معلومات ....
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غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
		✓		1. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) مفهوم الذات لديهم سلبي.
	✓			2. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) تقدير الذات لديهم سلبي.
			✓	3. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من القلق.
			✓	4. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من العزلة الاجتماعية.
			✓	5. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من الخجل.
		✓		6. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) يعانون من عدم الأمان.
		✓		7. من الصعب لدى التلاميذ ذوي صعوبات التعلم (الديسلكسيا) تكوين أصدقاء بسبب تدني مفهوم الذات وتقدير الذات
		✓		8. يشعر التلاميذ ذوي صعوبات التعلم (الدسلكسيا) أنهم مختلفون عن أقرانهم التلاميذ العاديين.
		✓		9. بعض التلاميذ ذوي صعوبات التعلم (الدسلكسيا) ردة فعلهم سيئة لأنهم يعانون من صعوبات التعلم .
		✓		10. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) لديهم قلق بشأن ما يعتقد الآخرون عنهم.
		✓		11. التلاميذ ذوي صعوبات التعلم (الدسلكسيا) لديهم تدني بمفهوم الذات بسبب التأخر في التدخل المبكر.

الجزء الثالث: معرفتك وإلمامك عن مفهوم الذات وتقدير الذات للتلاميذ ذوي صعوبات التعلم (الديسلكسيا) في المدرسة

من فضلك اختر الإجابة المناسبة التي تظهر مدى موافقتك للعبارات التالية

غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
/				12. أكثر الاستراتيجيات الفعالة للتدخل المبكر لدى التلاميذ ذوي صعوبات التعلم (الدسلكسيا) تركز على مفهوم الذات وتقدير اذات
	/			13. التدخل المبكر له التأثير بزيادة مفهوم الذات وتقدير الذات لدى التلاميذ ذوي صعوبات التعلم (الدسلكسيا)
		/		14. تقديم المكافآت المناسبة داخل الفصل الدراسي تعمل على زيادة مفهوم الذات وتقدير الذات.

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة في معرفتك والمامك عن مفهوم الذات وتقدير الذات للتلاميذ ذوي صعوبات التعلم (الديسلكسيا) في المدرسة

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غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
				الجزء الرابع: القضايا التربوية المتعلقة بالتدخل المبكر
				من فضلك اختر الاجابة المناسبة التي تظهر مدى موافقتك للعبارات التالية
✓				1. لديك إلمام كافي بمفهوم التدخل المبكر.
			✓	2. السن المناسب للبدء في برنامج التدخل المبكر هو الصف الأول
		✓		3. لديك المهارات الكافية لتطبيق برامج التدخل المبكر
			✓	4. تقدم الأسرة مساهمات مفيدة في عملية المتابعة والإشراف لبرامج التدخل المبكر
			✓	5. لديك معرفة كافية باستخدام طريقة الحواس المتعددة في التدريس خلال تطبيق برنامج التدخل المبكر
		✓		6. قلة أو عدم وجود الكتب والمصادر التي تتناول موضوع التدخل المبكر لدى مكتبة المدرسة.
		✓		7. تنظم المدرسة ورش عمل بشكل دوري عن التدخل المبكر
		✓		8. التلاميذ قلقون بالنسبة للقراءة نتيجة تأخر التدخل المبكر.
		✓		9. قد نقل الحوافز والدوافع لدى التلاميذ نتيجة تأخر التدخل المبكر.
	✓			10. من الأفضل أن يتم التدخل المبكر في غرفة منعزلة عن الفصل الدراسي

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة بالنسبة إلى القضايا التربوية المتعلقة بالتدخل المبكر

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تدوين مصادر معلومات

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غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
				الجزء الخامس: العقبات والحواجز التي تحول دون تطبيق التدخل المبكر في المدارس الابتدائية بدولة الكويت
				من فضلك اختر الاجابة المناسبة التي تظهر مدى موافقتك للعبارات التالية
			✓	1. طول المنهج الدراسي لا يسمح لي الوقت لتطبيق برنامج التدخل المبكر.
			✓	2. طول الحصة لا يسمح لي بأن أطبق برنامج التدخل المبكر.
			✓	3. ارتفاع عدد الطلاب في الفصل يقلل فرص تطبيق التدخل المبكر.
✓				4. المعلمون ليس لديهم الإطلاع الكافي عن التدخل المبكر.
	✓			5. لم يتم تدريب المعلمين بشكل كافي للتدخل المبكر خلال الدورات التدريبية.
	✓			6. من الصعب على المعلمين تقييم التلاميذ باستخدام الأنشطة يوصي بها الكتاب المدرسي
			✓	7. زيادة الأعمال المكلفة لمعلمي اللغة العربية خارج الصف تعيق تطبيق برنامج التدخل المبكر.
			✓	8. ارتفاع عدد الحصص لدى معلمي اللغة العربية عقبة أمام تطبيق التدخل المبكر.
			✓	9. عدم توفر الوسائل التعليمية المناسبة تعتبر عقبة لتطبيق التدخل المبكر.
			✓	10. عدم توفر الدعم المالي للمدرسة عقبة لتطبيق التدخل المبكر.
			✓	11. عدم وجود تعليمات أو توجيهات حول التدخل النبكر في دليل (كتاب) المعلم
			✓	12. عدم تعاون أولياء الأمور مع المعلمين في تطبيق التدخل المبكر

