MANAGING MULTI-GRADE TEACHING FOR OPTIMAL LEARNING IN GAUTENG WEST PRIMARY SCHOOLS

by

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DECLARATION

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Managing multi-grade teaching for optimal learning in Gauteng West primary

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ABSTRACT

The researcher investigated the management of multi-grade teaching for optimal learning in Gauteng West primary schools. Ten participants, including school principals, heads of departments and educators participated in individual and focus group interviews and in observation of multi-grade classroom contexts. Findings revealed that educators involved in multi-grade teaching feel overwhelmed by challenging work conditions pertaining to large learner numbers and a lack of adequate didactical resources. This is exacerbated by a lack of professional development by means of tailor-made training for multi-grade teaching and the presumption that educators teaching such classes must merely change the monograde teaching format of the curriculum themselves for applicable implementation in a multi-grade teaching context. This leaves educators socially, emotionally and professionally isolated. Recommendations include the involvement of seasoned educators with expert knowledge and experience of multi-grade teaching to present training sessions constituting advice and support to inexperienced educators involved in said teaching.

KEY TERMS

Multi-grade teaching; mono-grade teaching environment; HoDs (heads of department); adequate support to educators teaching multi-grade classrooms; managing strategies for multi-grade teaching; overcrowded classrooms; assistant teacher; cooperative group work; experienced educator; professional development; training for multi-grade teaching; educator-learner ratio; school principal

OPSOMMING

Die navorser het die bestuur van meergraadonderrig by laerskole in Wes-Gauteng vir optimale leer ondersoek. Afgesien van individuele en fokusgroeponderhoude met skoolhoofde. departementshoofde en opvoeders. is waarneming meergraadklaskamers gedoen. Volgens die bevindings bemoeilik groot klasse en 'n didaktiese hulpmiddels meergraadopvoeders gebrek aan se taak. Meergraadopvoeders hulle geensins hierdie voel opgewasse teen werksomstandighede nie. 'n Gebrek aan opleiding in meergraadonderrig en die veronderstelling dat opvoeders die eengraadformaat van die kurrikulum in 'n meergraadformaat kan omskakel, vererger sake. Opvoeders is van mening dat hulle maatskaplik, emosioneel en professioneel in die steek gelaat word. Daar word aanbeveel dat gesoute opvoeders met kennis van en ervaring in meergraadonderrig onervare opvoeders oplei en adviseer.

KERNBEGRIPPE

Meergraadonderrig; enkelgraadonderrigomgewing; DH's (departementshoofde); genoegsame ondersteuning vir opvoeders wat in meergraadklasse onderwys gee; bestuurstrategieë vir meergraadonderrig; oorvol klaskamers; assistentonderwyser; samewerkende groepwerk; ervare opvoeder; professionele ontwikkeling; opleiding in meergraadonderrig; opvoeder-leerderverhouding; skoolhoof

SETSOPOLWA

Monyakišiši o dirile dinyakišišo ka ga go ruta dikereiti tše fapanego go fihlelela bokgoni le tsebo tikologong ya go thekga dinyakwa tša baithuti dikolong tša phoraemari go la Gauteng Bodikela. Batšeakarolo ba lesome, go akaretšwa dihlogo tša dikolo, dihlogo tša dikgoro le barutiši ba tšeere karolo ditherišanong ka botee le dihlopha tšeo di nepišitšwego gape le temogo dikemong tša diphapoši tša dikereiti tše di fapanego. Dikhwetšo di utollotše gore barutiši bao ba rutago dikereiti tše fapanego ba imelwa ke maemo a modiro wo o nyakago gore ba ntšhe bokgoni bja bona ka moka ka lebaka la dipalo tše ntši tša baithuti le tlhokego ya dithuši tša thuto tše di lekanego. Se se thatafišwa ke tlhokego ya tlhabollo ya profešene ye ka go fa tlhahlo yeo e lebanego ya go ruta dikreiti tše fapanego le kgopolo ya go re barutiši bao ba rutago ba swanela go no fetola popego ya lenaneothuto la kereiti e tee ka bobona go re ba le diriše kemong ya go ruta dikereiti tše fapanego. Se se dira gore barutiši ba ikhwetše ba se na kgokagano le setšhaba leagong, ba hloka bao ba ka llelago go bona le go se be le bao ba nago le kgahlego go profešene ya bona. Ditšhišinyo di akaretša go ba gona ga barutiši bao e lego kgale ba ruta ba nago le maitemogelo le botsebi go ruta dikereiti tše fapanego go hlagiša dipaka tša tlhahlo tšeo di fago maele le thušo go barutiši bao ba se nago maitemogelo.

MAREO A BOHLOKWA

Go ruta dikreiti tše fapanego; tikologo ya go ruta kereiti e tee; diHoD (dihlogo tša dikgoro); thekgo ye e lekanego go barutiši bao ba rutago diphapošing tša dikereiti tše fapanego; maanotshepedišo a taolo a go ruta dikereiti tše fapanego; diphapoši tša baithuti ba bantši go fetiša tekanyo; morutiši yo a thušago; dihlopha tše di šomišanagommogo phapošing; morutiši yo a nago le maitemogelo; tlhabollo ya profešene; tlhahlo ya go ruta dikereiti tše fapanego; tekanyo ya morutiši le baithuti; hlogo ya sekolo

LIST OF ACRONYMS

ATP Annual Teaching Plan

BETD Basic Education Teacher Diploma

Caps Curriculum and Assessment Policy Statement

CPUT Cape Peninsula University of Technology

DBE Department of Basic Education

EFA Education for All

EMIS Education Management Information System

ETP Education Theory and Practice

HIV Human Immunodeficiency Virus

HoD Head of Department

MDG Millennium Development Goals

OECD The Organisation for Economic Cooperation and Development

SBST School Based Support Team

UNISA University of South Africa

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CHAPTER ONE ORIENTATION TO THE STUDY

1.1 INTRODUCTION

The youth of today are the future of tomorrow. This statement is widely appreciated, but differently interpreted in various contexts. Schools are places in which parents, children, and teachers renew and enrich their lives, thus empowering and capacitating each other to increased efficiency and effectiveness (Marsh, Mayfield, McFadden & Prince, 2001:15). In order to achieve this efficiency, quality education for all is essential.

In a developing country such as South Africa, many schools have a limited number of learners, teachers and classrooms in small and scattered settlement areas where population density is low. In urban and semi-urban areas population density is high, with large numbers of learners in many areas exceeding the number of qualified teachers (Brown, 2010:11). The result is that many schools in rural and urban areas are forced to turn to multi-grade teaching. The definition of multi-grade teaching is interpreted differently by different researchers. For the purpose of this study on multi-grade teaching in primary schools within a South African context, the following definition of multi-grade teaching is adopted: The teaching which occurs within a graded system of education where a single class contains two or more learner grade levels and are taught by one educator (Berry, 2010:1).

Despite the widespread prevalence of multi-grade teaching, there is generally little official acknowledgement of its existence (Brown, 2010:189). As multi-grade teaching in South Africa is mainly inspired by necessity rather than choice, it is an inevitable, relevant practice to investigate. The focus of this research is thus on the management of multi-grade teaching with, as its rationale the refinement of practice for the sake of effective teaching and successful learning.

1.2 BACKGROUND TO THE STUDY

As background to the study on multi-grade teaching the reported challenges, the effect of adequate training, the linking of knowledge areas and the accommodation of learner differences within a multi-grade teaching context are discussed.

1.2.1 The purposes and challenges of multi-grade teaching

Regarding multi-grade teaching in South Africa, a series of consecutive problems need to be addressed. Firstly, the lack of designated teacher training for multi-grade teaching contexts is a pertinent problem (Brown, 2009:72). The key factor in determining the success of any type of teaching is the teacher and as such there is a need for the special training of teachers for multi-grade teaching.

Linked to the lack of teacher training is the lack of teachers and physical resources for a viable multi-grade teaching context. In Africa, as a consequence of shortages of teachers due to high birth rates, teacher absenteeism owing to HIV/AIDS-related causes and to budget restraints facing many developing countries, multi-grade classes are an inevitable option (Brown, 2007:12). Ministries of Education worldwide see multi-grade teaching approaches as a key pedagogic tool that can assist teachers to cope with teaching in these very difficult situations (Juvane, 2007:4).

The link between issues of rurality and multi-grade teaching has a negative effect on quality education. Most teachers who live and work in rural areas see multi-grade teaching as a forced exile (Aksoy, 2007:219). The availability of education is relatively limited in rural areas where population density is low and where schooling does not easily fit with the patterns of rural livelihoods and lifestyles (Brown, 2010:11). However, there are significant numbers of South African schools in which multi-grade teaching is practiced which include schools in highly urbanised provinces such as Gauteng. Schools with classes where multi-grade teaching takes place are not unique to South Africa. In general, the extent of multi-grade schools in developed countries such as England (25%) and Austria (25%) is lower, while in developing countries such as Peru (73%) and India (84%) the incidence is much higher (Chaka & Weber, 2011).

Schools with classes where multi-grade teaching is implemented are typically found in, although not exclusive to, rural schools. According to the Department of Basic Education (DBE), Education Management Information System (EMIS) data, 27% of rural schools had one or more multi-grade classes in 2012. Multi-grade teachers are responsible for teaching all the learners at different grade levels at the same time. Of the more than 3500 schools with multi-grade classes, the majority are in the Eastern Cape (35%) and KwaZulu-Natal (29%). In schools that have one or more multi-grade classes, there are 8541 multi-grade classes at an average of 2.39 per school. Just over 24700 teachers teach in these multi-grade classes. There were more than 12 million learners in both public and private South African schools in 2012 (Department of Basic Education, 2012), of which 14% of schools had multi-grade classes and 5% of all learners were taught in these classes. To narrow down to Gauteng the number of schools with multi-grade classes in 2013 was 16, the number of multi-grade classes was 38, the multi-grade educator numbers was 103 and the number of learners being taught in multi-grade classes was 3336. The high population density of young learners in small farming arrangements in semi-urban areas in Gauteng does not correlate with the limited number of qualified teachers available to teach there. This exacerbates multi-grade teaching challenges, namely to provide schooling to large numbers of learners by means of multi-grade classrooms.

In developed countries, multi-grade teaching is not always treated as a necessity but is regarded as one of the various pedagogical choices that could be executed to ensure optimal learning within specific contexts (Aksoy, 2007:221). The argument is that in multi-grade classes learners have more opportunity to engage in small groups for group work and the classrooms are characterised by differentiated approaches to teaching to cater for differentiated learning. Learners' reading abilities, for example, are identified to have the tendency to improve with multi-grade teaching arrangements, partly because of a collective approach to teaching and learning in multi-grade classrooms (Lloyd, 2013:187-212). Younger learners have the tendency to follow the older learners, and older learners lead young ones by example. This implies that, in multi-grade classes, apart from teacher input to learning, learners are exposed to more opportunities for learning by their participation in group work activities representing different grade levels (Berry, 2010:3). It is, however, impossible to compare multi-

grade contexts of different countries, because of the different circumstances and situations that each country faces.

A review of the literature confirms that multi-grade education is an option to promote access to education, especially to children in rural areas with low levels of population density (Berry, 2010:359; Brown, 2010:200 & Juvane, 2007:24). But multi-grade education is only viable if there are enough educational resources which, amongst other, pertain to effective teacher training.

1.2.2 The effect of adequate training for multi-grade teaching

Teacher competency for multi-grade teaching is crucially important, especially considered against the background of its necessity for the South African context. Teachers in general must have at their disposal specific curriculum skills and knowledge which enable them to teach and educate effectively with regard to the curricular and the extracurricular context (Carl, 2009:14). This demand impacts on teacher training. Carl (2009:14) emphasises that, due to the high demands on teachers to play an increasingly active role as curriculum agents, intensive competency gains for teachers teaching multi-grade classes through well designed courses at teacher training institutions is crucial.

The best way to ensure teacher competency and to deliver enough qualified teachers teaching in multi-grade classes is through specialised training. Teachers and school managers involved in multi-grade teaching depend on adequate resources, knowledge and dexterity to make a positive contribution to the development and transformation of their environments which necessitate multi-grade teaching. This contributes to the accomplishment of the ultimate goal with education, namely optimal learning for all children. The fact that South African teachers are not trained during initial teacher education to teach in a multi-grade classroom (Brown, 2007), and inservice education and training (INSET) programmes do not include multi-grade teaching as a curriculum topic (Brown, 2007), addressing multi-grade teaching skills in initial and INSET programmes remains unexplored.

The National Qualifications Framework (NQF) of South Africa has adopted an approach to education and training to give all South Africans access to equal educational opportunities of a high quality (The National Qualifications Framework (NQF), Act 67 of 2008). Amongst other endeavours, the aims of the NQF are:

- to institute a system to determine value that will assess performance against clearly defined standards;
- to create a dynamic structure that can adapt rapidly to new developments in the world of work, labour and education and training;
- to permit more people to enter education and training;
- to provide relevant education and training by addressing needs;
- to promote access to learning;
- to provide a variety of routes to qualifications;
- to simplify the qualifications structure; and
- to ensure quality.

With reference to the fact that multi-grade classrooms are a reality in South Africa, these NQF aims also imply multi-grade teaching to promote access and to address contextual societal needs. In order to implement multi-grade teaching as a necessity, the concerted help from the National Department of Education is needed for sufficient and proper training. As multi-grade teaching is prevalent in educational systems worldwide (Kyne, 2005:11) and a significant number of South African teachers are also confronted by mixed aged classes (Joubert, 2006:10), the need for specialised training in multi-grade teaching is irrefutable.

1.2.3 Creating connections and links between separate areas of knowledge and inquiry to ensure optimal learning in a multi-grade classroom

In accordance with the National Curriculum Statement (NCS) of South African Schools, connections and links between different subject areas are important because reality manifests as a whole and not as watertight and fragmented components of existence (Revised National Curriculum Statement Grades R-9, 2005:22). For that reason, countries design curricula consisting of learning competencies that are

designed for regular school situations consisting of singular levels of development in the same classroom dealing with reality as a whole (Juvane, 2005:10). Teachers teaching multi-grade classes find it difficult to make the content meaningful to pupils who represent different grade levels. A curriculum for multi-grade teaching requires educators to plan separately for each grade which, as Berry (2010) states, demands that multi-grade teachers are trained to plan across grade level objectives.

1.2.4 Strategies to accommodate the individual differences of learners in a multi-grade classroom

In a multi-grade classroom two or even more grade levels are taught during one time-tabled period in the same classroom (Kamel, 2010). It is therefore important that educators focus on issues of diversity amongst pupils which implies more than teaching in mixed classes. Diversity in multi-grade classrooms requires a paradigm shift and a non-judgmental reorientation not only towards education in general, but also towards educators' own teaching practice in their schools and classrooms (Coetzee, Van Niekerk & Wydeman, 2011:117). It is essential that educators of multi-grade classes have knowledge of the philosophy, theory and practice of how to manage diversity in their classrooms which not only pertains to culture, interest and aptitude, but especially also to grade level. Multi-grade teachers must accommodate all the learners in their classrooms and by means of effective classroom management plan and implement learning experiences that respond to the differences in age, interest and aptitude of their learners as these differences are underscored by differences in grade levels.

Managing teaching and learning for classes with learners with diverse aptitudes and interests due to different age levels and different family backgrounds needs careful planning. For the purpose of this study on multi-grade teaching in the primary school context, and with reference to the work of Coetzee et al. (2011:40-43), the focus is on the following aspects of planning to create a learning environment that supports positive contact between teachers and learners in a multi-grade classroom context:

Planning resources

- Planning the physical classroom arrangement
- Planning time in the classroom
- Planning assessment
- Planning for diversity in the classroom
- Planning active learning in the classroom
- Planning the management of poor progress and barriers to learning
- Planning class work and homework

1.3 MOTIVATION FOR STUDY

The common assumption that multi-grade teaching takes place only in desolated rural areas is not correct. As a teacher who is teaching at a primary school in Tshwane, Gauteng, the researcher observed that many schools in urban and semi-urban environments are applying multi-grade teaching arrangements. Effective teaching strategies are needed for the successful management of all schools and especially for schools involved in providing teaching in multi-grade classroom contexts (UNESCO, 2015).

Multi-grade teaching and ways to improve school functioning that comprises of multi-grade classes has an effect on everyone in the specific school and eventually also on the entire education system (UNESCO, 2015). In a developing country such as South Africa, a negative attitude prevails amongst teachers and school principals towards multi-grade teaching, which negatively influences the management of schools with multi-grade classrooms (Brown, 2010:190). There are, for example, different interpretations of multi-grade teaching among researchers and educational practitioners, which causes confusion, ignorance and negativism about the multi-grade teaching phenomenon. In South Africa, the combination of different grade levels confirms multi-grade classes, but there is no policy regulating how and which grades are to be combined in one class (Brown, 2008; Mathot, 1998). With cognisance of this confusion and negativism with regard to multi-grade teaching, and in order to contribute to the discourse on multi-grade teaching for improved practice, the general aim of this study on multi-grade teaching is to investigate the effects of multi-grade

teaching on school management, teachers and learners so as to determine teaching and management strategies for optimal learning in multi-grade classrooms.

A first focus with this study on multi-grade teaching entails constructive strategies to accommodate effective teaching and learning in a multi-grade classroom. A second focus is on the importance and benefits of specialised teacher training for teachers teaching multi-grade classes. A third focus entails the challenges faced by educators teaching in a multi-grade classroom context and to examine how to change negative perspectives about multi-grade teaching.

1.4 PROBLEM STATEMENT

Multi-grade teaching is widely practised in South Africa, not only in rural areas but also in urban areas such as in Gauteng Province. In South Africa as a developing society with large learner numbers and insufficient human resources to teach these learners, schools are turning to multi-grade classes to answer to the demand for a basic education as a human right for all children. The implication is that learners who do not receive quality education in primary schools due to multi-grade teaching that is not properly provided due to a lack of teacher training for this context do not have the foundation for further development (UNESCO, 2015). The lack of proper teaching in a multi-grade classroom impacts negatively on learners' potential for optimal development in secondary schools and eventually on their access to and success in the institutions of higher education. Optimal learner development within a multi-grade teaching context relies on support from curriculum planners and the education sector as a whole.

A main research question flowing from this condition pertains to the following:

 How can learner development in a multi-grade classroom be managed effectively?

In order to find answers to this question, the main research question was divided into three sub-questions that were investigated first so that the solution to these subquestions could contribute to the solution of the main research question.

The following sub-questions were deduced from the main research question:

- What are the main challenges teachers and school principals face in school environments with multi-grade classroom contexts?
- How can teachers teaching multi-grade classes benefit from specialised training in multi-grade teaching?
- What strategies can teachers teaching multi-grade classes use to ensure optimal learning?

1.5 AIMS OF THE STUDY

Achieving excellence in teaching and learning in a multi-grade teaching context is a challenge for educators and school principals (UNESCO, 2015). However, it is the responsibility of teachers and school principals with their school management teams to address the needs of all learners in the quest for quality education for all. Within a multi-grade teaching context this requires appropriate measures to ensure that learners develop optimally. For this reason, an investigation into the use of effective management and teaching strategies for teaching in a multi-grade teaching context to ensure optimal learner development constitutes a meaningful study.

The aims of the study included the following:

- To determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts.
- To determine the importance and benefits of specialised training for teachers teaching multi-grade classes.
- To develop strategies for teachers teaching multi-grade classes to ensure optimal learner development.

1.6 RESEARCH METHODOLOGY

In order to find answers to how strategies for the effective management and teaching of learners in a multi-grade classroom context can lead to optimal learner development, both a literature study and an empirical investigation were conducted.

1.6.1 Research approach

The literature study serves as basis for conducting the context specific empirical investigation. By determining the benefits of effective classroom management and teaching strategies for a multi-grade teaching context to ensure optimal learner development, the literature study summarises the 'what' and 'how' of the roles that teachers, school principals, school management teams and the Department of Basic Education (DBE) play in establishing quality education in school environments with multi-grade classroom contexts. The literature study emphasises that the implementation of effective classroom management strategies and the specialised training of teachers involved in multi-grade teaching contribute to the quest for quality education for all.

A qualitative research approach was employed as the best option for the collection of relevant data to answer the research question. A qualitative research approach was chosen because the researcher wanted to gain a deep understanding of the phenomenon under study (McMillan & Schumacher, 2010:214), namely the effective management of learner development in a multi-grade classroom context.

1.6.2 Selection of sites and participants

Gauteng, one of the nine provinces in South Africa, is divided into five regions or municipalities (Statistics South Africa, 2011). The West Rand District Municipality is located in the west of the Gauteng Province. The West Rand extends from Randfontein in the west to Roodepoort in the east and includes the town of Krugersdorp (Statistics South Africa, 2011). Gauteng West formed the area of focus for this study on managing multi-grade teaching.

Two primary schools from the Gauteng West district were selected as research sites. Initially it was planned to visit three schools; however, violent protests in the Hekpoort area where one of the schools was located made it impossible for the researcher to access the area. The particular school was also closed for one week due to the unrests. These schools were selected on the basis that they are involved in multigrade teaching and they were accessible to the researcher. The researcher purposefully chose participants who were information rich in the sense that they are principals, HoDs (Heads of Department) and teachers managing and teaching multigrade classes. The participants were purposefully selected on the basis of serving a particular purpose as experienced role players in a multi-grade teaching context and could provide meaningful information for a deep understanding of the effective management and teaching of multi-grade classes for optimal learner development.

Therefore, for the purpose of this study on multi-grade teaching, purposeful selection related to an involvement in multi-grade teaching and a record of applying effective management and teaching strategies to ensure optimal learning in multi-grade classroom contexts. Participants meeting these criteria were the two school principals of the selected primary schools in Gauteng West because of their involvement in the management of multi-grade teaching and their successes with the implementation of strategies to ensure optimal learning in multi-grade classrooms. Four educators, two at School 1 and two educators at School 2, were selected as participants. At each research site one educator in the foundation phase and one educator from the intermediate phase were selected as they were in charge of managing and teaching multi-grade classrooms on a daily basis by coordinating classroom activities and the needs of learners from different ages. Two HoDs from each research site, one from the Foundation Phase and one from the Intermediate Phase, who were managing and supporting the educators teaching in multi-grade classes and who represented good examples of successful teaching and learning, were identified as participants. The total number of participants selected at School 1 to participate in the study was five and the total number of participants selected at School 2 to participate in the study was five. A total of ten participants took part in the empirical investigation.

1.6.3 Data collection

Based on a qualitative research approach of obtaining complex and textual descriptions of how people experience certain aspects of life, most common research methods used are participant observation and in-depth individual and focus group interviewing (Cohen, Manion, & Morrison, 2011:34,35). These three research methods were used to collect data for answering the research questions.

Observation

A total of four selected teachers at the research sites were observed in their classrooms with the observation focusing mainly on teaching methods and classroom management strategies. The observation of these actions was carried out with reference to a researcher's journal representing a checklist of approaches, attitudes and actions followed in the classroom during the lesson. Documents such as teacher files and lesson plans were used to supplement the observation actions.

Focus group interviewing

An advantage of focus group interviewing is the fact that it is possible to conduct these interviews within a relatively short period of time (Kroll, Barbour, & Harris, 2007). Financial costs are limited and probing for more information is easily applied as participants are exposed to each other's perceptions and opinions which serve as encouragement to share thoughts and beliefs on the matter under discussion. In line with the work by Cohen et al. (2011:37) and as a flexible technique for data collection, unanticipated issues were explored with focus group interviewing which allowed for participants to build on the responses from others, with the effect of the researcher gaining a deeper understanding of the studied phenomenon.

Focus group interviews are effective in eliciting data on the cultural norms of a group and in generating broad overviews of issues of concern to the cultural groups or subgroups represented. (McMillan & Schumacher, 2010:201). The focus group interviews with this study on multi-grade teaching pertained direct interactions with

school principals, HoDs and educators representing a multicultural environment at school where multi-grade teaching is practised. At School 1 the participants were from Zulu, Xhosa and Setswana backgrounds and at School 2 the research included participants from English and Afrikaans cultures. Learners from School 1 were also from various African cultures, and many different languages are used by the educators to communicate with learners. Bennett (2003) argues that educational excellence in schools cannot be achieved without educational equity. Equity in education means equal opportunities for all learners to develop to their fullest potential. The classroom setting is a very important aspect for representing the teacher's understanding of multicultural education. An environment that is rich in possibilities for exploring gender, race/ethnicity, and cultures sets the scene for practicing multicultural education. The environment also shows children what a teacher considers important or not important. Thus, creating an environment that acknowledges diversity, is an important step for implementing multicultural education to promote optimal learning in the multicultural multi-grade classroom.

The data collected from focus group interviewing enabled new concepts to form and provided new ways to solve the problems relating to multi-grade teaching which the researcher would not have obtained with the same efficiency if another data collecting instrument were used (McMillan & Schumacher, 2010:202).

The school principal, two HoDs and two teachers per research site were subject to focus group interviewing. One focus group interview was conducted at each selected school. The focus group interviews with the participants were focused on determining the main challenges they experience with their managing and teaching of multi-grade classes and to get insight into the constructive techniques they apply to ensure optimal learning in their multi-grade classrooms. The two focus group interviews were arranged at a place and time convenient to all the participants.

Individual interviewing

Individual interviewing is normally used to gather in-depth information from those individuals specifically affected by a particular programme or project, its context, implementation, results and impact (Kvale & Brinkman, 2008:23). The researcher conducted individual interviews with the two school principals from the selected schools to find out what the challenges and benefits of multi-grade teaching are, how they, as executive leaders of their schools, foster positive attitudes to multi-grade teaching and what the structures are for effective school management and school functioning within a multi-grade context. With the permission of the Department of Basic Education, the school principals were interviewed at their schools according to their own time schedules. Two individual interviews were accordingly conducted.

1.6.4 Data analysis

Based on the fact that data analysis involves an inductive process of organising data into categories and identifying patterns in order to interpret meaning and construct relevant answers to postulated research questions (McMillan & Schumacher, 2010:364), the data that was collected were analysed using the five-step framework data analysis process by Lacey and Luff (2009). The first step involved the researcher familiarising herself with the transcripts of the collected data, followed by the second step of identification of the thematic framework, which entailed the recognition of emerging themes. The third step involved the use of numerical or textual codes to identify specific pieces of data which corresponded to different themes. The fourth step, known as charting, involved the creation of charts of data based on the headings from the thematic framework, so that the data could easily be read across the whole data set. The final step involved the analysis of the most salient characteristics of the data through mapping and interpretation. This enabled the generation of a schematic diagram of the phenomenon under investigation, thus guiding the interpretation of the data set (Srivastava & Thomson, 2009:74).

1.6.5 Trustworthiness/transferability

Trustworthiness refers to the extent to which the data obtained in the study are plausible, credible and trustworthy (McMillan & Schumacher, 2010:330). The strategies outlined in Table 1.1 were employed to ensure the trustworthiness of this research on multi-grade teaching.

Table 1.1: Strategies to ensure trustworthiness

Strategy	Description
Prolonged and persistent fieldwork	Two weeks of fieldwork, collecting data
	which allowed interim data analysis and
	verification, to verify correlation between
	findings and participants' reality.
Persistent observation	A search for evidence to confirm the
	data obtained by means of interviews.
	Data obtained by means of interviews
Triangulation	and observations.
	Quotations of participants were
Participant verbatim language accounts	obtained by means of interviews.
	The use of an audio recorder ensured
Mechanically recorded data	complete and verbatim capturing of
	interview data.
	Informal checks for accuracy were
Member checking	made with the participants during data
	collection.

(Adapted from McMillan & Schumacher, 2010:330)

The researcher selected trustworthy evidence for findings by qualitatively assessing solicited data versus unsolicited data, acknowledging subtle influences among participants partaking in focus group interviewing, and determining repetitive responses as saturation with individual interviewing to confirm the accuracy of the sources and distinguishing between the relevant and vague statements (McMillan & Schumacher, 2010:348). With regard to this study on multi-grade teaching, the researcher kept an open mind throughout the individual and focus group interviewing process that accommodated the possibility of different meanings attached to the same reality.

1.6.6 Ethical considerations

Ethics provide guidelines for planning and conducting research in such a way as to protect the rights and welfare of the participants involved in the research (McMillan & Schumacher, 2010:134).

With reference to the work of McMillan and Schumacher (2010), Lacey and Luff (2009) and Strydom (2005), the following ethical issues were adhered to with the empirical part of the study on multi-grade teaching:

- Ethical clearance for the study was approved by the Research Ethics Committee of the College of Education at the University of South Africa.
- Written permission was obtained from the Gauteng Department of Education to conduct the research in selected schools in Gauteng West.
- Confidentiality, anonymity and privacy of participants and research sites were respected.
- The researcher was as open and honest with all participants as possible and participants were clearly informed about the reasons for undertaking the research and the aims of the study. This ensured full cooperation from all participants.
- Consent of all participants was sought. This included that information was provided on the research aims, the research process and the use of data with the study. Consent forms were provided to be completed by all participants.

The consent forms included information specifying the right of participants to withdraw from the research at any point in time, and confirming that data that were collected from participants were anonymously used for research reporting only.

 Data such as interview recordings and transcripts and observation lists were stored securely.

1.7 CONCEPT CLARIFICATION

The following concepts relating to this study on multi-grade teaching are defined and explained:

1.7.1 Multi-grade teaching

The term "multi-grade teaching" is not universal, but the practice is widespread. Multi-grade teaching refers to settings where one teacher is responsible for teaching children of different grade levels at the same time, in the same classroom. It is not a new idea, but it now calls for a much broader operational and technical definition to address problems and issues facing most educational systems, especially in Africa (Joubert, 2010:58).

For the purpose of this study, multi-grade teaching refers to a classroom where two or even more grade levels are taught during one time-tabled period in the same classroom in a multicultural context in a semi-urban setting. Schools can make a significant difference to respect for diversity by helping learners to construct an understanding of different cultures, respect for differences, and at the same time, overcoming racial and ethnic barriers (Pattnaik, 2003:207).

1.7.2 School principal

The prime task and responsibility of the school principal remains the management of all aspects of the school in such a way that it contributes to the actualisation of effective teaching and learning. School principals are the managers of complex organisations in which individual teachers as professionals enjoy a significant extent of autonomy in

the classroom (Kruger, 2006). The climate and culture of a school forms the cohesive factor for focusing teachers' activities on effective teaching and learning. Effective school management therefore implies that school principals apply their management and leadership practices in such a way that teacher autonomy can arrange for optimal learner development in the classroom environment (Kruger, 2006).

1.7.3 Management

Management is broadly defined as the attainment of organisational goals in an effective and efficient manner through planning, organising, leading and controlling organisational resources (Smith, Cronje, Brevis & Vrba, 2007:9). In line with the findings of Fuller (2000:11), the management of multi-grade teaching arrangements in primary schools requires a dedicated application of all these managerial skills to ensure a productive process.

1.8 ORGANISATION OF STUDY

The study is divided into five chapters.

Chapter one

The first chapter comprises an orientation to the study. This includes aspects such as the preliminary literature review from which the research questions logically flow and from which the research aims are deduced. A succinct but clear explanation of the research methodology and research design for the empirical investigation are also addressed in chapter one.

Chapter two

Chapter two is devoted to a literature review on the effective management of multigrade teaching for optimal learning, and how certain strategies are implemented to improve learner development in a multi-grade classroom context. These discussions are preceded by a discussion of the theoretical framework underlying the study and which was used to interpret the research findings.

Chapter three

Chapter three is devoted to a discussion of the research design and research methodology employed to collect data with the empirical investigation. Matters that are discussed include the choice of research paradigm and research approach, data collection techniques, the sample of the study and the procedure that were followed to analyse and interpret the collected data in order to find answers to the research question.

Chapter four

In this chapter, the research findings with the empirical investigation are discussed. This implies that the analysed data are interpreted and integrated to represent meaningful answers to the research questions.

Chapter five

Chapter five is devoted to a summary of the findings from the empirical investigation and the findings from the literature review. Conclusions are drawn, and recommendations are made. The aim of this chapter is to provide strategies for the management and teaching of multi-grade classes so as to ensure optimal development of each learner within the multi-grade classroom context.

1.9 SUMMARY

Some educators are sceptical about multi-grade teaching because they have fixed patterns of doing things resulting in unsuccessful outcomes and not achieving the best results. Optimal learning in any classroom, and in this case the multi-grade classroom, is dependent on all stakeholders, including even the teachers with negative perceptions on the success of multi-grade teaching. The Department of Basic Education, together with teachers teaching multi-grade classes, school principals, members of the school management team, learners and parents must work as a team to establish multi-grade teaching as an educational approach in its own right in South Africa. It is essential because multi-grade teaching in many schools in South Africa is

not a pedagogical choice, but a pedagogical necessity to allow the youth of today the opportunity for optimal achievement and growth.

CHAPTER TWO

THE NATURE, ADVANTAGES AND CHALLENGES OF MULTI-GRADE TEACHING

2.1 INTRODUCTION

Chapter 2 commences with a discussion on the definition of the term 'multi-grade schools' and further extends to factors that lead to the effective management of classes where multi-grade teaching takes place. Factors commonly leading to the development of schools with multi-grade classes are also addressed with all discussions treated from both a national and an international perspective.

The focus is on schools with multi-grade classes in urban communities, specifically schools with multi-grade classes in the Gauteng West district of South Africa. Some arising problems that educators teaching these multi-grade classes encounter is focussed on as well as strategies that are used by educators and school managers to manage a multi-grade classroom efficiently. The type and extent of support provided by the government in terms of teacher training, curriculum management and resource provision are also addressed. In conclusion, the focus is on what is known about the effective management of multi-grade classrooms to ensure good quality education.

Multi-grade teaching is perceived as an alternative system for ensuring that all learners receive quality education irrespective of their geographical context (Ames, 2004). This relates to the right to quality education as enshrined in the South African Constitution. The training of teachers teaching in multi-grade classrooms is, however, a challenge and is a controversial issue because teacher training for multi-grade teaching demands training for pupil learning that occurs at various levels and in diverse fields representing pupils from differing contexts. In this regard, South African teachers feel isolated and neglected by the Department of Basic Education (Taole, 2014:95) with their isolating conditions of work being exacerbated by the poverty of the communities who are served by schools engaged in multi-grade teaching arrangements and which serve to reinforce teachers' negative attitude towards multi-grade teaching (Ames, 2004). Furthermore, teachers are not prepared for the realities of multi-grade

teaching that they find in their classrooms, but which they must cope with because that is what is expected of them.

Brown (2010:193) states that multi-grade teaching is an under-researched area in South Africa with the exact number of schools involved in multi-grade teaching unknown. This study on multi-grade teaching focuses, therefore, on analysing the existing practice of multi-grade teaching in South African schools to suggest strategies for optimal learning in a multi-grade teaching context. In this regard, the study contributes to an awareness of the importance of multi-grade pedagogy.

2.2 A SITUATIONAL OVERVIEW ON MULTI-GRADE TEACHING

In most education systems worldwide, formal education is imparted in a mono-grade teaching environment, where one teacher is responsible for a single learner grade within a timetabled period. Although this is the general norm, in many countries there are schools in which all classes function as multi-grade classes, known as 'fully multi-grade schools' (Ali, 2007). In other schools only some of the classes function as multi-grade classrooms known as 'partially multi-grade schools' (Ali, 2007).

Although multi-grade teaching occurs in many countries, few countries publish recent statistics on the prevalence of multi-grade teaching in their education systems (Little, 2001:481-497). For the year 2000 25.4% of all classes in primary education in England were classes where multi-grade teaching was practised. In France 34% of primary school classrooms were multi-grade classrooms in 2000 with 4.5% of these schools where multi-grade teaching was practised at single-teacher schools (Little, 2005:5). In Ireland 42% of primary school classes were multi-grade classrooms in 2001. In Norway 34% of all primary schools provided multi-grade teaching in 2000. In India 84% of primary school classrooms were multi-grade classrooms in 1986 with these primary schools having three teachers or less on their teaching staff (Little, 2005:5).

Many learners on farms and in rural areas in South Africa access basic education through schools that practise multi-grade teaching. Multi-grade schools are widely spread throughout the country. These schools are mostly found in rural areas where the infrastructure is often not well developed and where facilities are very limited and

influenced by poverty. These schools are far from towns and villages, in remote rural areas or on farms. In certain instances, these schools are located on private property owned by farmers or churches. According to the Report on the 2014 Annual Survey for Ordinary Schools, there are approximately 5 153 public schools with multi-grade classes in the system as indicated in table 2.1.

Table 2.1: 2014 Annual Survey for Ordinary Schools

	PROVINCE	PRIMARY	COMBINED	SECONDARY	TOTAL
		SCHOOLS	SCHOOLS	SCHOOLS	NUMBER
					OF
					SCHOOLS
1	Eastern Cape	1008	758	45	1811
2	Free State	282	30	4	316
3	Gauteng	33	1	0	34
4	KwaZulu-Natal	877	176	80	1133
5	Limpopo	591	50	35	676
6	Mpumalanga	245	57	23	325
7	Northern Cape	138	10	1	139
8	North West	318	21	37	376
9	Western Cape	303	39	1	343
	TOTALS	3795	1142	226	5153

Source: Annual School Survey 2014 (Number of ordinary schools having multi-grade classes by province)

Studies on multi-grade teaching generally report the lack of preparedness of teachers for multi-grade settings (Mulryan-Kyne, 2007; Lingam, 2007; Little, 2005). Joubert (2007) indicates that in African countries governments tend to focus on improving conventional schools, often leaving the development of multi-grade schools to local initiative, which often means that only workshops and other ad hoc sessions are provided for training educators to teach in multi-grade classes. Pre-service and inservice education and training for teachers on the needs of the multi-grade class are vital (Little, 2005). For teachers teaching multi-grade classes to be effective in their teaching tasks, they must be trained for the specific teaching conditions (Lingam,

2007; Mason and Burns, 1997) with a need for on-going professional development to enable them to sustain their effective teaching in multi-grade contexts (Chandra, 2004). Teacher education programmes can therefore not continue to have a dominant focus on mono-grade teaching while multi-grade teaching is also practised in schools (Brown, 2008:49).

The South African Constitution declares the right of children to basic education. To this end the Department of Basic Education (DoE) committed itself to ensure that the number of learners enrolled at primary school increased to 85% for the school year of 2015 (DoE, 2005). This endeavour was laudable, but appropriate measures were also needed to ensure that these learners received quality education in the multi-grade classroom environment (Ames, 2004).

2.3 MULTI-GRADE TEACHING: A CONCEPTUAL FRAMEWORK

According to Kyne (2005:1), in South Africa, as in other parts of the world, the main structure for arranging classes in the formal school system is by grouping learners of the same narrow age band into the same grade. This arrangement is known as the single-grade structure (Kyne, 2005:1). The single-grade arrangement is well established at all levels of mainstream schooling in South Africa and has had a profound influence on many aspects of schooling and school processes such as the way the curriculum is designed, and the way learners are taught and assessed (Brown, 2007; Little, 2005). Little (2005) states that a single-graded classroom arrangement is the most favoured arrangement among teachers. But whilst the school system is predicated on 'gradedness', very large numbers of learners and teachers in mainly primary schools in rural and semi-urban areas such as in commercial farm and township schools in different provinces in South Africa engage in teaching and learning in classes that are multi-graded (Joubert, 2007). Multi-graded classrooms are classes where two or more official grade levels are combined (Little, 2005:1). Learners learning in a multi-grade class thus retain their grade designation and specific grade level curricula.

2.3.1 The nature and characteristics of multi-grade teaching in multi-grade classrooms

The definition of multi-grade teaching is interpreted differently by different researchers. With this study on multi-grade teaching the focus is on multi-grade teaching as practised in multi-grade schools and how school management facilitate optimal learning by introducing strategies to support multi-grade teaching and learning. Multi-grade schools are defined as schools that have multi-grade classes and where multi-grade teaching occurs within a graded system of education where a single class contains two or more learner grade levels and are taught by one educator (Little, 2005).

This definition for multi-grade teaching concurs with the interpretation of many authors. Joubert (2007:5), for example, regards multi-grade teaching as settings where the teacher is responsible for teaching learners of various grade levels simultaneously. Kamel (2010:127) indicates that multi-grade teaching is a situation where learners belonging to two or more grades or levels of ability are educated together in one class, but not at the same time. According to Mulryan-Kyne (2007:554) a multi-grade class comprises of two or more grade levels for which one teacher is given responsibility. A similar definition is given by Hargreaves (2001:554) stating that a multi-grade class is where one teacher has responsibility for two or more grade groupings of children at the same time. The responsibility of the educator to manage the process is a common factor in all the above definitions.

Jordaan and Joubert (2008:2) define multi-grade schools as typical schools which have one or two teachers only which results in classes that are heterogeneous in both age and ability. These kinds of schools are suitable for poor countries with low primary school coverage and meagre provision of quality schooling in these countries' rural area settings. Educators in multi-grade classes are not only faced with teaching two or more grades in one classroom, but they also have to teach four or more subjects to these different grade levels depending on the needs of the particular school.

Many international studies point to the advantages of various forms of external support in providing effective multi-grade teaching (Joubert, 2008). Brown (2010:19) argues that, for multi-grade teachers to be more adaptive and active, they should first

understand epistemology or the theory of knowledge of multi-grade teaching, as the epistemology is already influencing areas of activity in the domain of research on teaching and learning. It is argued that multi-grade teachers need both internal and external support (internal support relating to support within the school and external support to support from outside the school), and urges the communities in which multi-grade schools are located to be involved in school affairs.

Little (2005:16) argues that pre-service and in-service education and training for teachers on the needs of the multi-grade class are vital. For teachers teaching in a multi-grade classroom to be effective in their teaching tasks, they should be trained professionally (Lingam, Mason & Burns, in Brown, 2010:56). In addition, Chandra (in Brown, 2010:56) emphasises the need for on-going professional development of teachers to enable them to be at the forefront not only of pedagogical techniques, but also of school curriculum and communications technologies. For this to happen, teacher training should openly address the context-specific needs, diverse as they often are, of multi-grade teachers. Vinjevold and Schindler (1997:18) suggest that the types of support that are required are community support, local or regional government support, national policy support, and support from school principals.

Multi-grade teachers are expected to implement a mono-grade curriculum within a totally different context, and these teachers also have to deliver in the same manner as their monograde colleagues (Brunswic & Valérien, 2004; Little, 2004). Training and support, specifically for teachers teaching in a multi-grade classroom, seem to be a major challenge (Brown, 2010). In addition, several infrastructural resource challenges exist (Gardiner, 2010; Jordaan & Joubert, 2008; Little, 2007), including lack of finances to support teaching and learning in the multi-grade classroom context (Juvane, 2005; Little, 2005; Tsolakidis & Constantinidi, 2006). According to findings from Mulryan-Kyne (2007:12) and Lingam (2007:53) the generally negative perceptions of teachers teaching in multi-grade classes about their work can be alleviated by the provision of better formal training and didactical resources. Trained teachers have a better grasp of subject knowledge, pedagogy and classroom practices than untrained teachers (Hammond, 2005:9).

Many in-service training programmes embrace a cascade training model of dissemination (Little, 2005:16). Brown (2010:56) argues that the cascade model is an approach often adopted by African countries – as evidenced by a technical workshop attended by practitioners from six African countries that was organised in Uganda in November 2004 to test new modules for multi-grade teaching. In July 2005, Tanzania hosted a similar workshop for the first time, attended by eleven countries that were represented by policymakers, curriculum developers, educators and teachers. This was followed by a workshop in Lesotho in 2007. The major discussions, according to Juvane (in Brown, 2010:56), were on issues relating to the training of multi-grade teachers. In other words, efforts to address multi-grade teaching at the level of teacher training are only at a discussion stage in most African countries.

In Namibia, for example, the teacher education institutions in the country make no provision for separate training for multi-grade teaching (MoE, 2011a:13). Hence the training of multi-grade teachers was considered during the revision of the Education Theory and Practice (ETP) course for the Basic Education Teacher Diploma (BETD). The biggest challenge lies in the adequate preparation of teachers for multi-grade teaching (MoE, 2011a:13).

In countries such as Finland, teachers are trained during pre-service training as how to handle multi-grade teaching because multi-grade teaching is incorporated in the curricula and is already embedded in teacher education curricula (Brown, 2010:55). In Vietnam, multi-grade teachers are trained to give different lessons to learners at different grade levels at the same time (Pridmore in Brown, 2010:55). Specific modules on multi-grade teaching are integrated into the teacher education and training programme in Sri Lanka.

In South Africa, a Multi-grade Strategy and Basic Education Sector Plan was implemented. The Action Plan to 2014 - Towards the realisation of Schooling 2025 - reiterates that multi-grade schools are prevalent in the South African education system and that multi-grade schools exist in all the provinces of the country. The Action Plan also indicates that 13% of learners find themselves in multi-grade schools. According to the Action Plan, teachers who do multi-grade teaching need special guidance on the curriculum and with the in-service training they receive. The research emphasised

the importance of improving the quality of education in the multi-grade schools, focusing on aspects like quality of teaching, teacher training and support, and improving infrastructure of rural schools.

The organisation of the curriculum has implications for multi-grade teaching. The curriculum is normally organised based on the assumption of mono-grade teaching with the topics arranged in a hierarchical progression with increasingly advanced material taught to older grades. The Curriculum and Assessment Policy Statement (CAPS) does, for instance, not give much guidance to multi-grade teachers on how they can approach the curriculum in order for them to be able to effectively mediate it in their multi-grade classes. According to Jordaan and Joubert (2008:7), the Cape Peninsula University of Technology (CPUT), in an effort to respond to the Action Plan, initiated and implemented a number of actions. One of these initiatives was the design and implementation of a university accredited course (40 credits) specifically aimed at teachers teaching in multi-grade classrooms in rural settings. This course was offered and about 900 teachers from rural multi-grade schools enrolled and completed the course. This was the first time that teachers were trained especially for multi-grade teaching and received accreditation for that training in South Africa. The demand for further study and skills improvement specifically related to multi-grade education was so overwhelming that other courses in advanced teaching was developed, resulting in 27 of these kind of courses that have been offered at different institutions of higher education in South Africa since 2004 at CPUT. Although the Action Plan to 2014 recognises that teachers who do multi-grade teaching need special guidance with the curriculum and the in-service training they receive, it is still a work-in-progress situation.