غير موافق تماما	غير موافق	موافق	أوافق تماما	العبارات
			/	13. عدم وضوح سياسة الأدارة المدرسية اتجاه تطبيق التدخل المبكر
			/	14. بعض موجهين اللغة العربية يركز على المظهر والتنسيق بدلاً من التركيز على الأهداف مما يقلل من أهمية تطبيق التدخل المبكر

أرجو استخدام هذا المكان الفارغ لإضافة أي معلومات ترى أنها مهمة بالنسبة للعقبات والحواجز التي تحول دون تطبيق التدخل المبكر في المدارس الابتدائية بدولة الكويت

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.... عدم توحيد معلومات ....

.... * وزارة المدرسية بتأخذ برأي المعلم ....

.... في تحويج الأمور الى تخص المدرسية ....

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هل تود المشاركة في اجراء مقابلة شخصية ☐نعم ☑لا

شكرًا جزيلا على تعاونكم

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Appendix (C)

الرقم: ٥٨٩

التاريخ:٣٤/١٨/٢٠١٢م

مدير عام منطقة العاصمة التعليمية

تحية طيبة وبعد ،،،

الموضوع:تسهيل مهمة

يقوم الطالب/ **عبدالعزيز صادق العوض** المسجل في جامعة يورك بالمملكة المتحدة بإجراء بحث ميداني لمتطلبات التخرج لبرنامج الدكتوراة بعنوان **"التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسكلسيا) في المدارس الابتدائية بدولة الكويت".**

فيرجى تسهيل مهمة المذكور أعلاه من خلال تطبيق الإستبانة المختومة صفحاتها من إدارة البحوث والتطوير التربوي **على جميع معلمي مدارس المرحلة الابتدائية** التابعة لمنطقتكم التعليمية خلال العام الدراسي الحالي ٢٠١٣/٢٠١٤.

مع خالص الشكر والتقدير ،،،

مدير إدارة البحوث التربوية
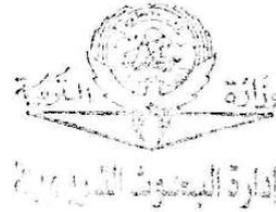
نسخة للملف

Noura-

Appendix (D)

السادة المحترمين / مديرات ومديرو المدارس الأبتدائية .

تحية طيبة وبعد ،،،،،

يرجى التكرم بتسهيل مهمة الطالب / عبدالعزيز صادق العوض المسجل في جامعة يورك بالمملكة المتحدة بأجراء بحث ميداني لمتطلبات التخرج لبرنامج الدكتوراة بعنوان **"التحديات التي تواجة تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسكلسيا) في المدارس الابتدائية بدولة الكويت "** وتتطلب الدراسة تطبيق الاستبانة المختومة صفحاتها من إدارة البحوث والتطوير التربوي على جميع معلمي مدارس المرحلة الابتدائية وذلك خلال العام الدراسي الحالي ٢٠١٤/٢٠١٣م .

مع خالص التحية ،،،،،

مدير عام

الإدارة العامة لمنطقة العاصمة التعليمية

نسخة لكل من :

• مدير عام المنطقة
• إدارة الشؤون التعليمية
• قسم التخطيط والمعلومات

رقـــم : ٥٦٩٠
التاريخ : ١٢/٤/٢٠١٤
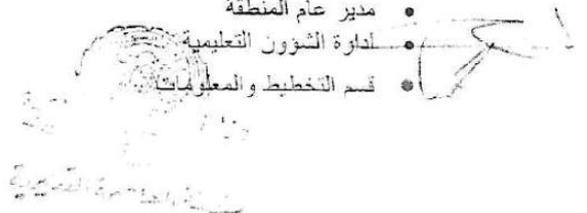
نشرة عامة رقم (٨٦ / ٢٠١٤)

لجميــع مدارس المرحلة الابتدائية

السادة والسيدات المحترمين / مديري ومديرات المدارس

تحية طيبة وبعد ،،،

الموضوع

تسهيل مهمة الطالب/ عبدالعزيز صادق العوض

يرجى التكرم بتسهيل مهمة المذكور أعلاه المسجل في جامعة يورك بالمملكة المتحدة على درجة الدكتوراه وذلك لإجراء بحث ميداني بعنوان " التحديات إلي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسكلسيا) في المدارس الابتدائية بالكويت"

يرجى تسهيل مهمة الطالب من خلال تطبيق الأستبانة على جميع معلمي مدارس المرحلة الابتدائية خلال العام الدراسي ٢٠١٣/٢٠١٤.