2.3.2 The nature and characteristics of multi-grade schools

Multi-grade schools as schools where more than one grade is taught in one class represents the combining of different grades in one classroom depending on the number of educators available at the specific school (Little, 2005). In schools with only two or three educators, three to four grades may be combined in one classroom.

According to Kruger and Steinmann (2003:14) school climate is the quality and frequency of interactions between all the stakeholders involved in the school. School culture, on the other hand, is the belief system or values of those stakeholders. School climate may be seen as those interactions that underpin the school culture, which include typical patterns of activities that are characteristic of the functioning of a particular school. The culture of the school is reflected in its climate. The climate, in turn, reflects the quality of the interactions, and they are interrelated because the way in which things are done influences the quality of the interactions.

School climate can be observed in all aspects of the school. It is seen in the nature of the work and the people, in the architecture of its buildings and environment, and also in its history and culture. It is evident in the organisational structure and the management and leadership style. Interpersonal relationships reflect the school's climate in attitudes, motivations and academic achievements of all the people who work there. It is therefore clear that there is a relationship between the general climate of the school and the climate that exists in each of the classrooms (Kruger & Steinmann, 2003).

Contrasting features of multi-grade schools are over-crowded classrooms and schools with low learner enrolment (Joubert, 2010). In the case of low learner enrolment, schools are unable to provide adequate curriculum choices while in over-crowded classrooms teachers struggle to attend to individual needs. Often teachers in multi-grade schools with a limited staff establishment are required to teach classes that extend beyond two grades and sometimes across phases. According to Brown (2010) the teachers who teach in these schools also face a unique challenge in the sense that most of them have been trained only in mono-grade pedagogy and lack the knowledge and skills to deal effectively with multi-grade classes. In order to improve the quality of education in multi-grade schools, teachers serving in these schools need to be supported in terms of training in multi-grade teaching.

The effectiveness of schools does not depend merely on aspects such as more resources, better curriculum programmes and improved buildings, but it also depends on the nature of the school climate, school culture and time management of school stakeholders (Kruger & Steinmann, 2003:14). According to Werner (2005:24), the

function of school culture can create a corporate identity that distinguishes one school from another, and as a result it gives members of the school an identity. Identifying with the school creates greater commitment to school goals and objectives. School culture guides educators and learners in terms of acceptable behaviours and attitudes, especially in relation to time management, decision-making and solving problems. School culture creates social system stability with associated emotional security and it serves as a yardstick for evaluating and correcting deviant behaviours and for rewarding desired behaviours.

Little (2005:7) argues that multi-grade teaching is essential in relation to the education for all (EFA) goal of access to education and the Millennium Development Goals (MDGs) that are considered to fight poverty. For millions of children who mostly live in economically underprivileged areas, multi-grade classes are the only effective way to access education. A number of studies have described the psychological benefits of grouping learners of different chronological and developmental stages in a single class (Marshak, Pratt, Buston & Way, in Vinjevold & Schindler, 1997:10). Buston (in Vinjevold & Schindler, 1997:10) for example, argue that multi-grade classes are a means of providing continuity between home and school with a minimum of psychological and emotional shock. In most instances in multi-grade classes learners from the same family sit together in one classroom, which creates an atmosphere of harmony.

The use of multi-grade classroom strategies at schools close to rural communities may provide additional benefits beyond simply making access easier. Proximity to a school is likely to have particularly beneficial impacts on orphans. In countries afflicted by the HIV/AIDS pandemic, there is an increasing incidence of orphans. Orphans are less likely to participate in schooling (Evans and Miguel, 2007), are often forced to drop out of school, and are more likely to repeat grades (Bennell, 2003). Orphans run a greater risk of being marginalised when dealing with the education system. With the rising incidence of child-headed households, orphans are required to spend more of their time in income generating activities. Where parents are ill, children in HIV/AIDS affected households are often engaged in provision of care. Distance to school is likely to increase the economic opportunity cost of school attendance, reduce the

ability to provide sufficient care for ill relatives, and increase the sense of marginalisation from school management.

Many children in low income countries start school late. This has a series of detrimental consequences, including missing the optimum age for learning, working with curricula designed for young children (older age at the end of primary school), increasing opportunity cost of schooling, and less likelihood of progression to secondary school. Distance to school is a major factor in 'late enrolment', as children are perceived to be too young to walk to the school. Rural children are more than twice as likely to start school late as their urban counter parts. Schools involved in multigrade teaching that cater for rural communities, can help reduce the incidence of 'late enrolment' Joubert (2010).

Girls are particularly vulnerable if they are required to walk excessive distances to the nearest available school (World Bank, 2003). Having a school built closer to learners' residences may help overcome some of the conditions that make it more difficult for girls to attend school. Schools where multi-grade teaching takes place can address some of the shortcomings found in sub-Saharan African schools. Providing an education at minimal distance from home may help increase learners' attendance and maximise the time available for other activities (such as domestic duties or income earning activities) that may otherwise draw the pupil away. There are several challenges which teachers teaching in schools offering multi-grade teaching experience. These challenges need to be addressed for the success of multi-grade teaching, which depends on the determination and support by different stakeholders, rather than solely on the efforts of the teacher.

The Report of the Task Team for the Review of the Implementation of the National Curriculum Statements (DoE, 2010:60) highlights that there is lack of policy guidance for multi-grade teachers. Issues such as managing diverse content at different levels are problematic for these teachers. Brown (2010:194) emphasises that in the multi-grade teaching setting, although learners of different grades comprise one class, learners must pursue grade-appropriate curricula. Lingam (cited by Brown, 2010:194) identifies this requirement as the biggest challenge of multi-grade teaching because it demands that the structure of the curricula, the learning resources and assessment

strategies employed in the multi-grade teaching, and the learning process take on a new shape and form from that of the single-grade situation. According to Taole and Mncube (2012:160), this suggests that learners are treated the same even though they are of different grades. Ames-Ramello (cited in Brown, 2008:35) observed that using mono-grade curricula in multi-grade teaching was not only time-consuming, but it also resulted in ineffective classroom instruction. According to Jordaan and Joubert (2008:7), there is a small existence and very little interest in multi-grade education on a global scale, and South Africa is no exception. Schools with multi-grade classrooms are typically regarded as being second-rate schools, schools that parents would not like their children to enrol with. Kyne (cited by Brown, 2008:35) points out that the instructional materials also tend to be written for the mono-grade classroom. Consequently, these materials are produced as grade-level textbooks and are designed to be delivered by the teacher to the children. Brown (2008) indicates that there is evidence to suggest that such materials are ineffective in multi-grade teaching.

Taole and Mncube (2012:160) also point out that classroom management is another problem with regard to multi-grade teaching. It was observed that, while the educator is busy with one group, the other group(s) would be busy with a task to complete. This task will then be completed without the educator's input or supervision. In most instances, the learners do not even complete the tasks assigned to them. The teachers do not even ask learners about the task, as it was used solely to keep them busy while the educator was teaching the other group(s). Teachers indicated that they use the same amount of time to teach different grades in a class than one would use to teach just one grade. This, according to Taole and Mncube (2012:160), calls for training in time management for teachers who teach multi-grade classes.

2.3.3 The nature and characteristics of teachers teaching multi-grade classrooms

According to Carl (2009:14) educators must have at their disposal specific curriculum skills and knowledge which enable them to be effectively involved in the classroom and outside it. Teachers must be able to do micro-circulation within the classroom and become involved in curriculum development activities outside the classroom (Carl, 2009). An empowered educator must be involved in syllabus development, school

curriculum development, fuller subject curriculation and the development of the broad, national curriculum. This implies that the educator must not only be a mere implementer of the curriculum, but also a development agent, who is able to develop and apply the relevant curriculum dynamically and creatively. This will result in the teacher contributing to the development and the changing of the environment. This description of educators' task engagement relates to formal education carried out at schools which is preceded by obtaining specified professional training with related qualifications from an institution of higher education, such as a university or college. These professional qualifications include a combination of specialised subject area knowledge and the study of pedagogy as the science of teaching in order to competently convey subject knowledge effectively (Carl, 2009).

In many countries, the role and functioning of schools are changing and so is what is expected of teachers. Teachers are assigned to teach in classrooms that are increasingly becoming multi-cultural classrooms. Teachers are expected to place greater emphasis on accommodating learners with special learning needs in their classrooms (Joubert, 2010). Teachers must make more effective use of information and communication technologies for teaching and engage more in planning within evaluative and accountability frameworks (Carl, 2009). In this regard, schools must do more to involve parents in schools based on a joint accountability approach for effective learning.

No matter how effective pre-service training for teachers is, it cannot be expected to prepare teachers for all the challenges they will face throughout their careers. Education systems therefore seek to provide teachers with opportunities for in-service professional development to maintain a high standard of teaching and to retain a high-quality teacher workforce. The Organisation for Economic Cooperation and Development (OECD) conducted a comparative review in 2005 on the effectiveness of professional development for teachers. It was determined that for professional development to be effective, it must be on-going, include training and application in practice opportunities, and must consist of constructive feedback. Professional development opportunities must provide for adequate time for internalisation of obtained knowledge and skills and for follow-up support. Successful professional development programmes involve teachers in learning activities that are similar to the

activities they will use with their learners and encourage the development of teacher learning communities. There is growing interest in developing schools as learning organisations, and in ways for teachers to share their expertise and experience more systematically. The professional development of teachers beyond their initial training can serve a number of objectives. It can update individuals' knowledge of a subject relating to recent advances in the area. It can also update individuals' skills, attitudes and approaches with regard to the development of new teaching techniques and objectives, new teaching and learning circumstances and new educational research. Development of teachers beyond their initial training enables individual teachers to apply changes made to curricula or other aspects of teaching practice applicably and appropriately and it enables schools to develop and apply new strategies concerning the curriculum and other aspects of teaching practice.

2.4 THEORETICAL FRAMEWORK

With reference to the fact that a theoretical framework represents the theoretical lens for interpreting the research findings (Creswell, 2008:515), the theoretical framework for this study on multi-grade teaching is Bronfenbrenner's Ecosystemic Model of Child Development which is an integration of Ecological Theory and Systems Theory (Donald, Lazarus, & Lolwana, 2006).

This framework focuses on the explanation of systemic influences on child development. The development of learners is influenced by various features, which Bronfenbrenner divides into five subsystems: The microsystem which represents an individual's immediate context is characterised by direct, interactional processes such as familial relationships and close friendships (Bronfenbrenner, 1994; Duerden & Witt, 2010). The mesosystem comprises the interrelations between two or more settings in which the developing person actively participates. In terms of learners, this refers to relations between settings such as the home, school, neighbourhood and peer group (Bronfenbrenner, 1979:25). The mesosystem can therefore be described as a set of microsystems that continually interact with one another (Donald, Lazarus & Lolwana, 2010). The exosystem refers to one or more settings that do not involve the learner as an active participant, but in which events occur that affect, or are affected by, what happens in the setting containing the learner (Bronfenbrenner, 1979), for example,

school policies created by school governing bodies (SGBs) to provide for the needs of learners who experience barriers to learning in a multi-grade classroom setting. The macrosystem consists of the larger cultural world surrounding learners with underlying belief systems that direct government policies, political ideology, cultural customs and beliefs, historical events and the economic system (Bronfenbrenner, 1979; Duerden & Witt, 2010). The chronosystem represents the changes that occur over a period of time in any one of the systems (Donald et al., 2010).

2.4.1 Systems theory

In the context of this study on multi-grade teaching, and with reference to the ecological systems theory of Bronfenbrenner, schools with multi-grade classrooms are sub-systems of the Department of Basic Education with important components of these schools relating to the curriculum, educators, learners, parents, school managers and policies and legislation pertaining to schooling. All these different components of a school with multi-grade classrooms are in continuous interaction with each other.

With reference to the interaction of systems and sub-systems, this interaction occurs when whole systems interact with other systems around them, which, applied to the multi-grade school context, relates to when the National Department of Basic Education interacts with Provincial Departments of Education through policies, the curriculum and resource allocation (DoE, 2016). According to The Department of Basic Education Strategic Plan 2015 – 2020, patterns of functioning imply that all parts of a system influence the whole system in such a way that when something occurs to one section of the system, it affects all the other parts (DoE, 2016). The way these parts react form a pattern, which, with reference to multi-grade teaching, implies that if multi-grade teaching is poorly introduced to educators, it will be poorly implemented, and learner achievement will be negatively affected.

With regard to the cycles of cause and effect in Bronfenbrenner's systems theory, an action in one part of a system causes an effect on another part of a system in a cyclical way (Donald et al., 2010). The implication is that a lack of specialised training for educators involved in multi-grade teaching affects the way these educators organise,

plan and manage their teaching and learning processes. (Donald et al., 2010). Applied to this study on multi-grade teaching, if schools with multi-grade classrooms have been introduced to achieve the goal of providing quality education for all, lack of support and insufficient resources in these schools will increase the negative attitude towards these schools. With reference to goals and values as a component of Bronfenbrenner's systems theory, stated and underlying goals and values affect the system and are affected by the whole system and interact with other systems. Factors impacting the system are communication patterns, roles within the system, boundaries and time and development. Communication patterns occur between the system as a whole and outside systems, e.g. educators in schools with multi-grade classrooms communicate with the learners, parents, and educators of other schools and curriculum advisors as well as educational managers at all levels. The way people's roles are defined in a system is vital for the functioning of the whole system, e.g. if government does not provide training to educators teaching multi-grade classes and government officials fail to visit schools with multi-grade classrooms for quality assurance, then the challenges encountered by educators will never be known (Joubert, 2010).

There are clearly defined boundaries between the sub-systems and the whole system. The rigidity and flexibility of the boundaries affect the functioning of the whole system, e.g. each school with multi-grade classrooms belongs in a particular community, circuit, district, and province. The increase or decrease in learner enrolment in each school with multi-grade classrooms determines allocation of resources by government and, therefore, this will differ from school to school (Donald et al., 2010).

Human systems change over time and the occurrence of developmental changes influence the system as a whole, for example the changes in the education system brought about changes in policies, the curriculum, and allocation of resources to different schools in various communities.

2.4.2 Bronfenbrenner's ecosystemic model of child development

Bronfenbrenner's model of child development is based on the theory that the developmental process of a child is made up of four core dimensions, namely person

factors, process factors, contexts, and time. This theory also indicates that different social contexts in which learners find themselves in the school system interact in shaping the child's development. The theory states that proximal interactions are interactions that occur in close face-to-face long-term relationships with the child, such as the relationships with close family and friends, which are vital in shaping a child's development. Personal factors and social contexts within which these proximal interactions occur affect these sustained social interactions with the result that person, process and context factors change as time proceeds due to maturation and changes in social contexts (Donald et al., 2006).

Bronfenbrenner's ecological systems theory is based on the approach that the process of child development occurs inside three nested systems, namely macrosystems, exosystems and microsystems (Donald et al., 2006:41-42).

Microsystems are the systems that are involved with a child's proximal interactions with other familiar people such as a family member, a sibling or friend from the own peer group. These interactions serve as examples of the functioning of roles, relationships, and patterns and routines of daily activities that shape the holistic development of the child. If, for example, children lack support from their family microsystems, they may seek support and guidance from friends, neighbours, and educators.

The exosystem represents those systems in which a child has no influence, but which can influence his or her proximal interaction. An example of exosystem functioning in a child's life are the challenges faced by educators to implement curriculum changes that influence the quality of learning of the child in either a positive or negative way. Macrosystem functioning refers to powerful social and economic structures at work in the society in which the child is developing, for example, the allocation of human and financial resources to schools by the Department of Education which influences the kind of education provided to the child. As time changes, a child's relationships with the different people and groupings of people, contexts and the child's need of educator demand and supply also change (Duerden & Witt, 2010).

In the context of this study on multi-grade teaching, the teaching and learning situation is influenced by, for example, the socio-economic situation of the community, the family set-up, availability of resources at home and at school, values regarding achievement and perseverance and the level of support from the government. Bronfenbrenner's framework allows an exploration of multi-grade teaching as being about the development of systems and the development of individuals within these systems (Bronfenbrenner, 1979; Singal, 2006). By identifying the interconnectedness within and between these systems, it facilitates a better understanding of schools with multi-grade classrooms.

The theory of Bronfenbrenner on ecological systems functioning in the development of the individual child and the link between the macrosystems, microsystems and exosystems can be illustrated by Figure 2.1:

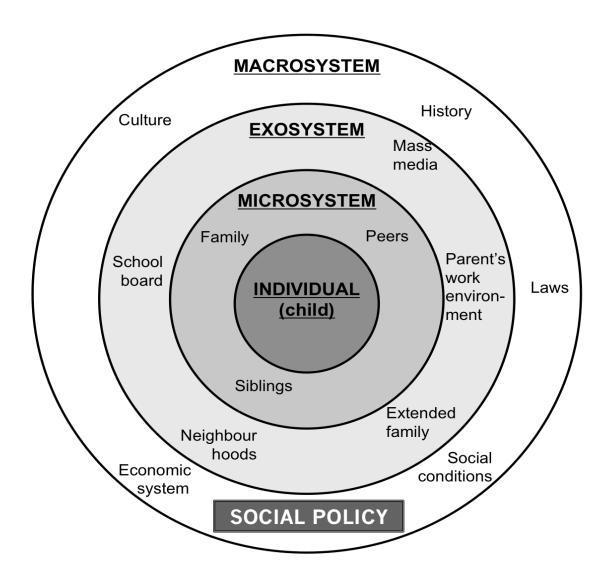


Figure 2.1: An outline of Bronfenbrenner's ecosystemic perspective of child development

2.5 EDUCATIONAL POLICY AND PRACTICE

Educational policy does not normally only reflect the ethos of the Department of Basic Education, but also offers clear guidelines for the formulation of school goals and practice. Broad educational and teaching policy often figure strongly in the school policy (Carl, 2009:176).

2.5.1 The professional development of teachers teaching multi-grade classrooms

Studies indicate that the success with regard to all dimensions of the educational process is primarily attributed to educators while the combination of other factors such as school management, content and organisation of curricula, and school facilities contribute a smaller percentage to overall success (Abu Russ, 2011; Enzi, 2007). Since educators are the cornerstone for success with reform and development initiatives in educational systems, the reform and development initiatives must be preceded by proper selection, preparation and training of educators.

Teachers who employ effective teaching methods and approaches are the key to achieve good quality education which is tightly associated with teachers who possess personal, technical and professional skills (Abu Russ, 2011; Enzi, 2007). The process of identifying the right training needs of teachers is the first step to plan suitable programmes for educators' in-service training opportunities, to the extent that the identification of these training needs is a necessity for every successful training process. Furthermore, the identification of teachers' training needs is the optimum means of specifying the extent of knowledge, skills, directions and experiences needed to promote development and to raise the professional competency of the educator (Carl, 2009).

Although training for educators teaching multi-grade classrooms is similar to the training for mono-grade classroom settings, there is no additional in-service training

for teachers teaching multi-grade classrooms. These teachers are therefore unable to cope effectively due to a lack of specialised skills and competencies needed for multi-grade teaching environments (Brown, 2008:81; Taole & Mncube, 2012:152).

2.5.2 Policy requirements and the job description of a teacher

Considering the role of teachers, they must be systematically empowered with regard to curriculum development to optimise the teaching and learning events in the classroom. This will improve learning outcomes and other learner experiences which may flow from these learning outcomes, thereby contributing towards developing learners' potential optimally. A teaching environment within which teaching occurs optimally is contingent on the teacher's adaptation abilities to the specific context and to the teaching approach of the teacher influencing the level and standard of teaching and learning engagement in the classroom. A teacher must pre-eminently be able to develop learners' potential optimally (Little, 2005).

With regard to the South African context and irrespective of whether educators are teaching mono-grade or multi-grade classrooms, their workload is prescribed by the policy requirements of the Employment of Educators Act 76 of 1998. The workload and core duties of teachers are categorised as duties during the formal school day and duties outside the formal school day.

2.5.2.1 Duties during the formal school day

Scheduled teaching time is one of the main duties of an educator during the formal school day. Extra and co-curricular duties such as coaching sport, field trips and managing cultural activities after school also form part of the formal school day duties of a teacher. Detention duty, scholar patrol and playground duty form part of the pastoral duties that are performed during the formal school day by educators.

Educators must also take full responsibility for administrative duties like collecting money for fundraising activities and recording the register of attendance of learners each day. Educators play a supervisory and management role towards learners throughout the formal school day. Professional duties like attending meetings,

workshops, seminars and conferences must also be adhered to by teachers on a regular basis. Planning and preparation of lessons and evaluation and assessment of learner progress are the responsibility of the educator.

2.5.2.2 Duties outside the formal school day

Planning and preparation of lessons and the evaluation and assessment of learner progress are key responsibilities of the teacher outside the formal school day. Some extra and co-curricular activities such as sport and cultural events will also take place after school hours. Professional development and further study are activities that the teacher pursue outside the formal school day in their own personal capacity.

Within the South African context, policies such as learner-teacher ratio and the redeployment and rationalisation of teachers contribute to the placement of educators in schools with multi-grade classes (Leman, 1999; Joubert, 2006). Blum and Diwan (2007) proclaim that educators and policy makers perceive the practice of multi-grade classrooms as a means by which the state is attempting to avoid its responsibility to employ enough teachers. Concerning the implementation of policy within different contexts, Jordaan and Joubert (2008:9) state that there is a huge difference with regard to the national and international education context and the functioning of international policies within the local context.

2.6 MULTI-GRADE TEACHING FOR OPTIMAL LEARNER DEVELOPMENT

Mulkeen and Higgins (2009:2) indicate that multi-grade teaching provides a viable mechanism to make education available for schools in or closer to small communities. Multi-grade teaching serves to address uneven grade distribution commonly prevailing in primary schools in low-income countries (Mulkeen & Higgins, 2009:2).

2.6.1 Developing excellence in schools

One of the most important issues that faces education in South African schools is the restoration of a sound culture of teaching and learning. In general, a culture of teaching and learning refers to a positive attitude of all the role players involved in the teaching and learning endeavour, and the presence of good quality teaching and learning processes in schools. Davidoff and Lazarus (1997:43) and Van Deventer and Kruger (2003) identify the following aspects of a sound culture of teaching and learning:

- All role players value the processes of teaching and learning
- Practices reflect a commitment to teaching and learning
- The resources needed to facilitate this process are available
- The school is structured to facilitate these processes

According to Van Deventer and Kruger (2003:4), common characteristics of schools with sound cultures of teaching and learning relate to sound classroom environments in which resources are applicably available and where there is order and discipline with a shared sense of purpose as arranged by sound instructional leadership. A sound culture of teaching and learning also relates to effective leadership, neat buildings and facilities, high professional standards among educators, and healthy relationships among all role players (Van Deventer & Kruger, 2003:4). Peterson and Deal (2009:11) identify the following important functions of school culture which have a direct bearing on the culture of teaching and learning and which are still relevant for the current situation in schools:

- The school's organisational culture can help to define staff tasks
- The organisational culture influences the commitment of educators to their teaching task in the isolation of the classroom
- School culture is cohesive by nature and binds the staff and learners in a common fate and vision
- School culture is directive by nature and plays an important role in decisionmaking in the school
- School culture determines behaviour and indicates proper and ideal behaviour for all stakeholders

The relationship between school climate and classroom climate is different for different groups of learners, depending on the age level. For example, junior primary school level learners do not differentiate very well between school climate and classroom climate because they spend most of their time in the same classroom. In a sense, they see the school as the classroom (Peterson & Deal, 2009:15).

As learners grow older, the differentiation between school and classroom become more distinct. The classroom becomes a separate place with a different identity from the school. At senior primary and secondary school level, learners go to different classes, with the result that there is a different sense of the school. The relationship between school climate and classroom climate varies with the age of the learners and also with the personality and teaching style of the educators. If several classrooms with positive classroom climates exist, this can contribute to a positive whole-school climate (Kruger & Steinmann, 2003:15).

Juvane (2007:3) emphasises that multi-grade teaching is often implemented as a necessity, rather than by design, to address educator shortages, especially in rural, hard—to-reach areas with small school enrolments. Multi-grade teaching maximises the use of scarce educational resources, assists countries to achieve Millennium Development Goals (MDGs) and Education for All (EFA) goals and to address educator absenteeism, particularly in the context of the HIV/AIDS epidemic (Juvane, 2007:3). In order to reach these MDGs and EFA goals, the contribution of multi-grade

teaching needs to be understood by curriculum planners and the education sector as a whole.

2.6.2 Support required at schools with multi-grade classroom settings

Taole and Mncube (2012) state that educators in multi-grade classrooms need special support with specific planning skills as these planning skills relate to teaching effectively in a multi-grade classroom setting. In order for this support to be feasibly provided, district officials must undergo intensive training on multi-grade teaching with multi-grade teaching being a separate section of the district office that deals with schools with multi-grade classroom settings (Taole & Mncube, 2012).

2.6.3 Multi-grade practice for optimal learner development

According to Berry (2001) there are five key areas which teachers teaching multi-grade classrooms are alert to and which are generally the focus of training packages for multi-grade teachers. These key areas encompass classroom management techniques, instructional strategies, planning based on the prescribed curriculum, instructional materials and the community.

2.6.3.1 Classroom management techniques

Managing a multi-grade classroom is difficult because there is more than one grade level in the classroom. Hence, the teacher must be skilled in managing instruction to reduce the amount of 'dead time' during which children are not productively engaged on task (Little, 2005). This means that teachers must be aware of different ways of grouping children, and the importance of independent study areas where learners can go when they have finished their work. Learners need to be taught the value of independence and cooperation by involving them in classroom decision-making.

Instructional strategies

Instructional strategies are key to improving the quality of teaching and learning in the multi-grade classroom. Increasing the level of learner independence and cooperative group work involves a change in the role of the teacher from 'giver' of information to 'facilitator' to ensure that time spent away from the teacher is spent productively (Joubert, 2007). Three important strategies to apply to a classroom with multi-grade teaching are peer instruction, in which learners act as teacher for each other, cooperative group work, which involves small groups engaging in collaborative tasks, and individualised learning programmes which involve the learner in self-study.

Planning based on the prescribed curriculum

National curricula are typically produced for the mono-grade classroom. Each set of grade level material is typically placed in a separate booklet, which may include specific content to be taught as well as guidelines on how to teach it (Little, 2005). Such curricula are difficult to use for the educator involved in multi-grade teaching because the curriculum for each grade level requires plans to be written for each grade level separately. For the teacher teaching in a multi-grade classroom context, doing separate planning schemes is time consuming. Teachers need to be taught how to plan across grade level objectives, or how to amend the curriculum to make it more suitable for their multi-grade teaching setting (Little, 2005).

Christie (1999:28) suggests the following steps to develop schools that are struggling by assisting them to create a culture of teaching and learning. These three steps that also apply to schools pursuing effective multi-grade teaching include recognising the importance of building these schools into functioning organisations, strengthening their organisational capacity and building leadership and a sense of agency and responsibility at school level.

To recognise the importance of building these schools into functioning organisations implies that provincial departments of education should provide support in leadership and administration and keep close personal contact with these schools. Provincial departments must be consistent and reliable in dealing with these schools and must help to clarify roles and responsibilities so that stakeholders are able to work together. They must help to negotiate legitimate authority relations within the schools and help to create a safer environment for the schools (Joubert, 2010).

To achieve a strengthened organisational capacity and build leadership within schools, there must be assistance with tasks such as timetabling, meeting procedures, budgeting and record keeping. Another way to achieve strengthened organisational capacity is by running workshops with the management teams of individual schools or clusters of schools (Juvane, 2005).

A sense of agency and responsibility at school level must be built relating to each school recognising that it has skills and experiences that can be developed. An example of this is to introduce conflict resolution and team-building exercises to assist stakeholders to work together to address common problems and aims. School development planning can also assist in ensuring participation and in bringing stakeholders together to work on common aims (Joubert, 2006).

Instructional materials

As with the curricula, instructional materials are normally also developed for the monograde classroom. Consequently, these instructional materials are produced as grade level textbooks and are designed to be delivered by the teacher to the children (Little, 2005). More suitable study materials for multi-grade teaching include materials in

which a self-study element features strongly. These self-study material might be in the form of workbooks with a self-correction key, or a small classroom library that can be accessed independently by the children. Teachers need guidance on how to produce such self-study materials in a cost-effective way.

School and community

Schools involved in multi-grade teaching are often located in remote rural areas that are difficult to reach and which, because of the fact that they are far from educational centres, result in them receiving little pedagogical support (Joubert, 2010). The communities in which these schools are located may not see the value of education and may speak a different language to the language of teaching and learning used at school. Teachers teaching multi-grade classes need specialised training in approaches to develop and strengthen relations between the school and the community.

2.7 ADVANTAGES OF MULTI-GRADE TEACHING

Regardless of all the challenges encountered with multi-grade classrooms, there are also positive results for learners exposed to multi-grade teaching. The positive qualities of multi-grade teaching relate to learners experiencing good quality well-being because of the following reasons (Fyfe, 2001:9; Brown, 2010; Little, 2005):

- Learners have a better self-concept. Learners believe in themselves because they work in small groups. When working in small groups learners are not afraid to make mistakes and that boosts their confidence and self-concept.
- Learners have a stronger feeling of belonging, especially to the whole class, because the classroom environment is like a family environment. The learners and the teacher know each other personally and care for each other.
- Learners express an improved attitude towards school and learning. Learners
 enjoy school because of the prevailing family-like atmosphere in the
 classroom. Learners are eager to go to school because the atmosphere at
 school is inviting.

- Learners are provided with more leadership opportunities. The teacher allocates some responsibilities to learners and this improves their leadership skills. Peer tutoring as well as group-work affords learners the opportunity to take the lead in the classroom.
- Learners help each other. Learners who mastered the work will help other learners. When the teacher is absent or is busy with something else, these learners can help other learners by engaging in peer tutoring.
- Self-regulation improves because learners are given the opportunity to help and monitor younger age groups. Learners can manage their own learning to be prepared to help other learners. Learners develop independent working skills because the teacher is responsible for many grades and does not have enough time to work with all the groups all the time.
- Younger children are engaged in complex play as they learn the work done in senior grades. When the teacher teaches the senior grades the learners in junior grades spontaneously learn the work of senior grades since they are all in one classroom at the same time.
- Younger children are motivated and have self-confidence because of the attention they receive from older children. They feel secure in the classroom because they know they will get help from the older learners.
- The classroom situation invites cooperation. Learners cooperate with each other in the use of available resources and in completing tasks. They share resources and cooperate with each other during peer tutoring and group-work.
- Competitive pressure on children is minimised. Learners do not compete
 because they experience a sense of helping each other. Discipline problems
 are reduced. Learners respect the teacher and other learners. The personal
 relationship that prevails in the classroom improves respect and minimises
 disciplinary problems.
- Flexibility in instructional grouping is allowed. The teacher uses flexible schedules that can be adjusted to meet the learners' needs.
- Learners' relations are improved. Learners relate to each other in a positively constructive way. They become friends because they know they need each other in completing different tasks.

- A context for meeting the developmental and social needs of learners is created. The classroom environment allows learners to socialise with learners of different age groups. Older learners guide younger learners in class on school work and social life.
- Stability and meaningful relationships are developed. Learners in class relate
 well to each other. Fighting and bullying are minimised because learners
 develop good relations with each other.

The factors mentioned above can have a positive effect on the achievement of quality teaching and learning in a multi-grade classroom. However, there are certain disadvantages of multi-grade teaching and learning that can have a negative effect on achieving the ultimate goal of ensuring optimal teaching and learning in a multi-grade classroom setting.

2.8 DISADVANTAGES OF MULTI-GRADE TEACHING

In multi-grade classrooms teachers do not focus on all learners all the time as teachers' attention is spread over learners in different grades with different abilities and different tasks. This is detrimental to young children who need constant attention from the teacher (Mohlala, 2010:31). The result is that the quality of teaching is compromised in multi-grade classrooms especially as this teaching pertains to attention to young learners. Disadvantages of multi-grade teaching as experienced by educators relate to having limited time for the organisation of a structured classroom set-up and instruction to the learners on what is expected of them during a lesson. Much teaching time is absorbed by differentiating between age groups and organising them appropriately as well as finding and using suitable resources and support from outside the school.

Teaching a multi-grade classroom is time consuming because the teacher must plan for learners in different grades with these learners having different subjects. In order to organise the classroom in such a way that all learners get the much-needed attention throughout the school day, the teacher must be creative. The teacher must

also be able to give instruction in different subjects which demands that the teacher must have expert knowledge of all the subjects that must be facilitated to the learners. Multi-grade schools are normally situated in desolated areas where teachers do not receive regular and relevant support and often experience lack of resources. The support required pertains to enough training on how to deal with a multi-grade classroom consisting of learners with differing levels of development. Ideally, resources must accommodate these differing development levels in a multi-grade classroom setting (Mulryan-Kyne, 2004:12-16).

Song, Spradlin and Plucker (2009:2) and Pancoe (2006:22) note that parents encounter multi-grade teaching as disadvantageous to their children when siblings have to share the same classroom and the same teacher. Pancoe (2006:22-24) states that parents think that older learners do not learn because they spend more time helping younger learners. Parents also feel that classes are too diverse and that older or gifted learners may be neglected because the teacher spends more time with the younger ones while young children may be frustrated because they do not work as fast as the older learners. Clashes between learners or between the teacher and older learners may upset younger learners and, if the number of learners is small, they might experience difficulty in establishing friendships (Pancoe, 2006). Pancoe also argues, however, that many of the disadvantages associated with multi-grade teaching are based on misconceptions, and not on actual practices.

Multi-grade teaching is labour intensive because the teacher must be prepared for all the grades and all the subjects with meaningful assessment tasks for each grade and each subject (Song et al., 2009). This demands that teachers teaching multi-grade classes be subject specialists of all the subjects taught. Challenging programmes for advanced learners might not be a disadvantage because learners have access to work of higher grades while they are still in lower grades in the multi-grade classroom.

2.9 CHALLENGES WITH MULTI-GRADE TEACHING

Multi-grade teaching constitutes a work environment that can be full of challenges and difficulties (McEwan, 2008:465-483). These challenges are discussed next.

Berry (2001:7) argues that professional and social isolation is one of the challenges facing teachers of multi-grade classes worldwide. He indicates that multi-grade teaching often takes place in remote schools in difficult to reach areas. Teachers not only face the difficulties of dealing with a multi-grade class, but also other constraints such as lack of resources, infrequent supervision, and poor living conditions (Berry, 2001).

Research on the Escuela Nueva programme in Colombia suggests that multi-grade teaching may be preferable to mono-grade teaching because it requires greater flexibility and thus allows for more opportunities for both cooperative and more individualised learning (Luschei and Zubaidah, 2012). However, it is still more commonplace to consider multi-grade teaching to be a major challenge to positive learning outcomes, particularly in contexts where multi-grade classes have arisen out of necessity rather than by design, such that millions of learners around the world are taught by teachers attempting to teach a curriculum designed for mono-grade classrooms (Little, 2005). In resource-poor contexts, where teachers are prone to inadequate professional development opportunities enabling them to respond to a diverse range of learning needs in a multi-grade classroom setting, limited understanding of school entry age exacerbates the challenge of educational planning to improve learning outcomes for all.

Keeping the accomplishment of a positive whole-school climate in mind based on a graded system of education, multi-grade teaching is more demanding than monograde teaching (Berry, 2001). Planning from the curriculum is more difficult because of the way in which it is structured. Classroom management is more complicated because of the necessity of having more than one group on task at the same time. Teachers may be required to write multiple lesson plans, and end of term tests have to be set for each grade level group. School principals of schools involved in multigrade teaching are usually also class teachers, which places greater demands on these school principals' time. Other staff members may have to fulfil a wider variety of duties than their counterparts in larger schools, such as, for example, pastoral care.

For these reasons, graded systems need to move in directions that support the multigrade teacher, but also encourage more innovative teaching methods in the monograde classroom. One way in which this may be achieved is through curriculum reform. The graded curriculum model encourages teachers to view their class homogenously, which warrants the need for considering differing curriculum models (Little, 2005). One example is the modular approach adopted in Colombia, which involves dividing the curriculum into specific objectives and producing associated learning materials. Another approach is to develop curriculum frameworks that are based on themes rather than subjects. These curriculum reforms prompt changes in the types of instructional materials available to teachers.

Most countries have national curricula and this prescribed curriculum is almost the same for both urban and rural schools. The curricula consist of a list of minimum learning competencies stated in terms of behavioural objectives. These minimum competencies are specifically designed for regular school situations which teachers teaching multi-grade classrooms find difficult to apply meaningfully in order to ensure constructive learning in a multi-grade classroom setting.

With regard to the South African context, and according to Taole and Mncube (2012:157), the challenges associated with multi-grade teaching relate to a lack of support for educators involved in multi-grade teaching, educators who are not conversant with the lesson planning required for multi-grade teaching and a general lack of educator commitment. Brown (2008:38) emphasises that many teachers are negative towards teaching in multi-grade classrooms. Teachers prefer mono-grade teaching because multi-grade classes imply more planning, more preparation, complex organisation and more work in general. This more work relates to catering for a wider range of abilities and levels of maturity, less time for meeting individual learner needs and for remediation, less time for reflection on teaching, lack of relevant professional training, and limited work satisfaction (Brown, 2008). Little (2005) states that in addition to a need for proper training regarding teaching multi-grade classes, teachers also identify high rates of learner absenteeism in multi-grade classrooms, frequent changes in grade combinations and a lack of textbooks as challenges at schools involved in multi-grade teaching.

Wallace, Mcnish and Allen (2001:21-26) confirm that the main challenge with multigrade teaching is the fact that managing teaching and learners in a multi-grade classroom environment is not taught at universities. This lack of proper training for the task of teaching a multi-grade classroom is exacerbated by lack of encouragement for teachers to be creative and innovative in using existing resources while teaching a multi-grade class. This lack of encouragement to teach properly in a multi-grade classroom environment is accompanied by teachers not knowing how to teach different subject areas at different grade levels effectively, and how to fulfil the number of roles that teachers must accomplish while realising teaching and learning goals in a limited time frame (Joubert, 2007).

2.10 STRATEGIES TO MANAGE A MULTI-GRADE CLASSROOM

Considering the negative attitudes of many teachers towards teaching in multi-grade classrooms and the magnitude of teaching a multi-grade classroom context, several conditions need to be addressed in order to make the teaching and learning setting beneficial for learners.

Little (2004:13) suggests that policymakers be aware of the multi-grade teaching reality and then develop tailor-made multi-grade teaching conditions related to resources, lesson planning, curriculum, didactic materials, teacher preparation and assessment strategies in collaboration with teachers. Teachers teaching multi-grade classes should not be expected to merely adapt the general mono-grade system to their specific multi-grade teaching circumstances. Little (2004:13) argues that many policymakers, planners, professional support staff and the public at large are unaware of the extent and nature of the needs of multi-grade classes and teachers teaching these classes. Since curriculum, didactic materials, teacher preparation and assessment approaches are predicated on schools with mono-graded classes, many teachers are negative towards their role in a multi-grade classroom setting.

Curricula premised on a single graded structure must be adapted to meet the needs of the multi-grade classroom, which must be undertaken jointly by teachers, and guided and supported by curriculum experts at national level. This adaptation must be sanctioned and validated by the highest authority (Joubert, 2010). Little (2004:13) describes curriculum adaptation strategies that are effective for multi-grade classroom arrangements. These strategies include aspects relating to multi-year curriculum

spans, differentiated curricula, a quasi mono-grade approach, a learner and material-centred arrangement, instructional resources and timetables and routines (Little, 2004):

- Multi-year curriculum spans: With this strategy, units of curriculum content are spread across two to three grades rather than one. All learners work through common topics and activities.
- Differentiated curricula: With this strategy, the same general topic/theme is covered with learners. Learners in each grade group engage in learning tasks appropriate to their level of learning.
- Quasi mono-grade: With this strategy, the teacher teaches grade groups in turn as if they were mono-graded. Learners follow the same or different subjects at the same time. Teachers may divide their time equally between grade groups or they may deliberately divide their time unequally, choosing subjects or tasks within subjects that require different levels of teacher contact.
- Learner and material-centred: This strategy depends more on the learner and learning materials than on teacher input. The curriculum is translated into self-study graded learning guides. Learners work through these at their own speed with support from the teacher and structured assessment tasks. Learning is constructed as involving a relationship between learner, learning materials and teacher. According to Pridmore (2007:564), a well-known example of this strategy is the Escuela Nueva Programme of Colombia.

Joubert (2010:6) identifies instructional resources and timetables and routines as two salient factors to improve multi-grade teaching. Instructional resources like workbooks and worksheets must be arranged and organised according to the relevant age group, so that all learners can complete work on their grade level. The physical environment must also be organised in order to facilitate learning by ensuring that the classroom furniture is arranged in such a way to assist cooperative work as well as individual work in the multi-grade classroom. Skills and routines must be developed whereby learners serve as teachers to other learners within the same grade level or across different grade levels (Joubert, 2010). The development and implementation of clearly set out lesson timetables and routines that promote clear and predictable instructional

patterns ensure that all learners in the class work effectively throughout the scheduled lesson period and do not sit around idlily.

A crucial strategy for proper multi-grade teaching relates to the responsibility of the Department of Basic Education to re-train educators to adapt to multi-grade teaching conditions and to avail teaching materials that support multi-grade teaching. Taole and Mncube (2012:161) recommend that educators teaching multi-grade classes are equipped with planning skills specifically functional for a multi-grade classroom environment. Certain measures to improve the functioning of schools involved in multi-grade teaching relate to appropriate educational policies and legislation with regard to equipment and teaching materials relevant to the multi-grade classroom. These measures also include financial and professional advancement measures to govern the assignment of teachers to these schools in compensation for the isolation and difficulties they experience and a plan for the theoretical and practical pre- and inservice training of teachers teaching in the multi-grade set-up (Taole & Mcnube, 2012).

With regard to the in-service training of teachers teaching in a rural multi-grade classroom context, Mohlala (2010:31) emphasises the need for provincial and district officials to be trained in conducting in-service training in multi-grade teaching approaches for teachers. Gower (2010:30) states the importance of a national policy on rural multi-grade teaching to adapt the national curriculum statement in order to address the needs of teachers teaching in schools with multi-grade classroom environments in rural settings.

Teacher training at institutions of higher education should include a module or component of a module on multi-grade teaching relating to know-how on facilitating core content to learners within a multi-grade classroom context for the sake of optimal learning. This can be arranged by including a module on multi-grade teaching in every teacher training programme (Joubert, 2009).

2.11 FACTORS IMPLICATED WITH MULTI-GRADE TEACHING PROGRAMME DEVELOPMENT

The implementation of multi-grade teaching programmes is contingent on the will of teachers to implement these programmes effectively. Teachers' willingness to be involved in multi-grade teaching is influenced by certain factors, namely the lack of faith in multi-grade pedagogy, professional and social isolation when involved in multi-grade teaching and ownership of multi-grade teaching (Beneviste & McEwan, 2000). Each of these factors has implications for the effective development of multi-grade teaching programmes in the South African society.

2.11.1 Lack of faith in multi-grade pedagogy

Teachers in general view mono-grade teaching as the 'normal' way to organise classes (Little, 2005). Multi-grade classes are viewed as an unavoidable nuisance. Consequently, teachers are resistant to the idea of being trained in multi-grade teaching methods (Gower, 2010). There is a need, therefore, to convince teachers and others in the field of education of the merits of multi-grade pedagogy. In Colombia, for example, this convincing effort happened by word of mouth, with teachers who have participated in the multi-grade teaching programme promoting its virtues to other teachers (Mohlala, 2010). Multi-grade teaching programmes need to be developed in a coherent manner, and all stakeholders must understand the rationale for the introduction of multi-grade pedagogy.

Professional and social isolation

As discussed, teaching in a multi-grade classroom can have many difficulties and restraints and these conditions make teachers resistant to the idea of multi-grade teaching, it also inhibits the recruitment of teachers for multi-grade teaching and the retaining of recruited teachers (Gower, 2010).

One of the best strategies to promote multi-grade teaching is by providing specialised, on-going training, together with a policy of training and recruiting teachers from local villages (Joubert, 2009).

Ownership

Policy changes in relation to curriculum reform alienate teachers from the reform efforts when teachers are not intimately involved in the reform process (Gower, 2010). With regard to policies on multi-grade teaching, it is important that teachers be involved and given the opportunity to contribute to policy formulations with the encouragement of constantly contributing to solutions to school-based problems (Mahlala, 2010). In this regard, a mechanism of sharing examples of good practice between teachers improves school-based practice.

2.12 SUMMARY

The importance of developing excellence in schools to promote optimal learning was discussed, including the importance of good multi-grade teaching practices that ensure a sound culture of teaching and learning. A conceptual framework on teachers' perceptions of the benefits and challenges of teaching and learning in multi-grade settings and the nature and characteristics of the multi-grade classroom context introduced the phenomenon of multi-grade teaching. The definitions for multi-grade teaching elicited the functioning of multi-grade teaching as understood through the theoretical lens of Bronfenbrenner's ecosystemic model for child development. Bronfenbrenner's ecological systems theory based on the interconnectedness between the different ecological systems influencing child development, facilitated a better understanding of multi-grade teaching and learning. Although not universal, multi-grade teaching is widespread, also in the South African context where there is not one unique definition or interpretation for multi-grade teaching.