مع خالص التحية ،،،

مدير عام منطقة حولي التعليمية

نسخة لكل من :
- مدير الشئون التعليمية
- مراقبة التعليم الابتدائي
- جميع مدارس المرحلة الابتدائية
- الملف.

دولة الكويت
وزارة التربية
الإدارة العامة لمنطقة مبارك الكبير التعليمية
مكتب المدير العام

نشرة خاصة

لمدارس المرحلة الابتدائية

8819

الموضوع : تسهيل مهمة .

يقوم الطالب / عبد العزيز صادق العوض المسجل في جامعة يورك بالمملكة المتحدة بإجراء بحث ميداني لمتطلبات التخرج لبرنامج الدكتوراه بعنوان (التحديات التي تواجه تطبيق التدخل المبكر لتلاميذ ذوي صعوبات التعلم (الدسكلسيا) في المدارس الابتدائية بدولة الكويت)

فيرجى تسهيل مهمة المذكور أعلاه من خلال تطبيق الاستبانه المختومة صفحاتها من إدارة البحوث والتطوير التربوي على جميع معلمي مدارس المرحلة الابتدائية خلال العام الدراسي الحالي ٢٠١٤/٢٠١٣ .

مع خالص التحية ،،،

مدير عام منطقة مبارك الكبير التعليمية

نسخ لكل من :
- المدير العام
- مدير إدارة الشئون التعليمية
- مراقب التعليم الابتدائي
- مدارس المرحلة الابتدائية
- نسخة للملف

سارة
٢٠١٤/٤/٢

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Appendix (E)

QUESTIONS FOR THE SEMI-STRUCTURED INTERVIEWS

A) Questions for the Arabic language teachers:

1. How long have you been working at this school?

2. Do you have a qualification in special education/needs?

3. Did you attend special training or workshops on early intervention before you joined this school?

   If so, was this training appropriate for you?

   If not, do you have any suggestions for how to improve this?

4. Does the number of language lessons affect the implementation of early intervention? What are the reasons for this, in your opinion?

5. If there is not enough time allocated for language lessons, what do you suggest to try and improve this?

6. If you have any other responsibilities in the school, do they prevent you from implementing early intervention?

7. In your opinion, does the Arabic language curriculum help the implementation of early intervention? If not, why?

   Do you have any suggestions for how to improve this?

8. If the school does not provide appropriate educational materials and resources for the implementation of early intervention, what do you suggest to remedy this?

9. If parents do not have any information about SpLD/Dyslexia and early intervention, does this affect the implementation of early intervention?

10. Is the financial support for the school sufficient for the application of early intervention?

11. If there are problems with current educational preparation, which may affect the implementation of early intervention, do you have any suggestions on how to develop this?

12. Do you think that the your workload delays or prevents the application of early intervention?

    If so, do you have any suggestions for how to improve this situation?

13. In your opinion, what are the main challenges that you face in implementing early intervention?

14. In your opinion, what should be changed to improve the implementation of early intervention?

(Open-ended question - this question is to be asked at the end of the interview and the teachers will be asked to answer it in writing if they need more time).

B) Questions for Arabic language supervisors:

1. Do you think that the methods for identifying and diagnosing pupils with SpLD in primary schools is appropriate?

2. In your opinion, in which grade should the implementation of early intervention begin and why?

3. Do you have specialists in early intervention at your school?

4. Does your supervisor have enough experience in early intervention to transmit it to the teacher?

5. Does the Ministry of Education provide appropriate financial support for early intervention?

6. Is there cooperation between the school administration and department for supervising Arabic language teaching, regarding the implementation of early intervention?

7. Does the school provide services that help with the implementation of early intervention, such as private rooms and equipment?

   If not, do you have any suggestions for how to improve this situation?

8. Does the department supervising Arabic language teaching periodically organise workshops on early intervention for teachers?

9. Is there information or guidance in the Arabic language teachers' handbook on how to apply early intervention?

   If not, do you have any suggestions for how to improve this situation?

10. Do you think there is enough information provided in general teacher training concerning specific language difficulties?

11. Do you have a direct connection with educational institutions, such as the Centre for Child Evaluation and Teaching, or the Kuwaiti Dyslexia Association, where you can take advantage of their expertise in the field of special education?

12. In your opinion, what are the main challenges that you face in implementing early intervention?

13. In your opinion, what should be changed to improve the implementation of early intervention?

    (Open-ended question - this question is to be asked at the end of the interview and the teachers will be asked to answer it in writing if they need more time).

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