The fact that teachers can influence their attitudes towards multi-grade teaching based on the support they receive, accentuates the importance of programmes and strategies from the Department of Education to encourage and empower teachers to improved capacity. Multi-grade teaching arising out of necessity and associated with increased workloads and didactical resource constraints, demands focused attention to the support for teachers' professional development related to curriculum adaptation,

lesson preparation, assessment arrangements and to ensuring applicably appropriate learning materials.

CHAPTER THREE RESEARCH METHODOLOGY AND RESEARCH DESIGN

3.1 INTRODUCTION

The purpose of this study is to describe the ability of educators and school managers to manage multi-grade teaching for optimal learning in selected primary schools in Gauteng West as well as to identify factors that influence the learning and teaching of learners in a multi-grade classroom context.

This chapter provides an explanation of the epistemological and paradigmatic perspectives informing the study as well as a summary of the research philosophy used in the study. The qualitative research design was used. Observation of the interactions between the selected learners and teachers in the multi-grade teaching environment occurred. In-depth individual interviews were conducted with school principals managing schools with multi-grade classrooms and focus group interviews were conducted with the school principals, the teachers teaching multi-grade classes as well as with the HODs at two primary schools in the Gauteng West Hekpoort area to collect data on individuals' personal perspectives and experiences. A third research site could not be visited because of safety concerns to travel on the road caused by violent protest action in the Hekpoort area at the time data collection commenced.

The individual interview technique is normally used to gather qualitative, in-depth information from those individuals specifically affected by a particular programme or project, its context, implementation, results and impact (Kvale & Brinkman, 2008:23). Focus group interviews with the teachers, HoDs and school principals at the chosen research sites were held which provided the opportunity for the researcher to obtain general background information about using effective management strategies to promote optimal learning in the multi-grade classroom and the school as a whole.

In this chapter, the theoretical framework underpinning the study is described and the methods selected, and instruments designed for data collection are explained. The data analysis process is outlined as well as the strategies for enhancing trustworthiness. The role of the researcher and ethical considerations are described.

3.2 RESEARCH AIMS

The main research aim is to determine how learner development in a multi-grade classroom context can be managed effectively. In order to determine this, the following study aims had to be achieved:

- To determine the importance and benefits of specialised training for teachers teaching multi-grade classes.
- To determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts.
- To develop strategies for teachers teaching multi-grade classes to ensure optimal learner development.

3.2.1 The importance of specialised training for teachers teaching in multigrade classroom contexts

South African teachers feel isolated and neglected by the Department of Basic Education (Taole, 2014:95). Training of teachers to teach at schools in multi-grade classroom contexts is limited. According to Lingam, Mason and Burns (in Brown, 2010:56), for teachers teaching in a multi-grade classroom to be effective in their teaching tasks, they should be trained professionally. Wallace, Mcnish and Allen (2001:21-26) confirm that the main challenge is that the management of learning and teaching in a multi-grade environment is not taught at universities in South Africa.

3.2.2 Challenges faced by teachers and school managers in schools with multi-grade classroom contexts

In addition to a need for proper training with regard to teaching multi-grade classes, high rates of learner absenteeism in multi-grade classrooms, a lack of textbooks and frequent changes in grade combinations were identified as challenges that are faced by teachers teaching in a multi-grade classroom.

Brown (2008:38) suggests that teachers do not prefer to teach in a multi-grade class because it means more planning, organisation, catering for a wider range of abilities and maturity, less time for meeting individual learner needs for remediation, less reflection on teaching time and less satisfaction with their work.

This lack of encouragement to teach in a multi-grade classroom environment is paired by the fact that teachers do not know how to teach different subject areas at different grade levels in the same classroom effectively. Tasks must be completed in a limited time frame and the teacher must fulfil a number of roles, which can be very demanding (Joubert, 2007).

According to Berry (2010:4) there are a few key areas which are generally the focus of training packages for multi-grade teachers. These encompass the following features:

3.2.2.1 Classroom management techniques

Managing a multi-grade classroom is difficult because there is more than one grade level in the classroom. Hence, the teacher must be skilled in managing instruction to reduce the amount of 'dead time' during which children are not productively engaged on task. This means that teachers must be aware of different ways of grouping children, the importance of independent study areas where students can go when they have finished their work, and approaches to record keeping which are more flexible than those prevalent in the monograde classroom. Students may need to be taught the value of independence and cooperation by involving them in classroom decision making.

Instructional strategies

These are seen as a key to improving the quality of teaching and learning in the multigrade classroom. The promotion of approaches that increase the level of student independence and cooperative group work are suggested. These involve a change in the role of the teacher from merely a giver of information to a facilitator of learning. This is to ensure that time spent away from the teacher is spent productively. Three important strategies are peer instruction, in which students act as teachers for each other, cooperative group work, which involves small groups engaging in collaborative tasks, and individualised learning programmes which involve the student in self-study.

Planning from curriculum

National curricula are typically produced for the mono-grade classroom. Each set of grade level material is typically placed in a separate booklet, which may include specific content to be taught as well as guidelines on how to teach it. Such curricula are difficult for the multi-grade teacher to use because they tend to require plans to be written for each grade level separately. This is not only time consuming but may also result in ineffective instruction. Teachers need to be taught how to plan across grade level objectives, or how to amend the curriculum to make it more suitable for their setting. Similar observations may also apply to the school timetable.

Instructional materials

Instructional materials also tend to be written for the mono-grade classroom. Consequently, they are produced as grade level textbooks and are designed to be delivered by the teacher to the learners. More suitable materials include a self-study element. This might be in the form of workbooks with a self-correction key, or a small classroom library that can be accessed independently by learners. Teachers need to be shown how to produce such self-study materials.

3.2.3 Strategies to ensure optimal learner development

Negative attitudes by many teachers towards teaching in multi-grade classrooms and the challenges with and nature of multi-grade teaching demand that conditions be met to make the multi-grade teaching and learning setting beneficial for learners. Little (2004:13) suggests that policymakers be aware of the multi-grade classroom reality and then develop resources, lesson plans, curricula, didactic materials, teacher preparation and assessment strategies in collaboration with teachers. Teachers teaching multi-grade classes must not be expected to merely adapt the general monograde teaching system to their specific multi-grade teaching circumstances.

Policymakers, professional support staff and the public at large are not aware of the extent and nature of the needs of multi-grade teaching and since curricula, educational materials, teacher preparation and assessment systems are predicated on monograde teaching, teachers are negatively inclined towards teaching multi-grade classes (Little, 2004). Curricula premised on a single graded structure must be adapted to the needs of the multi-grade classroom with this adaptation undertaken jointly between teachers and guided and supported by curriculum experts at national level with the adaptation sanctioned and validated by the highest authority (Little, 2004).

3.3 RESEARCH PARADIGM AND RESEARCH APPROACH

A qualitative research approach was employed as the best option for the collection of relevant data to answer the research question. According to Maxwell (2013:4) qualitative research is research that is intended to help you better understand the meanings and perspectives of the people you study and to see the world from their point of view, rather than simply from your own. It shows how these perspectives are shaped by people's physical, social and cultural contexts and the specific processes that are involved in maintaining or altering these perspectives and relationships.

All the mentioned aspects of qualitative research contrast with quantitative research approaches, which are based on seeing the phenomenon studied in terms of variables. These are properties of things that can vary and can thus be measured and compared across contexts. Qualitative research is an inductive, open-ended approach. It is reliant on textual or visual rather than numerical data, and its primary goal is understanding rather than generalisation across persons and settings. A qualitative research approach was chosen for this study because the researcher wanted to gain a deep understanding of the phenomenon under study (McMillan & Schumacher, 2010:214), namely the effective management of learner development in a multi-grade classroom context.

The literature study serves as basis for conducting the context specific empirical investigation. By determining the benefits of effective classroom management and teaching strategies for a multi-grade teaching context to ensure optimal learner development, the literature study summarises the 'what' and 'how' of the roles that

teachers, school principals and HoDs play in establishing good quality education in school environments within multi-grade classroom contexts. The literature study emphasises that the implementation of effective classroom management strategies and the specialised training of teachers involved in multi-grade teaching contribute to the quest for quality education for all.

3.4 RESEARCH SAMPLE

A sample is a group of subjects or participants from whom the data is collected (McMillan & Schumacher, 2010:119). Based on the research population for this study, namely all primary schools in Gauteng West engaged in multi-grade teaching, the sample of this study consisted of four teachers of multi-grade classes, four HoDs (Head of Department) and two school principals from two sampled primary schools in Gauteng West. Sampling is the process of selecting a number of individuals for a study in such a way that the individuals represent the larger group from which they were selected (Taherdoost, 2016). According to Taherdoost (2016), the purpose of sampling is to use a sample to gain information about a population. For the purpose of this study, purposive sampling was used. According to McMillan and Schumacher (2010:319), purposive sampling involves selecting information-rich cases for in-depth study when one wants to understand something about those cases without needing or desiring to generalise to all such cases. Purposeful sampling is done to increase the utility of information obtained from a small sample. It requires that information be obtained about variations among the sub-units before the sample is chosen. In this study, the researcher purposefully sampled schools that have multi-grade classes. Teachers who teach in multi-grade classes were also purposefully sampled. These are teachers who have first-hand experiences of teaching within the multi-grade classroom context and were likely to contribute to an answering of the research questions of the study. School principals and HoDs from the selected schools with multi-grade classes were also sampled purposefully.

Research involves gathering information about the variables in the study. The researcher chose from a wide range of techniques and approaches to collect data from the subjects. Each method has advantages and disadvantages, and the specific

approach adopted should be the best one for answering the research question (Taherdoost, 2016:34).

The methods of data collection that were used comprised focus group interviews, face-to-face individual interviews and observation. Through interviews, it was possible to explore participants' responses and examine their attitudes, feelings and values more easily. According to Creswell (2009:179), interviews allow the researcher control over the line of questioning. Creswell (2009:179) also indicates that, through observation, the researcher has first-hand experience with participants, and that unusual aspects can be noticed during observation.

3.5 DATA COLLECTION

The three research methods that were used to collect data for answering the research questions were participant observation and in-depth individual and focus group interviewing. The research methods that were used are based on a qualitative research approach of obtaining complex and textual descriptions of how people experience the different aspects of teaching in a multi-grade classroom (Guest, Namey, Mack, MacQueen & Woodsong, 2005:2, 3).

3.5.1 Observation

The researcher observed various classes where multi-grade teaching and learning occurred. At School 1 the researcher observed five multi-grade class groups from both the foundation phase and the intermediate phase. At School 2 the researcher observed one multi-grade class group in the foundation phase, however various teachers educating the same class were observed. The researcher used an observation schedule which lead to aspects that needed to be observed like the various teaching methods and strategies, classroom management strategies like maintaining discipline, classroom environment and sitting arrangement and educator/teacher interaction used by teachers teaching in a multi-grade classroom. Teachers' files, lesson plans and planning documents were supplementary to these observation actions by the researcher in order to establish the extent to which the

educators teaching in multi-grade classes organise themselves and prepare for such lessons.

3.5.2 Focus group interviewing

According to Denscombe (2007:115), a focus group consists of a small group of people who are brought together by a trained moderator (the researcher) to explore attitudes and perceptions, feelings and ideas about a topic. A focus group interview provides a setting for the relatively homogeneous group to reflect on the questions asked by the interviewer.

The focus group interviews in this study on multi-grade teaching were direct interactions with principals, HoDs and teachers representing a multi-cultural environment at schools where multi-grade teaching is practised. Since our society has become more heterogeneous, multicultural education has emerged as an essential component of the education system (Bennett, 2003). The implementation of multicultural education requires teachers to examine their own values, knowledge, and teaching practices about diversity to avoid biased multicultural education (Brown & Marchant, 2002).

Bennett (2003) argues that educational excellence in schools cannot be achieved without educational equity. Equity in education means equal opportunities for all learners to develop to their fullest potential. The classroom setting is a very important aspect for representing the teacher's understanding of multicultural education. An environment that is rich in possibilities for exploring gender, race/ethnicity, and cultures sets the scene for practicing multicultural education. This environment also shows children what a teacher considers important or not important. Thus, creating a diverse environment is an important step for implementing multicultural education (Morrison, 2000). This arrangement allowed the researcher to obtain general background information about using effective management strategies to promote optimal learning in the multi-grade classroom consisting of learners representing a multicultural setting.

It was anticipated that the data collected from focus group interviewing will form new concepts and will provide new ways to solve the problems relating to multi-grade teaching which the researcher would not have obtained with the same efficiency if another data collecting instrument was used (McMillan & Schumacher, 2010:202).

The school principal, the selected teachers teaching in a multi-grade classroom and two HoDs per research site were subjected to focus group interviewing. The focus group interviews were focused on determining the main challenges they experience with their teaching of multi-grade classes and to get insight into the constructive techniques they apply to ensure optimal learning in their multi-grade classrooms. The focus group interviews were arranged at a place and time convenient to all participants. A total of two focus group interviews were conducted, one at each research site.

The transcribing, analysis, and interpretation process was based upon the suggestions of Creswell (2008). The interview data was recorded and stored on a secure portable hard drive. The data was transcribed by the researcher and typed in Microsoft Word. Before the research commenced, ethical clearance was obtained from the UNISA Research Ethics Committee. The aim of the research was explained to the prospective participants and written informed consent forms were completed. Consent was also obtained from the Provincial Department of Education. All data were reported anonymously.

3.5.3 Individual interviewing

As the purpose of the research interview is to obtain research-relevant information from the interviewee, it is centred on the evidence to be generated for achieving the research objectives of describing, predicting or explaining the phenomenon (Cohen & Manion, 2011). As compared to other techniques of data collection such as questionnaires, interviews may serve as a richer source for exploring people's feelings and attitudes. The use of interviews is highly desirable for obtaining information based on emotions, feelings, experiences, sensitive issues and insider experience, and privileged insights and experiences. The interview technique is of immense value in qualitative research studies since it emphasises the in-detail and holistic description

of an activity or situation. Qualitative research is designed to investigate the quality of relationships, activities, situations or materials. Therefore, the qualitative interviews differ significantly from those used in quantitative research.

The researcher conducted individual interviews with the two school principals from the selected schools to ascertain what the challenges and benefits of multi-grade teaching are, how they, as executive leaders of their schools, foster positive attitudes and a successful school environment for multi-grade teaching and what the structures are for effective school management and school functioning within a multi-grade context. Individual interviewing is normally used to gather qualitative, in-depth information from those individuals specifically affected by a particular programme or project, its context, implementation, results and impact (Kvale & Brinkman, 2008:23). With permission of the Gauteng Department of Education, the school principals were interviewed at their schools according to their own time schedules. Two individual interviews were accordingly conducted.

3.6 DATA ANALYSIS

Qualitative content analysis was carried out to determine the pattern of teachers' responses. Direct quotations were used to support teachers' and school principals' views on multi-grade teaching and to find out what the challenges and benefits of multi-grade teaching are, how they encourage positive attitudes and a favourable environment for multi-grade teaching and what the structures are for effective school management and school functioning within a multi-grade context.

Qualitative content analysis involves an inductive process of identifying patterns and organising data into categories in order to interpret meaning and construct relevant answers to postulated research questions (McMillan & Schumacher, 2006:364). The data that was collected was analysed using the five-step framework for data analysis by Lacey and Luff (2009).

The first step involved the researcher familiarising herself with the transcripts of the collected data, followed by the second step of identification of the thematic framework, which entailed the recognition of emerging themes. The third step involved the use of numerical or textual codes to identify specific pieces of data which corresponded to

different themes. The fourth step, known as charting, involved the creation of charts of data based on the headings from the thematic framework, so that the data could easily be read across the whole data set. The final step involved the analysis of the most salient characteristics of the data through mapping and interpretation. This enabled the generation of a schematic diagram of the phenomenon under investigation, thus guiding the interpretation of the data set (Srivastava & Thomson, 2009:74).

3.7 TRUSTWORTHINESS

Trustworthiness refers to the extent to which the data obtained in the study is plausible, credible and trustworthy (McMillan & Schumacher, 2010:330). Certain strategies were employed to ensure the trustworthiness of this research on multi-grade teaching.

Researchers select trustworthy evidence for findings by qualitatively assessing subtle influences among participants partaking in focus group interviewing and determining repetitive responses as saturation with individual interviewing to confirm the accuracy of the sources and distinguishing between the relevant and vague statements (McMillan & Schumacher, 2006:348). With regard to this study on multi-grade teaching, the researcher kept an open mind throughout the individual and focus group interviewing process to accommodate the possibility of different meanings attached to the same reality.

Two weeks of prolonged and persistent fieldwork were conducted to collect data which allowed interim data analysis and verification and enabled the researcher to verify the correlation between findings and participants' reality. Triangulation confirmed the trustworthiness of findings based on data obtained by means of focus group interviews, individual interviewing and persistent observation. The use of an audio recorder ensured complete and verbatim capturing of interview data. Informal checks for accuracy were made with the participants during data collection to ensure reliability (McMillan & Schumacher, 2010:330).

3.8 ETHICAL CONSIDERATIONS

Ethics provide the guidelines for planning and conducting research in such a way as to protect the rights and welfare of the participants involved in the research (McMillan & Schumacher, 2010:134).

With reference to the work of McMillan and Schumacher (2010), Lacey and Luff (2009) and Strydom (2005), there were certain ethical issues that had to be adhered to with the empirical part of the study on multi-grade teaching. Ethical clearance for the study was approved by the Research Ethics Committee of the College of Education at the University of South Africa. Written permission was obtained from the Gauteng Department of Education to conduct the research in selected schools in Gauteng. Confidentiality, anonymity and privacy of participants and research sites were respected.

The researcher was as open and honest with all participants as possible and participants were clearly informed about the reasons for undertaking the research and the aims of the study. This ensured full cooperation from all participants. Consent of all participants was sought. This included that information was provided on the research aims, the research process and the use of data from the study. Consent forms were provided to be completed by all participants. The consent forms included information specifying the right of participants to withdraw from the research at any time, and that data that was collected from participants would be anonymously used for research reporting only. Data such as interview recordings and transcripts and observation lists were stored securely.

3.9 SUMMARY

McMillan and Schumacher (2010:17) explain that qualitative research presents data as a narration with words. This research design was appropriate for this study because all the data was presented in the form of descriptions in words, and not in statistics, graphs or numbers. In addition, qualitative research is concerned more with understanding the social phenomenon from the participants' perspectives.

The researcher conducted research at two primary schools in Gauteng West offering multi-grade teaching to observe and interview teachers who were trained as monograde teachers but were expected to teach multi-grade classes. The research focused on answering the specific research questions set out by the researcher. The school principals and HoDs were also questioned about what the impact was of multi-grade classes on creating a positive teaching and learning environment, and what the challenges were of managing a multi-grade teaching context in certain classes at the specific school.

The motivation of the study was to gain an understanding of what the impact of having multi-grade classes have on teaching and learning in the selected schools. Attention was given to certain challenges faced by teachers teaching in a multi-grade classroom context. Teaching strategies can be adopted by multi-grade teachers to suit their specific needs and to make the task of multi-grade teaching achievable. Teachers' approach toward teaching and learning in a multi-grade classroom directly impacts the success that will be reached. Cultivation and support of multi-grade teaching is necessary to obtain effetive teaching and learning in a multi-grade classroom context.

CHAPTER FOUR RESEARCH FINDINGS

4.1 INTRODUCTION

The primary aim of this study on multi-grade teaching was to determine how learner development in a multi-grade classroom can be managed effectively (section 1.4). In this regard, a main research question that was outlined in section 1.4 focussed on finding answers to how learners can achieve excellence in a multi-grade teaching context by being managed effectively. The aim of the study was split into three research objectives, namely to determine the importance and benefits of specialised training for teachers teaching multi-grade classes, to determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts and to develop strategies for teachers teaching multi-grade classes to ensure optimal learner development. The three research sub-questions that were aligned to these three objectives led the researcher to investigate the research problem and answer the main research question pertaining to strategies and approaches by educators and school managers to ensure optimal learner development in a multi-grade classroom (section 1.4).

Data was gathered by means of an empirical investigation employing individual interviewing, focus group interviewing and observation. Chapter 4 reports on the data collected from the school principals, heads of department, teachers teaching in multigrade classrooms and classroom observations. The analysis of collected data resulted in the emergence of categories to represent answers on how learner development can be managed effectively in a multi-grade classroom context.

4.2 RESEARCH METHODS

Individual interviews were conducted with the school principals of the selected two research sites. The aim with the individual interviews was to gain a better understanding of the instructional leadership role that a school principal fulfils in ensuring the optimal management, guidance and support given to educators teaching in multi-grade classrooms and the challenges and positive factors school principals

face in school environments with multi-grade classroom contexts. A focus group interview was conducted at each research site with the school principal, two HoDs and two educators teaching in a multi-grade classroom context. The aim of the focus group interviews concurred with the aim of the individual interviews, but with a focus on understanding the instructional leadership role that HoDs and the educators play in managing a multi-grade classroom in such a way that learners can develop effectively and on establishing what the challenges are that they face daily. During the interviews and classroom observations, the researcher was able to obtain a clearer understanding of the culture of teaching and learning, and classroom organisation and management prevailing in the multi-grade classrooms at the different research sites and the different operational strategies and approaches followed by the educators to manage a multi-grade class effectively.

4.3 RESEARCH SITES AND PARTICIPANT PROFILES

The background information on the research sites is presented in Table 4.1.

Table 4.1: Background information on research sites

	Number of learners	Number of learners in multi- grade classes	Grades combined into multi- grade classrooms	Number of teachers	Number of assistants in multigrade classes	Socio- economic conditions in the catchment area
School 1	446	416	Gr 1 and 2 Gr 2 and 3 Gr 4 to 6	11	1	Rural school
School 2	550	17	Gr 1 and 2	28	0	Semi-urban school

It is clear from Table 4.1 that both schools that participated in the study had a total of more than 400 learners of which School 1 had 416 learners subject to multi-grade teaching and School 2 had only 17 learners in a multi-grade classroom. In School 1 Grade 1 and 2 are combined into one classroom with one educator educating them and one assistant that helps with administration and marking, Grade 2 and 3 are

combined into one classroom with one educator taking full responsibility for the class and Grade 4, 5 and 6 are combined with one educator taking full responsibility for the class. In School 2, Grade 1 and 2 are combined with one educator taking full responsibility for the class. The socio-economic conditions in the selected schools' catchment areas varied between rural and semi-urban conditions. The selected school exposed to rural conditions was located in a relatively well-developed area just outside the city perimeters, thus the rural school did not represent conditions common to desolated rural environments. In addition to the background information on the different research sites, information on the participants who participated in this study on multi-grade teaching appears in Table 4.2.

Table 4.2: Biographical data on participants

School	Participants	Age	Gender	Position	Years of	Tertiary
				held at	teaching	qualifications
				school	experience in	
					post level	
School	Α	57	Female	Principal	25 years	B.Ed Honours
1						
	В	63	Female	HoD	24 years	B.Ed Honours
				Foundation		
				Phase		
	С	62	Female	HoD	18 years	STD ACE
				Intermediate		
				Phase		
	D	58	Female	Educator	31 years	PDT B.Ed
	Е	48	Female	Educator	16 years	STD ACE
School	F	65	Male	Principal	36 years	B.Ed Honours
2						THOD
	G	34	Female	HoD	39 years	THOD
				Foundation		VDO Media
				Phase		Sciences
	Н	56	Male	HoD	30 years	B.Ed Honours
				Intermediate		
				Phase		
	I	37	Female	Educator	21 years	B.Prim Ed
	J	42	Female	Educator	3 years	B.Ed

The school principals were regarded as legitimate participants owing to their years of school management experience prior to their positions as school principals, which also included their management experience as senior subject teachers. With 243 years of collective experience in school and classroom management among all participants, the data collected was valuable. A focus group interview was conducted at each research site which included the school principal, two HoDs and two educators teaching in multi-grade classrooms. Individual interviews were conducted with the school principal at each research site and classroom observation took place in four classrooms where multi-grade teaching was carried out. It was clear from Table 4.2 that the majority of school management participants were well qualified, having obtained a professional qualification, with four participants having obtained honours degrees.

4.4 RESEARCH FINDINGS

The confidentiality of participant disclosures and the authenticity of interpretations entailed that the verbatim excerpts of participants substantiating findings are distinguished by means of labels. As depicted in Table 4.2, A, B, C, D, E, F, G, H, I, and J were used to distinguish between the different participants in the study that included school principal participants, HoD participants and educators teaching in a multi-grade classroom at the selected schools. The two schools are depicted as School 1 and School 2.

Five categories emerged from the encoded data collected through individual and focus group interviews as well as classroom observation relating to effective classroom management to improve learner development in a multi-grade classroom. These categories include reasons for introducing multi-grade classes at a school; establishing a sound culture of teaching and learning in a multi-grade classroom; ensuring effective and good quality teaching and learning in a multi-grade classroom; challenges and positive factors faced in the multi-grade classroom context; and attitudes towards managing multi-grade classes. These five categories are discussed in the following sections.

4.4.1 Reasons for introducing multi-grade classes at the schools

Within the South African context policies such as learner-teacher ratio and the redeployment and rationalisation of teachers contribute to the placement of educators in schools where they have to teach in a multi-grade classroom setting.

School 1 is a dual-language (Xhosa and Tswana) school, so to have decided on multi-grade class arrangements 'just made sense because we have lack of space, so if we could have more classes then we can separate the grades' (Participant A). The main reason School 2 introduced multi-grade classes is the low number of Afrikaans speaking learners at School 2. Because of decreasing numbers of Afrikaans speaking learners:

'We combined the Grade 1 and Grade 2 Afrikaans classes which was easy to arrange because it is a very small group of learners, so it does not justify at this time to appoint another teacher according to the ratio of learners vs teacher stated by the Department. They are only 12 learners in the combined class so it just made sense to implement multi-grade teaching' (Participant F).

The principal of School 2 emphasised that at their school they were not concerned about the quality of teaching and learning within a multi-grade class setting because they knew learners would be subject to good quality teaching 'because the teacher that teaches the multi-grade class is very competent and has a lot of experience in multi-grade teaching.'

4.4.2 Establishing a sound culture of teaching and learning in a multi-grade classroom context

In order to achieve good quality education, there must be strategies established to secure a sound culture of teaching and learning. The school management team of both schools stated that the primary objective of their school is a holistic approach to teaching and learning in order to improve their learners' academic results. Participant G emphasised that 'one of my main duties as an HoD is to make sure that all work is covered by the teacher and mastered by the learners in accordance to the curriculum'.

According to the one school principal (participant A), the primary goal of a school is 'to get learners to qualify themselves to be respectable members of the country that can contribute to society'. In a multi-grade classroom, there are factors at play that are not found in a mono-grade classroom. According to participant I, one of these factors relates to having an extra workload in the sense that 'there are more than one grade in a multi-grade class, so the class is divided into two groups and the teacher must be doubly prepared because she teaches two grades at the same time'. This results in less time to recover from strain because 'you never get a chance to rest while teaching a multi-grade class, it is hectic' (Participant A). The strategies for establishing a sound culture of teaching and learning in a multi-grade classroom pertain to teachers providing support to learners with different demands relating to different levels of development in a multi-grade classroom setting; maintaining discipline in a multi-grade classroom; the nature of educator/learner interaction and seating arrangements in the multi-grade classroom to ensure effective teaching and learning. These strategies are discussed next.

4.4.2.1 Providing support to learners in a multi-grade classroom context

The main incentive of a school should be to do everything that is in the best interest of the learners. Participants from both schools stated that they follow a holistic approach to teaching where there must be a healthy balance between academic work, sport and culture and that when educators are aware of all the learners achieving to their abilities, this contributes to the development of a sound culture of teaching and learning.

It was evident from the interviews with participants that both selected schools focus on supporting learners who are performing poorly, including learners who are subject to multi-grade settings. Participant F, principal of School 2, stated that intervention is a big priority at their school. He explained the actions taken to support learners in need as follows: 'At our weekly SBST-meeting children with specific needs or problems are identified and the HoDs also take charge of helping and assisting those learners'. In this regard HoDs compile a report on the findings about learners with learning problems that are discussed at a meeting with the School Based Support Team, where a decision is made on the best kind of support to be provided. Participant F explained:

'HoDs set up academic reports as well as diagnostic reports so that the principal can analyse and see if there are any fall outs and that the graphs look in order. Based on these reports, interventions needed are determined and support are then provided' (Participant F).

The school principals, participants A and F, personally analyse the results of learners and develop intervention strategies to assist these learners to improve their academic performance.

School 2 has a proactive intervention strategy to assist poorly performing learners while School 1 'tackle challenges as they arise' (Participant A). At School 2, it is compulsory for all educators to identify learners who struggle and to arrange a time after school each week to do revision or remedial work. Subject teachers from Grade 4 to 7 are expected to provide extra assistance in their subjects in 'areas that learners tend to struggle with' (Participant A). From the interviews with participants, it was clear that, at both selected schools, the focus is on encouraging teachers to use opportunities in the classroom to motivate learners to do their best and to accommodate those who struggle by intervention and extra support. The fact that learners are subject to multi-grade teaching does not have an influence on pursuing the intent of supporting individual learners with learning needs.

4.4.2.2 Maintaining discipline in a multi-grade classroom

Constructive learner discipline establishes and sustains a culture of teaching and learning. Participant I explained the importance of discipline, specifically in a multigrade classroom, for successful teaching and learning by emphasising that *'if there is no discipline, there is chaos in the classroom.'* Lack of discipline has a negative impact on effective teaching and learning in a multi-grade classroom.

Once lessons are interrupted owing to discipline problems, teachers have difficulty in focusing on their teaching task. Therefore, by constantly alerting learners to the negative effect of ill-disciplined behaviour on the classroom ambience, teaching and learning actions and eventual academic performance, a learning culture is fostered

that does not tolerate a lack of discipline in the classroom. At School 1 it was noticed during class observation that learners were extremely quiet and reserved during lesson time. A zero-tolerance-to-noise approach is realised and teachers are very strict with regard to learners interacting with one another or talking or making a noise. This approach of having zero tolerance to noisiness was motivated as follows by participant E: 'The number of learners in the class is very big, we can't allow them to talk otherwise we lose it.' At School 1 there is only one break at twelve o clock which serves as another attempt to keep learners well disciplined. Participant G mentioned that 'we only have one break because it takes so long to calm the class down after break because if we have break they lose focus.' While observing the classroom at School 2 it was noticed that a different approach to maintaining discipline was followed. Learners were more actively part of the lesson, so a 'soft buzz' was present most of the time. Participant J mentioned that 'because it is a nice small class, the discipline is very good.' Principals of both research sites mentioned that all disciplinary steps should contribute to the establishment of a sound culture of teaching and learning.

4.4.2.3 The nature of educator/learner interaction

The school principals of School 1 and 2 (Participants A and F) both acknowledged that teachers teaching multi-grade classes are facing a challenging task demanding clear and complete preparedness for every school day and every lesson. In this regard, participant F explained that 'if the educator is not very well prepared, it can be a challenge for her, the management team and ultimately the learners in the multi-grade classroom.'

It was observed that at School 1 interactions between the educators and the learners were mostly restricted by the fact that there were large numbers of learners in all the class groups and only one teacher teaching each class. All the multi-grade classes at School 1 had at least 40 learners per class and sometimes more than 50 learners in one class who are taught by one educator only. It was observed that at some of the Intermediate Phase classes (Grades 4 to 7), the educator would interact with one grade group while the other group had to sit and wait for their turn to be taught. In some instances, one group would sit for up to an hour with nothing to do but fiddle or

sleep on their arms before receiving any attention from the educator. At two of the five classes that were observed, the educators did not facilitate a specific topic or lesson and used recitation as a teaching method where learners merely recited stories from their text books aloud and together as a class while the educator sat on a chair. At School 2 with its one multi-grade class with 17 learners in total, the educator was well prepared, and all the learners were actively involved in the lesson most of the time. Participants B, D and I are educators of multi-grade classes in the Foundation Phase (Gr 1 to 3), where a more interactive and informal kind of teaching approach was noticed. Multi-grade teaching at these school grades involved much singing, dancing and rhyming in lessons, motivated by the fact that 'kids learn more when they have fun' (Participant D).

It was the observation of the researcher that as soon as young learners have fun and interact with the educator during lessons, positive energy is released engendering motivation to do more and to try their best. Therefore, it was noted that positive and lively learner/teacher interaction establishes a sound culture of teaching and learning in a multi-grade classroom.

4.4.2.4 Seating arrangements in the multi-grade classroom

During the observation of seven different multi-grade classrooms at the two research sites, it was noticed that in all these classrooms the learners were split into two different groups according to their grade. In only two of the seven classrooms were there evidence of older learners assisting younger learners by helping them with reading and playing educational games. The classroom tables were structured in rows, which was not conducive to cooperative team work endeavour, resulting in learners mostly working individually.

4.4.3 Ensuring good quality teaching and learning in multi-grade classrooms

Schools are places in which parents, children and teachers renew and enrich their lives, thus empowering and capacitating each other to increased efficiency. In order to achieve this efficiency, good quality education is essential.

It was evident from the interviews with participants that both selected schools take an interest in ensuring good quality education for the learners in multi-grade classes. At School 2, 'the HoDs do two weekly checks of files and books to ensure that curriculum coverage takes place' (Participant F). However, to ensure adequate curriculum coverage, and to ensure teaching of a high quality so that learners can learn and progress effectively, certain factors need to be addressed by applying applicable strategies. The strategies for establishing good quality teaching and learning in multigrade classrooms pertain to providing support to teachers teaching in these classrooms; determining the role of the school principal in ensuring good quality teaching and learning; acknowledging the supporting role of the HoD in this context; utilising educators as instructional leaders who teach in a multi-grade classroom context; realising the importance of quality control; and determining feasible educator-learner ratios for a multi-grade class setting.

4.4.3.1 Providing support to teachers teaching in multi-grade classrooms

Educators in multi-grade classrooms need support with specific planning skills as these planning skills relate to teaching effectively in a multi-grade classroom context. Although there is evidence that the teachers teaching in multi-grade classes at the two research sites receive assistance from the Department of Basic Education, both principal participants agreed that the teachers teaching multi-grade classes need much more assistance and that more training opportunities should be arranged to provide support to these teachers.

In this regard participant B confirmed: 'We don't receive that much support from the Department. They just send us the multi-grade lesson plan, but no assistance is given on how to implement it.' Although an official from the District Office or even sometimes from the Provincial Education Department visits the school every quarter, 'they give recommendations that can be used at a 'normal' school [school with mono-grade classes], forgetting that we are a multi-grade school, which is a big challenge because that is not the reality of the situation' (Participant B).

Although the two research sites are in the same district, School 1 receives worked out lesson plans for the multi-grade teachers from the District Office, but the other school

had no idea that they could be supported by obtaining already worked-out lesson plans and therefore the educators do their own lesson planning. In order to arrange their own lesson planning, the educators use a website called 'Myklaskamer' to guide them in setting up their own lesson plans. The educators finance this service themselves because they 'pay it from our own pockets' (Participant I). Both principals admitted that regular visits from the District Office occur, and that the Subject Advisors are very supportive. According to participant G, 'they support us with everything. If we ask for help or guidance they will come'. Participant G emphasised that they 'have lovely Foundation Phase facilitators that are very helpful and supportive' and educators carry out their multi-grade teaching tasks knowing that 'if we can't cope they will intervene and help us.' However, thanks to competent teaching staff, 'so far, we didn't need them to come and help because our teacher that teaches the multi-grade class is very competent' (Participant G).

With regard to in-service training opportunities, teachers teaching multi-grade classes are offered training opportunities by the Department of Education albeit limited. However, regarding assistance with lesson planning and ways of assessment, 'from the Department, there is no support in regard to preparation or formal assessments. The educator must set up her own worksheets and do individual planning for all the different grades in her multi-grade classroom' (Participant F). Participant F also communicated his misgivings regarding Departmental sentiments towards multi-grade teaching by stating that:

'I don't think that the department is a big fan of multi-grade teaching, but at our school we don't have a choice because the Afrikaans speaking learners are very few and most Afrikaans speaking learners attend the Afrikaans neighbouring school' (Participant F).

Both principal participants agreed that educators need to be organised and plan all their lessons well to be effective in teaching in a multi-grade classroom. Participant F as principal of School 2 explained that the educators are encouraged to voice their problems and grievances with the school management team for the necessary support and guidance. Participant F further explained the role fulfilled by the HoDs with regard to subject training and in-service training to ensure that teachers receive the necessary

support and guidance in order to be capacitated for their teaching tasks. Participant F proclaimed:

'HoDs do subject training, for example if there is a teacher and that teacher struggles or is not informed about proper practise, then there will be a meeting with the principal and deputy principal where training will be given to that teacher by the HOD. Throughout the year all teachers are expected to attend in-service training provided by the district or department. HoDs take charge of that.'

An assistant to lighten the workload of the multi-grade teacher was mentioned as a supportive structure to ensure effective teaching and learning in these classrooms. An assistant can provide support with, for example, marking of books and doing general administrative tasks like keeping the attendance register and managing learners during lesson activities. Participant B explained the value of having an assistant, someone who, due to financial constraints, cannot be provided for each multi-grade classroom:

'There is an assistant with me in the classroom helping me to manage the multigrade classroom. The assistant also helps a lot with admin and marking. It is a shame we can only afford one assistant and wish we could have an assistant with each of the multi-grade classes at our school, but we are a no-fee school, so we can't afford to pay the salaries of more assistants' (Participant B).

Educational tools, instruments and resources are specifically needed in a multi-grade classroom to promote effective teaching and learning. Instructional materials in the form of workbooks, textbooks or a small classroom library that can be accessed independently by learners is an essential teaching and learning resource in a multi-grade classroom. There was a big difference observed regarding the quantity and quality of educational resources available and used in the multi-grade classrooms at the different research sites. At School 1, being a no-fee school, it was observed that Caps DBE workbooks were used as well as visual aids in the form of posters against the walls. One educator participant made her own flashcards on paper. School 2 is a section 21 school and it was observed that the multi-grade class had educational

resources and tools in abundance. There were many extra exercise books, a reading corner with many books on different reading levels, a container of colourful clay for each learner to play and build with, an abacus for each learner to count and do sums on, and white boards with white board markers for learners to write on. The classroom was also issued with an overhead projector and with Wi-Fi for internet connection. Each learner had his/her own chair bag to organise his/her workspace. The availability of adequate teaching and learning materials at School 2 was attributed to skilful budgeting by the school in that 'the school provides a lot of teaching resources and tools because when the budget is done yearly, there is specifically provided to the multi-grade educator's needs' (Participant F). This well provisioning for multi-grade teaching is further supplemented by teachers using their own money to buy apparatus to assist learners in the face of Departmental inadequacy to provide teaching and learning resources. Participant G emphasised that 'the Department of Education does not assist us financially.'

4.4.3.2 Contribution of the school principal to teaching and learning in a multigrade context

It was apparent that both school principals at the two research sites followed an approach of attaching special value to good quality teaching and learning so that learning outcomes, outlined by government policy, can be effectively reached. Participants agreed that school principals established a culture of teaching and learning through involvement in professional development, interaction with educators, learners and parents, emotional support to staff and by the example that they set daily.

It was observed by the researcher that the school principal at School 2 facilitated a culture of teaching and learning through staff development sessions and, in the few days that the researcher visited the research site, there were two different staff development sessions held in the staffroom by the school principal. Both school principal participants encouraged educators to develop professionally because 'throughout the year all teachers are expected to attend in-service training provided by the District Office or Department' (Participant F). According to participant A, 'there are cluster meetings about twice a year that the educators attend.'

At both research sites, it was observed that close interaction between the educators and the principal is a priority. To establish this 'closeness', good communication between the educators and the school principal is maintained by daily staff meetings which contribute to educators being prepared for the day as operational arrangements are communicated daily during these meetings, regular class visits are carried out, and a general 'open door' policy is maintained regarding access to the principal in his/her office. Participant F explained the open-door-approach practiced at their school in relation to access to the school management team whenever the need arises in that 'the educator is encouraged to come to the school management team with any problems or grievances so that she can receive the necessary help and guidance.'

One way of supporting the educator teaching in a multi-grade classroom is to ensure that the number of learners is not too high. Teaching two different grades in the same classroom in the same timeframe is already challenging enough, and too many learners in a class will negatively affect the quality and efficiency of teaching and learning. According to participant D at School 1 'learner numbers are too big in our multi-grade classes. We can't teach properly'. In contrast, and according to participant F at School 2, 'the multi-grade classroom is very small so the ratio of learners to teacher is ideal and that ensures that the educator can teach properly.' This was underscored by participant H who emphasised that 'the classroom (ratio of learners to teacher) is correct – there is a small number of learners in the multi-grade classroom.'

When the school principal interacts with learners, it contributes to a sound culture of teaching and learning. The school principal of School 1 (Participant A) uses weekly assemblies to inform learners about the kind of behaviour and standard of work expected from them and important information about the activities of that specific week is communicated. The school principal of School 2 (Participant F) emphasised that weekly assemblies provide all learners with a fair opportunity to receive recognition from the school principal if they have achieved something special.

As the primary educators of their children, parents need to be informed about what is expected of them regarding the schooling of their children. Both school principals agreed that it is essential that parents of learners in a multi-grade classroom are informed about their children's performance and about ways to assist their children to

improve their performance. Meetings are held to assist parents to develop a clear picture of school functioning and to be informed about all the efforts by management and staff to ensure that learners receive a proper education. The school principal of School 2 (Participant F) explained that there are frequent meetings scheduled with the parents of learners in the multi-grade classroom to discuss matters of concern relating to limited individual attention for their children and being assigned to one teacher for a prolonged period of time. Participant F proclaimed:

'Many parents are very sceptical about their children being in a multi-grade classroom because they are worried about their child's individual needs not being met, or that the child is unhappy to stay with the same teacher for more than one year'.

To contribute to a sound culture of teaching and learning, the school principal must liaise with parents frequently, and 'the parents must feel supported and heard by the principal, the parents must buy in to multi-grade teaching' (Participant F).

An important aspect of the school principal's duties is to emotionally support the multigrade teachers. Teachers must feel worthy and supported and they must be assured that their voices are heard. A motivated teacher has the confidence to perform to the best of their ability. School principal participants emphasised the importance of staff's emotional wellness to contribute to effective teaching and learning in a multi-grade classroom. In this regard, the school principal of School 1 explained her efforts of being a guardian angel for her teachers, understanding their situatedness, and being sensitised to beginner teachers' struggles to cope professionally. She reported as follows:

'I try and always be there for the teachers. Young teachers are very overwhelmed to teach in a multi-grade class. To give teachers emotional support, if they are not coping, I try and help them by encouraging them to stay strong. When a new learner that cannot speak the language are coming in, I try and prepare the teacher in advance. I want to show them that I understand. I was there, I also went through it' (Participant A).

Participants agreed that school principals contribute significantly to effective management of teaching and learning in a multi-grade classroom by the example that they set. This example relates to a dedicated presence in the sense of 'I am the first one at school in the morning and the last to leave. During the holiday, I come in every day to work and to make sure everything is sorted' (Participant A).

4.4.3.3 The role of the HoD in a multi-grade context

Both school principals singled out the HoDs as being a very important part of the school management team and emphasised the importance of a consistent monitoring programme to ensure good quality teaching and learning. At School 1 the management team consists of the school principal and two HoDs (one in the Intermediate Phase and one in the Foundation Phase). In the past, School 1 had an extra teacher who was included as part of the management team, 'but we stopped that because of the small teacher group of 11' (Participant A). School 2 has a school management team consisting of the principal, the deputy principal and three HoDs (one in the Senior Phase, one in the Intermediate Phase and one in the Foundation Phase). Each grade has a grade leader and there is a subject head for each subject.

With regard to School 2 with its three HoDs, certain subjects are allocated to the Senior Phase HoD and other subjects to the Intermediate Phase HoD to take responsibility for, while the Foundation Phase HOD takes responsibility for all academic matters pertaining to grades R to 3 including the multi-grade group (Gr1 and Gr2). The three HoDs represent a support team with their support actions explained as follows:

'The HoDs all work together as the School Based Support team that meets every Thursday at 05:40 where learners in need of support are discussed or any other pressing matters needing urgent attention are being addressed' (Participant F).

With regard to the tasks and accountability relating to being an HoD, at School 1 these tasks pertain to managing time tables, human resource allocation, and human resource work performance. According to participant A at School 1:

'HoDs draw up time tables, do class allocation and they also help with resources. They monitor all levels of preparation. They monitor implementation, do general monitoring, for example to check if teachers are in class on time and they ensure that the management plan is accurately implemented'. HoDs also have to liaise with the District office and 'when the principal is absent and in case of no deputy head, then HoDs take charge of school functioning' (Participant C).

Apart from fulfilling all the responsibilities as pointed out by participants from School 1, at School 2 the HoDs are also involved in carrying out regular class visits. Furthermore, they do book control of learners' workbooks and the subject planning files of teachers. Every two weeks educators must hand in subject files and workbooks, based on a schedule provided to each teacher indicating the dates of submission. This schedule is handed to each teacher at the start of each term. With regard to the HoDs' involvement in curriculum application, it is perceived as the main overarching responsibility of the HoD to oversee sufficient and effective coverage of the curriculum. Participant F proclaimed as follows:

'The most important task of the HoDs is to test that curriculum coverage is done properly by teachers and to make sure all is on track. If a teacher is behind or not on track, intervention will take place, and a plan will be put in place to assist that teacher to get on schedule.'

The HoDs develop an academic plan and all teachers must make sure to work according to that plan applying to all class settings, including class settings of a multigrade nature. The responsibilities of HoDs regarding learners with learning needs include supporting assistance and recording of the progress with assistance because:

'... at our weekly SBST-meeting children with specific needs or problems are identified and the HoD's also take charge of helping and assisting those learners and they set up a report on the findings that are discussed at a meeting with the School Based Support Team, where after a decision is made about further action' (Participant F).

The HoDs produce academic reports as well as diagnostic reports so that the school principal can analyse and see if there are any learners with marks much lower than the grade average. Decisions are then taken on any interventions needed and the kind of support to be provided. HoDs are also responsible for providing subject training when a teacher struggles to cope with the teaching task or when a teacher is not informed properly about tailor-made practises. With such situations, a meeting is called with the school principal and deputy principal where after training follows provided to the teacher in need by his/her HOD. Throughout the year all teachers are expected to attend in service training provided by the District or Department of Education and 'HoDs are responsible to arrange the attendance of in-service training opportunities' (Participant H). HoDs verify the quality, correctness and standard of all tests and formal assessments by carrying out 'pre- and post-moderation' (Participant G). Subjects, as these subjects relate to proper and complete content engagement, are analysed and checked regularly.

4.4.3.4 Educators teaching in a multi-grade classroom context

Educators play an important role in overcoming the difficulties of teaching in multigrade classrooms by meeting the varied needs of multi-grade learners through an indepth knowledge of child development and how learners learn and by being able to use a variety of teaching strategies to cater for learners' different learning needs. By being focussed on educative teaching and being dedicated to improved academic achievement, this results in a spiralling snowball effect of improved teaching and learning. Participants agreed that educators teaching in a multi-grade context must be utilised as instructional leaders.

Participants confirmed the importance of educators to ensure quality teaching and learning in a multi-grade classroom by emphasising that educators must be prepared for each lesson completely and comprehensively. With regard to lesson preparation and guidance received from the authorities, participant D explained that 'We do our own preparation. We have an ATP (Annual Teaching Plan) from the Department of Education and according to that ATP we must do our lesson plans, which helps a lot.' Part of thorough planning involves being prepared for continuous and sustained interactive engagement with the teaching and learning process in the sense that 'the

educator teaching in a multi-grade classroom can't sit but has to interact with the learners throughout the lesson' (Participant I). The content of lessons in a multi-grade setting should be on the same topic but should differ in level of complexity so that older learners, who are more advanced than younger learners, progress adequately on their level of development while younger learners engage with content on a lower learning level to ensure optimal learning. Participant B explained this approach of the same content on different levels of complexity as follows: 'I try to incorporate the Grade 1 content with the Grade 2 content, but so that the difficulty only differs so that both grades can have quality education'. In a multi-grade classroom, it is very important to cater for every individual child's needs. It was emphasised by all participants that such individual attention is only possible when the number of learners in a multi-grade classroom is manageably low. Participant I confirmed the feasibility of individual attention with a small number of learners engendering lesson planning relating to 'according to where they [learners] are now. Because of the small number of learners in my multi-grade classroom, I can give a lot of individual, personal attention to each learner.' Contrary to the ease of providing good quality teaching and learning opportunities in conditions of manageable class sizes, participant D at School 1 complained about the huge challenge of providing teaching and learning opportunities to classes with high numbers of learners. She stated:

'The amount of learners in the multi-grade classes, especially the Grade 4 and 6 mixed class, is very high so it is extremely difficult to almost impossible to teach them properly and to give personal attention to learners' different needs' (Participant D).

Educators must evaluate learner progress throughout the term with continuous formative assessment arrangements. In this regard, participant G explained that with the Foundation Phase, 'teachers set up their own assessments according to CAPS policy documents and according to the ATP provided'. Participant G pointed out that with the assessments carried out in the Foundation Phase, 'we do continuous assessment, so it will be an assessment as per set up dates during the term.' The essence of these assessments which represent 'individual assessment at the end of a theme' (Participant C) pertains to determining and confirming that 'learners basically demonstrate the skill that they have mastered' (Participant C). In order to ensure that learners meet predetermined outputs successfully, participant F emphasised that

'smaller classes, proper space, proper zoned areas for reading or group work are key aspects that need priority especially in a multi-grade classroom.' For teaching and learning to realise optimally in a multi-grade classroom setting, 'you need a lot of apparatus and a lot of books that can assist the leaners in their learning actions, and it is ultimately the teacher's responsibility that these things are in order' (Participant C).

4.4.3.5 Quality control

As demanded by the Department of Education, the HoDs of the selected schools conduct continual book and planning file control, class visits and quality checks to assess the work facilitated by educators in the multi-grade classroom setting and to ensure that learners' mastering of required knowledge and skills is up to standard.

At School 2, these activities of HoDs doing regular class visits, controlling learners' workbooks and checking the subject planning files of teachers take place according to a schedule of 'every two weeks educators must hand in subject files and workbooks, and there is a schedule given to each teacher with the dates of submission that they receive at the start of each term (Participant F). As was said in section 4.4.3.3, the most important task of the HoDs is to ensure that curriculum coverage occurs satisfactorily by monitoring consistently that teachers remain on track with their facilitation of important content. Intervention is crucial when teachers battle with their teaching tasks. As pointed out in section 4.4.3.3, this intervention relates to 'a plan [that] will be put in place to assist that teacher to get on schedule' (Participant F). Part of quality control is the development of an academic plan by the HoDs to be adhered to by all members of staff (section 4.4.3.3).

Quality control at School 2 also includes weekly SBST (School Based Support Team) meetings, where children with specific needs and children who have serious problems of an academic nature are identified and the HoDs are then accountable for arranging special assistance to those learners with follow-up reports to the School Based Support Team (section 4.4.3.3). At School 2 a further act representing quality control and sharing with all instructional leaders is that the HoDs compile academic and diagnostic reports for everyone's perusal, but especially for the attention of the

principal. This is done in order to analyse the data and determine strengths and weaknesses with follow-up planning to counter the weaknesses and to excel on the strengths (section 4.4.3.3). Any interventions needed based on this analysis of strengths and weaknesses can then be decided upon and plans of action taken (section 4.4.3.3).

With regard to quality control at School 2, HoDs are also tasked with subject training, such as, for example, 'if there is a teacher and that teacher struggles or is not informed about proper practise, then there will be a meeting with the principal and deputy principal where training will be given to that teacher by the HOD' (Participant F; section 4.4.3.2). As was explained in section 4.4.3.2, an important part of successful teaching and learning that relates to quality control in the sense of bettering provisioning on a consistent basis is the need for opportunities for in-service training to staff throughout the year as provided by the District or the Department of Education. The HoDs at School 2 are responsible for managing these in-service training activities. They are also responsible for monitoring and confirming the quality, the accuracy, the fairness and the standard of all formative and summative assessment actions. As said in section 4.4.3.3, this they do by carrying out moderation before and after assessment of learning outputs and by checking and analysing learning scores for all subjects on a regular and continuous basis.

According to participant A and as was pointed out in section 4.4.3.3 with regard to quality control at School 1, HoDs draw up time tables, they are responsible for class allocations according to teachers' knowledge and skills, and they assist with the organising of adequate and applicable resources for teaching and learning. For the sake of quality control, and with regard to the multi-grade teaching environment, HoDs monitor the level of preparation for each grade and the implementation of this preparation. In collaboration with the School Management Team, general monitoring of proper school functioning includes, as pointed out in section 4.4.3.3 'to check if teachers are in class on time' (Participant A). At School 1, HoDs ensure that the school's management plan is accurately implemented and HoDs liaise with the District Office regarding applicable teaching and learning. When the principal is absent, and the deputy head is otherwise engaged, HoDs are in charge of the day's school functioning (section 4.4.3.3).

4.4.3.6 Educator-learner ratio in multi-grade classrooms

As was pointed out in section 4.3, there was a significant difference between the number of learners in the multi-grade classrooms at the two research sites. School 1 with its five multi-grade classes and large class sizes of up to 50 learners per multigrade classroom, was in stark contrast to the small number, namely only 17 learners, in the multi-grade classroom at School 2. Throughout the study, it was clear that all participants strongly agreed that the number of learners in a multi-grade classroom determines the success or failure in terms of successful teaching and learning. Participant G stated unequivocally that 'only if it is a small group of learners will a multigrade class be effective. When asked about the ultimate number of learners per multigrade classroom in order to facilitate successful teaching and learning, participant G with her thorough teaching experience of 39 years in both mono-grade classes and multi-grade classes (section 4.3) emphasised that 'the total number of learners must not exceed 25 learners; if it is more than 25 it is complete chaos.' Participant J concurred with the direct correlation between multi-grade teaching effectiveness and class size by stating as follows: 'If the number of learners in a multi-grade classroom is small, then, yes, it is effective, so, at our school it is working effectively and I do not feel overwhelmed to teach.'

4.4.4 Challenges and positive factors in the multi-grade classroom context

Regardless of the different challenges encountered with multi-grade teaching, there were also positive results for learners exposed to multi-grade teaching.

With regard to challenges in ensuring positive learning outcomes, at both research sites multi-grade classes have arisen out of necessity rather than by design. The teacher participants at School 1 all agreed that it feels like they are attempting to teach a curriculum designed for mono-grade classrooms and that there is no specific assistance provided to schools with multi-grade classrooms. Schools forced to provide multi-grade teaching are often exposed to a lack of sufficient training on how to manage a classroom consisting of different age groups grouped together and how to utilise available resources adequately to accommodate all learning needs in the multi-

grade classroom. The training that is provided to multi-grade teachers does not address multi-grade teaching skills because 'even though we go to the workshops, they never give us specific help regarding multi-grade teaching, they just assume that we are in a normal [mono-grade] teaching situation' (Participant D). Participant D further stated that 'they help us with workshops, but we struggle to teach multi-grade classes like ours with the big classes and learners speaking different languages'. Participant E admitted that she was never trained for multi-grade teaching conditions. She proclaimed as follows: 'To be honest, I have never received any formal training. They just give us the lesson plan and say that we much teach it in a multi-grade class.' The professional and social isolation experienced by the educators at School 1 exposed to multi-grade teaching was exacerbated by the constraints of a lack of teaching resources as logically worsened by extreme large class sizes and poor and dangerous working conditions. These dangerous working conditions relate to continuous conflict of an ethnic nature pertaining to a quest for ownership based on historical arrangements because 'the Basotho homeland persons working at the mine has owned this area as theirs (Participant A). Because of this ownership entitlement, 'there is a lot of unrest between the Basotho and police and protests sometimes become violent with our school in the middle of all of this unrest, so it is very dangerous' (Participant A). The negative influence of this constant turmoil on successful teaching and learning includes that 'learners can't stay after school for extra remedial classes, because they have to leave the area immediately for their own safety' (Participant A). The same scenario applies to teachers who are also experiencing a lack of physical safety, which worsens the challenges they experience with teaching.

At both research sites, it was mentioned that the minimum prescribed curricular learning competencies to achieve are specifically designed for regular mono-grade classroom situations and that the multi-grade teachers sometimes find it difficult to make the content meaningful to the learners in their multi-grade class setting. As the educator must be able to give instruction in various subjects demanding specialised knowledge of all the different subjects, this needs to be facilitated on different levels requiring that the teacher should apply different teaching skills on a daily basis. Teaching a multi-grade classroom is 'time consuming because the educator must plan

a single lesson for learners in different grades and then the learners must be actively engaging in the lesson in the same timeframe' (Participant I).

The non-negotiability of small class sizes for successful multi-grade teaching and learning was strongly emphasised at both research sites. At School 2, with its 17 learners exposed to multi-grade teaching (section 4.3), educators were passionate about their teaching task and felt that they had their classroom management under control. In contrast, the participants of School 1 with multi-grade classes reaching up to 53 learners per class were in agreement that their negative attitude towards multi-grade teaching pertained mainly to the fact that 'the biggest challenge is the large numbers of learners in the multi-grade classrooms' (Participant B). When learner numbers are too high, 'intervention and extra support is a challenge' (Participant B). Participant G agreed that if the total number of learners per class is more than 25, 'you cannot have your reading and consolidation and your phonics done with very large classes, especially in a multi-grade class.'

In multi-grade classrooms teachers do not focus on all learners all the time as teachers' attention is spread over learners in different grades with different abilities and different tasks. All participants agreed with this statement. Within a resource-poor context in particular, such as observed at School 1, teachers are more likely to miss out on adequate professional development opportunities to obtain skills on how to respond to a diverse range of learning needs. It was clear from the interviews with participants that a limited understanding of developing multiple lesson plans for a multi-grade teaching situation accommodating different groups of learners representing different school grades was a major challenge faced by teachers teaching in multi-grade classrooms, especially when these classrooms consisted of high learner numbers.

Some factors, however, were also observed in the multi-grade classroom context that had a positive influence on teaching and learning. One of these factors pertains to the learner and educator knowing each other personally and caring for each other passionately. Learners have a stronger feeling of belonging and the family-like atmosphere in the classroom is inviting. According to participant F, 'some learners struggle emotionally to adapt to a new grade and new teacher, so multi-grade classes

can be beneficial to those learners.' When a child is emotionally immature for their age and cannot find a playmate of their own age, 'they can play with a younger child in their class' (Participant F). In a multi-grade classroom, it gives a young gifted child a sense of achievement to realise that he/she can do what the older learners are doing by merely observing and listening to what the educator teaches them.

With regard to opportunities for enrichment and repetition in the multi-grade classroom setting, participant F explained that 'younger ones in the multi-grade classroom (are) enriched by being in a class with older learners, and the older learners in the multigrade class can catch up on concepts that they might have lost somewhere along the line'. This implies subconscious remediation for older learners struggling with concepts in that 'a bit of remedial activity takes place without them even realising because they hear older concepts again, so, a strong foundation is set when they then leave the classroom for the next grade' (Participant F). Learners help each other consistently in the multi-grade classroom context which provides for more leadership opportunities to flourish. According to participant I, this opportunity to excel in leadership practice pertains to 'the older learners in a multi-grade class are much stronger and they enjoy helping the younger learners in the class. It gives them a sense of responsibility and pride.' If the multi-grade classroom has small numbers, learners get much more personal attention and this personal attention motivates self-confidence. Repetition of facts and concepts is a significantly wonderful advantage of a multi-grade classroom setting.

Certain financial implications also impact the effectiveness of teaching and learning within conditions of multi-grade teaching. It was noted by participant G that most of the educators at School 2 do not receive monthly salaries from the Department of Education. Participant G proclaimed: 'There is a handful of teachers that gets paid by the government, the rest of the teacher's salaries come from the pockets of the school and, in effect, the salaries are much less.' This scenario causes School 2 to struggle to appoint skilled educators because 'the more skilled and educated a person is, the more money they expect to be paid as compensation for their work' (Participant H). At School 1 the Department of Education 'helps a lot with funding our school, because we are a no-fee school' (Participant A). According to participant G, the Department of Basic Education does not assist their school (School 2) financially to cope with

'appointing more teachers and assistants and teachers use a lot of their own money to buy apparatus to assist the learners'. However, although 'the financial burden on the school is too much at this stage' (Participant G), the teacher corps consists of dedicated personnel who remain passionate about their profession motivated by the philosophy of 'doing what you can where you are' (Participant I).

4.4.5 Parents of learners in multi-grade classes

As the primary educators of their children, parents need to be informed about what is expected of them with regard to the schooling of their children because 'informed parents contribute to a culture of teaching and learning and the improved performance of their children' (Participant F). As parents have a direct influence on the academic performance of their children and the culture of teaching and learning prevailing at school, 'one can see the involvement, or lack thereof, of parents in their children's well-being' (Participant A).

Participants emphasised that schools rely heavily on the parents' emotional and moral support to communicate the importance of education to their children. Regardless of the parents' level of education, they have knowledge, skills and wisdom to contribute to the education of their children. Part of this contribution is parents' moral support for effective teaching and learning in a multi-grade classroom context. A challenge experienced is that of some parents being unhappy about their child being in a multigrade classroom. This unhappiness pertains to parents' scepticism about their child's individual needs being met and being subject to the same teaching by the same teacher for consecutive years (section 4.4.4). Parents are also concerned about the possibility of their child being unhappy to stay with the same teacher for more than one year. In this regard, regular meetings with parents are scheduled at School 2 to discuss problems and to ease parents' possible concerns (section 4.4.3.2). As stated by the school principal of School 2 regarding the importance of getting parents to buy into the idea of multi-grade teaching (section 4.4.3.2), 'the benefits that multi-grade teaching hold for their children, must be promoted clearly and constantly' (Participant F).

4.4.6 The emotions and attitudes pertaining to a multi-grade teaching context

The general view of mono-grade teaching as the 'normal' way to organise classes is widespread. Multi-grade classrooms are viewed as an unavoidable nuisance. Consequently, educators are resistant to the idea of multi-grade classes and this results in a lack of faith in multi-grade pedagogy. It was observed that many of the participants at the research sites hold a negative attitude towards their role in a multi-grade teaching context. This is attributed to the fact that the curriculum, educational materials, teacher preparation and assessment systems are predicted on schools with mono-grade classroom settings.

During formal observation, it was observed that participant I at School 2 was capacitated with the ability to adapt the single graded lesson structure to meet the needs of the multi-grade classroom context. She explained that her successful teaching and learning practice pertained to sustaining both grades' attention by facilitating the same content on different levels of engagement which is only possible with thorough planning for each lesson. In her own words:

'I incorporate the grade 1 content with the grade 2 content, but so that the difficulty only differs so that both grades can have quality education simultaneously. I plan ahead to keep all grade levels busy the whole time, because if they sit around with nothing to do and if there is no discipline, there is chaos in the classroom' (Participant I).

Participant E (School 1) voiced her negative emotions on being a teacher teaching in a multi-grade class as relating to the magnitude of task execution which is severely overwhelming to the extent of being harmful to her physical and emotional well-being. Participant E proclaimed as follows: 'Multi-grade teaching is not beneficial to the teacher because it is killing me. To mark all those books and with more than 50 kids in the class I am struggling. With two grades you also get confused sometimes.' Participants B, C and D concurred with these feelings voiced by participant E. In her own words, participant D said:

'I feel negative and overwhelmed by teaching in a multi-grade classroom most of the time because it is very strenuous and most days I just pray to get through the work, I don't feel positive about multi-grade teaching at all.'

As the school principal at School 1 explained, she follows an open-door policy of being approachable for her staff. As she is aware of young teachers feeling overwhelmed by the magnitude of teaching a multi-grade class, she focuses on constant emotional support to her young staff which she emphatically conveys by letting her young personnel know that she understands their challenging situation perfectly as she was also once a novice teacher. In her own words, and as already pointed out in paragraph 4.4.3.2, participant A emphasised: 'I want to show them that I understand, I was there, I also went through it.'

4.5 SUMMARY

The focus of the research was on the management of multi-grade teaching with, as the rationale, the refinement of practice for the sake of effective teaching and successful learning. As multi-grade teaching at the research sites is mainly inspired by necessity rather than by choice, it was found to be an inevitable and relevant practice to investigate.

Therefore, the provision of specialised support to educators teaching in multi-grade classrooms to implement a mono-grade curriculum within a totally different multi-grade context, and constant encouragement to teachers to be prepared for every lesson presented during the normal school day, ensured successful teaching and learning. The facilitation of curriculum content, which is accompanied by emotional support to learners and their parents, ensured happy learners and satisfied parents engendering a positive educational climate for teaching and learning in the multi-grade classroom to be realised optimally.

A focus on the holistic development of educators' subject knowledge, pedagogy and classroom practices in a multi-grade context, combined with an ideal ratio of educator to learners, and reliance on parents' moral support for acting in the best interest of each learner in the multi-grade classroom contributes to optimal learning in a multi-

grade classroom setting. Educators' attitude towards teaching in a multi-grade classroom and the dedicated management and support of the school management team towards the multi-grade educator to ensure optimal learning and teaching resulted in satisfactory learner achievement.

CHAPTER 5

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 INTRODUCTION

As educational institutions, schools strive towards the improvement of learners' academic performance through the effective management of school functioning. During this study on effective management of multi-grade teaching for optimal learning, it became evident that there are various obstacles to overcome and challenges to face in the process of establishing a sound culture of teaching and learning in a multi-grade classroom context. The role of the school principal as the executive instructional leader of the school within a context of shared instructional leadership with educators and the school management team contributes to the effective management of multi-grade teaching and learning as well as to the academic performance of learners. In this study, strategies and approaches are identified to manage multi-grade classes effectively so that a constructive learning-environment is set for learners to progress academically.

5.2 SUMMARY OF THE STUDY

The summary of the study is guided by the research aims stated in section 1.5 and repeated in section 3.2 and section 4.1. These aims entailed determining how learner development in a multi-grade classroom can be managed effectively, the benefits of specialised training for educators teaching in a multi-grade context, the challenges educators and school managers face in school environments with multi-grade classroom contexts, and strategies for educators teaching these classes to ensure optimal learner development (section 1.4).

As explained in section 1.8, the study was divided into five chapters. A summary of the first four chapters is provided in the following paragraphs:

In Chapter 1, the background to the study was set, which outlined the purposes and challenges faced by multi-grade teaching and learning, the effect of adequate training for educators teaching in a multi-grade context and strategies to accommodate the

individual differences of learners in a multi-grade classroom (section 1.2). As stated in section 1.1, although the reality of multi-grade teaching in South Africa is not always acknowledged, appreciated and supported, it is a practice that is widespread and necessary. This practice is particularly necessary in schools with limited numbers of teachers and learners and in small scattered settlement areas with low population density (section 1.1). Effective teaching strategies are essential for the successful management of school functioning in schools involved in the provisioning of multi-grade teaching, which was then the primary focus of this study (section 1.3).

Chapter 2 provided a literature review on the nature, characteristics, advantages and challenges of multi-grade teaching and key concepts and definitions were addressed such as, for example, that multi-grade classes consist of one educator responsible for the management of two or more grade groupings of children at the same time (section 2.3.1). As suggested in section 2.10, many educators teaching in multi-grade classes and many school managers have negative attitudes towards the nature and extent of multi-grade teaching as a whole. Educators teaching in multi-grade classrooms need support from the community, the national and regional government, and from the school principal and school management team to ensure effective teaching and successful learning and to promote a positive perception of the multi-grade teaching context (section 2.3.1). Educators must have specific curriculum knowledge and skills which enables them to be effectively involved in the management of their multi-grade classroom (section 2.3.3).

For teachers teaching in a multi-grade context to be effective in managing their teaching task, specific pre-service and in-service training on multi-grade teaching is important (section 2.3.1). Challenges regarding teaching in a multi-grade classroom are experienced worldwide. One of these challenges is that educators teaching in a multi-grade classroom are merely expected to implement the curriculum designed for mono-grade classes, even though their context of teaching in a multi-grade classroom is completely different to teaching in a mono-grade classroom (section 2.3.1). Instructional materials designed to be used in the classroom are produced mainly for mono-grade classes (section 2.3.2). An important aspect of the multi-grade teaching context is classroom management in the sense that, while the educator is busy with one age group of learners, the other group must be constructively engaged in

completing their assignments (section 2.3.2). Effective teaching and learning is not possible in the multi-grade classroom context without proper planning, effective classroom management, the educator's expert input and supervision of learning, and constructive time management. Other challenges pertaining to multi-grade teaching include lack of finances to arrange for adequate teaching material for the multi-grade learning environment, over-crowded classrooms that make multi-grade teaching almost impossible and schools with low learner enrolment that compels multi-grade teaching arrangements (section 2.3.2).

For an educator to be actively involved in school curriculum and syllabus development instead of just merely implementing the curriculum, such an educator must be motivated and empowered with opportunities to obtain subject and area specific professional qualifications (sections 2.3.3). To teach and to manage schools with multi-grade classes successfully, updated teaching techniques, skills, approaches and attitudes need to be developed because of the unique circumstances that multi-grade teaching and learning demands from the school environment (section 2.3.3). In this regard, educators teaching in multi-grade classrooms must receive specialised training beyond their initial training to ensure the development of teaching strategies applicable to the multi-grade teaching situation (section 2.3.3). Multi-grade classes are usually implemented at schools in hard to reach rural areas and for that reason educators are faced with additional restraints such as infrequent supervision assistance by school management and government, an acute lack of didactical resources, and poor living conditions (section 2.11).

Regardless of the hindering effect of the challenges faced by educators teaching in multi-grade classrooms, the success of a school does not depend solely on aspects such as adequate resources, enough training opportunities and ideal educator/learner ratios, but also on the prevailing school climate and culture and the attitude of the persons involved in teaching and managing the multi-grade classroom environment (section 2.3.2). When all role players contribute to the fostering of positive attitudes towards multi-grade teaching and when they are all committed to strive for success with multi-grade teaching, aspiring to ensure the structure of the classroom facilitates the effectiveness of multi-grade teaching and learning and the resources needed are available, multi-grade teaching is successful (section 2.6.1).

Despite the challenges that educators and school managers in the multi-grade context encounter, there are also positive factors. Learners in a multi-grade classroom are subject to convincing peer tutoring which usually occurs in small groups. This provides learners with more leadership opportunities and responsibility that boosts their confidence and self-concept (section 2.7). The supportive, family-like atmosphere in a multi-grade classroom encourages learners to respect and help each other and to become friends (section 2.7). Learners' needs are met because the educator can use flexible schedules that can be adjusted, and which minimise the pressure associated with competition (section 2.7). Discipline problems are minimised since learners have personal relationships and because older learners guide younger learners throughout the school day (section 2.7).

The systems theory of perception and perceptual experiences as portrayed by Bronfenbrenner's eco-systemic model of child development as the theoretical lens for the study emphasised the interconnectedness between systems to encourage an understanding of the unique circumstances within a multi-grade classroom environment (section 2.12). Directed by the theoretical lens of ecological systems functioning, data was collected to answer the research questions pertaining to the nature, advantages and challenges of multi-grade teaching. Purposive research sampling was used based on convenience and applicability related to primary schools in Gauteng West where teachers and school managers teaching and managing multigrade classes were selected as participants (section 3.4). Initially three schools were selected as research sites; however, one of the selected schools was closed during the research period because of violent protests. Thus, only the remaining two schools were visited for data collection. In order to understand the phenomenon of multi-grade teaching and management at primary schools, a qualitative research approach including individual interviews, focus group interviews and observation of teacher participants in their multi-grade classroom contexts provided rich data (sections 3.5.1; 3.5.2; 3.5.3). This rich data was the result of school principals, educators and HoDs being information-rich participants based on their direct involvement in teaching and learning and in the management of multi-grade classes (section 3.4). The research design, based on a qualitative research approach incorporating interviewing and observation of ten participants, was sufficient in answering the research questions satisfactorily. The collected data from the interviews was analysed and interpreted

using the consecutive steps of qualitative content analysis relating to transcribing the recorded interviews and then reading and re-reading each transcribed interview to identify recurring ideas emerging as labelled categories and interpreted as research findings (section 3.6).

From an analysis and interpretation of the collected data from the individual and focus group interviews and the classroom observations, five categories emerged including reasons for introducing multi-grade classes (section 4.4.1), establishing a sound culture of teaching and learning in a multi-grade classroom (section 4.4.2), ensuring good quality teaching and learning in a multi-grade classroom (section 4.4.3), challenges and positive factors prevailing in the multi-grade classroom context (section 4.4.4) and attitudes towards managing multi-grade classes (section 4.4.6). Implementing multi-grade classrooms and placement of educators at schools where they must teach multi-grade classes is the result of very low pupil-teacher ratios and redeployment and rationalisation of educators (section 4.4.1). A further factor that contributes to multi-grade classroom environments is when learners in one area represent different languages which then demands grouping for the sake of successful learning based on understanding the language of teaching and learning. Learners are then grouped into multi-grade classrooms based on mother tongue in order to facilitate successful learning (section 4.4.1). Good quality education by means of a well prepared, competent and experienced educator is crucial for a multi-grade setting to be successful (section 4.4.1).

Establishing a sound culture of teaching and learning is a primary goal for every school - including schools with multi-grade classes - to ensure successful learning (section 4.4.2). Learners in a multi-grade classroom have different demands relating to their age levels and different stages of development, which demands a holistic and balanced approach to teaching to ensure all learners achieve according to their level of development and personal abilities (section 4.4.2.1). Poorly performing learners in multi-grade settings must be supported by intervention strategies to assist these learners to achieve optimal engagement (section 4.4.2.1). In this regard, the analysis of academic and diagnostic reports assists in determining learners who need special support (section 4.4.2.1).

A sound culture of teaching and learning is established by constructive learner discipline, which, in the multi-grade classroom, is crucially necessary to ensure every learner is sustainably engaged in learning (section 4.4.2.2). Undisciplined classes hinder educator and learner focus affecting academic performance negatively (section 4.4.2.2). Although schools have different disciplinary systems, these systems must all contribute to a sound culture of teaching and learning which has as a key factor teacher preparedness for every lesson (section 4.4.2.2). For an educator to have positive and successful educator/learner interactions in the quest for a positive culture of teaching and learning, the educator's preparation for every lesson must be based on expert subject knowledge (section 4.4.2.3). In a multi-grade classroom where the educator's attention is divided between the different grade groups, classes with large learner numbers restrict educator/learner interaction. As learners in a multi-grade classroom must be actively involved throughout the lesson, this is more easily achieved in classes with smaller numbers of learners (section 4.4.2.3). Enhancing cooperative team work where older and younger learners are grouped together so that the older learners assist the younger learners with classwork activities which instils concepts for the older learners, proved to result in successful learning for both based on related seating arrangements for a multi-grade classroom which promote a sound culture of teaching and learning (section 4.4.2.4).

For learners to progress satisfactorily, the educator must ensure adequate curriculum coverage at a high standard (section 4.4.3). Educators rely on the support and guidance from the school management team and the Department of Education to establish and sustain good quality teaching and learning in a multi-grade classroom (section 4.4.3.1). In this regard, educators teaching in multi-grade classes need training opportunities and assistance to plan lessons for the multi-grade teaching situation which is completely different from lesson planning for mono-grade teaching. District offices must arrange special cluster meetings and training sessions for teachers teaching multi-grade classes to empower educators with knowledge and skills to prepare for the multi-grade lesson situation (section 4.4.3.1). Educators teaching multi-grade classes sometimes buy worked out lesson plans because they do not feel confident enough to do their own lesson planning for the multi-grade teaching situation and they are desperate for guidance (section 4.4.3.1).

A meaningful supportive strategy to ensure effective teaching and learning in the multigrade classroom relates to employing a teacher assistant to provide support with marking, administrative tasks and the general management of learner engagement in lesson activities (section 4.4.3.1). To promote successful teaching and learning in a multi-grade classroom, ample educational resources, tools and instruments are essential to be supplemented by sufficient instructional materials and additional workbooks (section 4.4.3.1). As adequate teaching resources and tools for the multigrade class setting enhance successful teaching and learning, these resources and tools must be sponsored by the school fund in the face of a lack of subsidy assistance from the Department of Education (section 4.4.3.1).

Educators, school principals, HoDs, learners and parents are all role players in ensuring quality teaching and learning in multi-grade classrooms (section 4.4.3). The school principal contributes to the establishment and sustaining of successful teaching and learning in a multi-grade classroom environment by acknowledging role player input, interacting with educators, learners and parents, focussing on educators' professional development, supporting staff on an emotional level and by setting a daily example of dedicated commitment to successful learning (section 4.4.3.2). A constructive relationship between the school principal and educators is essential which is realised through open communication by means of regular meetings, class visits, and an open-door policy to approach the school principal with concerns and challenges (section 4.4.3.2).

Weekly assemblies that are focused on learning recognition provide learners with an opportunity to be acknowledged for their achievements, which contributes to a sound culture of teaching and learning, also regarding teaching and learning in multi-grade classroom settings (section 4.4.3.2). School principals and educators must inform parents of learners in multi-grade classes about their children's progress and performance on a constant basis by means of frequent meetings whereby concerns, challenges and achievements are communicated (section 4.4.3.2). School principals promote a sound culture of teaching and learning when they support educators teaching multi-grade classes emotionally, because when educators experience support and encouragement from their School Management Team, their self-efficacy

levels and self-worth are boosted which motivates them to perform above what is expected of them (section 4.4.3.2).

HoDs contribute significantly to the effective management of teaching and learning in a multi-grade teaching context. This they do by playing a leading role to ensure good quality education through consistent monitoring of learner work and educators' planning files, which they supplement with class visits. HoDs liaise with the District Office about professional development for teachers, and they manage administrative duties such as setting of time table allocations and work performance rubrics (section 4.4.3.3). HoDs ascertain that prescribed curriculum topics are adequately taught, and they are responsible for setting up diagnostic reports that are analysed by the school principal for the sake of follow-up planning to ensure teaching results in successful learning. HoDs set up the academic plan that educators implement, and they provide a supportive role by rendering assistance towards educators who struggle with teaching and learning within a multi-grade classroom context (section 4.4.3.3).

Educators who focus on their primary responsibility of effective teaching and who value the progress and performance of all learners in their multi-grade classroom environment promote a sound culture of teaching and learning. These educators meet the varied needs of multi-grade learners by demonstrating in-depth knowledge of curriculum and teaching strategies and employing applicable didactic tools during lesson situations (section 4.4.3.4). Thorough lesson preparation based on the annual teaching plan is supplemented by catering for all the different needs of individual learners in the multi-grade classroom setting. This they do by means of interactive teaching and the monitoring of each learner's progress throughout the term to ensure that all learners achieve specified learning outcomes based on a mastering of core knowledge and skills as specified by the curriculum and related syllabus (section 4.4.3.4).

Effective multi-grade classroom teaching is contingent on small learner numbers as the educator must facilitate successful learning through individual attention to each learner based on the specific needs of that specific learner (section 4.4.3.6). With large class sizes this individual attention is not possible, jeopardising successful teaching and learning and overall good quality education because of overwhelmed teachers

and neglected learners (section 4.4.3.6). Overworked teachers - because of large learner numbers - develop a negative attitude towards teaching in general and towards multi-grade teaching specifically (section 4.4.4). As educators who teach multi-grade classes need special support and guidance to carry out their teaching task successfully, a lack of such support and guidance from the School Management Team and the Department of Education results in teachers developing negative attitudes towards multi-grade teaching (section 4.4.6). The lack of teaching support, professional and social isolation, poor and dangerous working conditions and lack of appropriate teaching resources for educators teaching in multi-grade classrooms jeopardise the success of teaching and learning in multi-grade classroom environments (section 4.4.4; section 4.5).

5.3 CONCLUSIONS OF THE STUDY

With reference to the research questions stated in paragraph 1.4 and repeated in paragraph 3.1 these questions related to ensuring effective management of teaching and learning in a multi-grade classroom context and identifying the main challenges and benefits faced in school environments with multi-grade classroom contexts. These questions also related to determining the benefits of specialised training for multi-grade teaching and to clarify strategies that educators can use to ensure optimal learning in the multi-grade classroom context. Conclusions drawn from a summary of the literature and empirical research findings are discussed next.

From the findings from the literature study and empirical investigation, managing multigrade teaching for optimal learning is a challenge that schools face daily. The main challenge relates to overcrowded multi-grade classrooms resulting in educators' negative experiences of multi-grade teaching. Overcrowded classrooms are exacerbated by a lack of support from the school management team and the Department of Education to educators teaching multi-grade classes. Teachers need support and training with regard to subject planning in the face of professional and social isolation with multi-grade teaching. They experience poor and dangerous working conditions and a lack of appropriate teaching resources within these overcrowded classroom conditions. The main conclusions deduced from this study

on the effective management of multi-grade teaching to ensure optimal teaching and learning are the following:

Reasons for introducing multi-grade classes at a school

Although most education systems are based on a mono-grade teaching environment where a single grade is taught by one educator, many schools engage in multi-grade teaching. Multi-grade teaching is especially applicable to isolated rural areas where facilities are limited because of poverty. With commonly high population density in these areas and with only one school and a few educators, learners are grouped into multi-grade classes. Such endeavours do not occur out of choice but because of necessity so as to accommodate all learners and to provide teaching and learning opportunities to all these learners. In schools where learners speak different languages, they are also grouped according to mother tongue understanding and provided teaching and learning opportunities by means of multi-grade teaching as the only viable option to ensure meaningful learning (cf. 2.2; cf. 4.4.1).

• Establishing a sound culture of teaching and learning in a multi-grade classroom context

Educators, school managers such as HoDs and school principals are primarily responsible for the establishment of a sound culture of teaching and learning. When all these role players are focused on establishing a sound culture of teaching and learning, learner performance in a multi-grade classroom context is positively influenced. Learners in a multi-grade classroom setting must each be supported on his/her level of development. To ensure this individual support, discipline in the multi-grade classroom must be constructively managed so that optimal teaching and learning can realise. Learner discipline at a school with multi-grade classes must be designed to accommodate the multi-grade classroom environment where active participation must not be confused with noisiness. In this regard, educator/learner interaction can only be successfully managed and positively achieved with small numbers of learners in the multi-grade classroom. The educator must be well prepared for each lesson and all learners must be actively involved throughout the lesson to

avoid boredom and not all learners receiving adequate learning opportunities. Seating arrangements in the multi-grade classroom are most beneficial when arranged as 'stations' of groups of learners engaging in cooperative group work. The grouping of older and younger learners together ensures mutual support and responsibility for each other's learning. There must also be individual working areas in the multi-grade classroom to provide for the completion of individual work (section 2.6.1; section 2.6.2; section 2.6.3; section 4.4.2.1; section 4.4.2.2; 4.4.2.3; 4.4.2.4)

• Ensuring good quality teaching and learning in a multi-grade classroom

Educators need special support regarding specific planning skills and teaching strategies to cater for all learners' needs in the multi-grade classroom setting. The Department of Education must schedule frequent cluster meetings to assist educators who teach multi-grade classes. Opportunities for professional development of educators involved in multi-grade teaching must be established relating to specific multi-grade teaching training courses for the sake of capacity building. Lesson plan formats for multi-grade teaching must be provided by the District Office to assist educators with their lesson planning. These lesson plan formats must incorporate all the grades into one lesson. Teacher assistants who help the educator with class administration and general discipline serve as meaningful support contributing to effective teaching and learning in the multi-grade classroom. Ensuring good quality teaching and learning activity in the multi-grade classroom depends on adequate educational resources to be freely available to learners to ensure they are constructively engaged while waiting for their formal lesson turn. The school principal and HoDs are prime support structures to the educator teaching in a multi-grade classroom by ensuring consistent availability for open communication and for class visits to provide didactical and emotional support. HoDs monitor all assessments and analyse marks together with the school principal and arrange for in-service training opportunities when needed by the educator involved in multi-grade teaching (section 2.6.2; section 4.4.3; section 4.4.3.1; section 4.4.3.2; section 4.4.3.3).

Challenges and positive factors of a multi-grade classroom context

Learners in a multi-grade classroom setting can develop a positive sense of self-worth when working in groups and helping learners younger than themselves. This also fosters a family-like environment of belonging where learners feel safe and can practise leadership skills and working independently. Older learners hear concepts again and younger learners hear new information, so enrichment and the instilling of core content are taking place during each lesson. If a multi-grade classroom setting has a small number of learners, a well-prepared and seasoned educator can facilitate substantial progress for each learner based on the arrangement of optimal teaching and learning opportunities. However, the opposite prevails with multi-grade teaching where overcrowded classrooms and inexperienced educators result in conditions of overwhelming perceptions and negative attitudes towards multi-grade teaching. The lack of professional development by means of tailor-made training for teachers teaching multi-grade classes and the presumption that educators of multi-grade classes must merely change the mono-grade teaching format of the curriculum themselves for applicable implementation in a multi-grade teaching context leave educators socially, emotionally and professionally isolated (section 2.7; section 2.8; section 2.9; section 4.4.4).

Attitudes towards managing multi-grade classes

Multi-grade teaching is generally perceived as being more demanding than monograde teaching because of more extensive and complex lesson planning, and complicated classroom management challenges associated with having more than one task to be carried out at the same time with the normal time constraints prevailing. Perceptions influence attitudes causing negativity amongst educators regarding multigrade teaching. The lack of support for their teaching specific multi-grade setting exacerbated by large learner numbers are the main factors resulting in educators being negative about multi-grade teaching. Teachers teaching multi-grade classrooms with large learner numbers feel constantly overworked and overwhelmed by their work situation (section 2.11; 2.12; section 4.4.6).

5.4 RECOMMENDATIONS

In accordance with the conclusions drawn, the following recommendations are made to make schools aware of the value of managing multi-grade teaching for optimal teaching and learning.

RECOMMENDATION 1: Increased awareness of multi-grade teaching (section 2.2; section 4.4.6)

Multi-grade teaching is practised at many schools in different geographical areas without acknowledging the presence of this valid teaching arrangement because there is a tendency to keep multi-grade matters under the radar. The approach is to rather focus improvements and developments on conventional schools, which leaves schools with multi-grade classes to fend for themselves in terms of training educators and planning lessons. The multi-grade teaching context must be explored and made known on a wide platform. Concerted efforts amongst all stakeholders, particularly the Department of Basic Education and the Provincial Education Departments, are needed to raise the status of multi-grade teaching and learning. Multi-grade teachers need to be aware of the extent to which multi-grade teaching is used internationally, and the evidence that it can be as effective as mono-grade teaching. Multi-grade teaching endeavours must be granted the recognition which they deserve, thereby contributing to the fostering of positive perceptions and attitudes towards multi-grade teaching.

RECOMMENDATION 2: A board of experts in multi-grade teaching to facilitate constant training countrywide and to monitor multi-grade teaching in the different districts of education (section 2.1; section 4.4.3.1; section 4.4.3.4)

The training of educators who teach multi-grade classes is a challenge because of the differences in teaching competency, teaching experience and pre-service training amongst these educators. However, these differences must be addressed to ensure a more uniform structure for multi-grade teaching conducted in terms of curriculum facilitation and lesson presentation. A board of experts in the field of multi-grade teaching must be established at each district to organise and facilitate quarterly

training sessions in the 'what' and 'how' of multi-grade teaching in all school districts. Regular monitoring of multi-grade teaching is essential and seasoned educators with experience and expertise in multi-grade teaching must be involved in the presentation of training sessions to advise and support younger and inexperienced educators with multi-grade teaching endeavours.

RECOMMENDATION 3: A realistic educator-learner ratio for successful teaching and learning in a multi-grade teaching context (section 2.1; section 4.4.2.2; section 4.4.2.3; section 4.4.3.6)

Good quality education in a multi-grade classroom context is contingent on small learner numbers. Overcrowded classrooms are vulnerable to disciplinary problems, disruptions and certain groups being neglected during a lesson where the educator must tend to one group while the other group must carry on individually. Educators forced to teach in conditions where there are too many learners in the multi-grade classroom feel stressed, overloaded and overworked because of the burden of large learner numbers. For teaching and learning to be successful, the number of learners in a multi-grade classroom context must not exceed 25 learners. However, this will depend on more schools and teachers, which is an external aspect hampering the recommendation.

RECOMMENDATION 4: Tailor-made lesson plans, assessments and work schedules for the multi-grade classroom context (section 2.10; section 4.4.3.1; section 4.4.3.4)

Educators teaching in a multi-grade classroom must be well prepared for each lesson. This can be a major challenge when the educator is inexperienced and feels overwhelmed by the challenges of multi-grade teaching, exacerbated by overwhelmingly large class sizes. The standardisation of the curriculum, lesson plans, assessments and work schedules for multi-grade teaching across provinces, with the board of experts on multi-grade teaching as the driving force, will be of significant benefit to all educators being involved in multi-grade teaching. The monitoring of teaching and learning in a multi-grade classroom context will be more easily arranged by such standardisation.

RECOMMENDATION 5: Teaching assistants for multi-grade classes (section 2.8; section 2.9; section 4.4.3.1)

The educator teaching a multi-grade classroom has numerous responsibilities while adhering to actual teaching and lesson facilitation. Aspects like individual attention to all learners in the class, invigilation while learners are busy doing their work and administrative duties sometimes fall short in a multi-grade class context because of time constraints and the educator having too many additional responsibilities. Therefore, the appointment of a class assistant for each multi-grade classroom will be meaningful for improved teaching and learning. Student teachers who are busy with their studies can be deployed to multi-grade classes exclusively instead of monograde classes during the practical part of their training in each province to act as class assistants for multi-grade teachers with this assistance being recognised as preservice practical training.

RECOMMENDATION 6: Cooperative group work and group stations in the multigrade classroom (section 2.6.1; section 4.4.2.4)

Classroom climate in multi-grade classes vary due to the different ages of the learners in the classroom. Educators also have different teaching styles. However, in the multi-grade classroom, cooperative group work is most effective. Cooperative group work, which demands specific seating arrangements will ensure the most effective use of time and space in the multi-grade classroom. The researcher suggests small groupings of learners of all the different ages working collaboratively or the setting of working stations that is set up and where groups rotate to the different stations after spending a specific amount of time at each station can prove effective. Grouping of older learners with younger learners within these groups can provide conducive opportunities for leadership practice and foster a feeling of belonging while learning optimally with assistance and repetition. Learners assist each other and enjoy working together on projects. However, success with cooperative group work is contingent on the thoroughness with which educators plan for each lesson.

5.5 SUGGESTIONS FOR FURTHER STUDY

Data for this study, which focussed on managing multi-grade teaching for optimal learning, was collected from public primary schools in the Gauteng West area.

Suggestions for further study entail a focus on the effective management of multigrade teaching and learning at private primary schools to determine similarities and differences for a comprehensive understanding of the optimal management of multigrade teaching for learning success.

A comparison of the kind of training and professional assistance for educators teaching multi-grade classrooms at private and public schools can determine similarities and differences to develop guidelines on how to provide optimal assistance to such educators to engender improved learning outcomes for learners.

5.6 LIMITATIONS OF THE STUDY

This study on the management of multi-grade teaching for optimal learning in Gauteng West primary schools was conducted as a qualitative investigation using observation and individual and focus group interviews to collect data. The aim of the study was to understand and not to generalise findings and, therefore, the research sample was limited to two schools and ten participants only. Apart from limitations with the research sample size, the following are also regarded as limitations of the study:

- Limited research population. The research population of the research study
 was government primary schools with multi-grade classes in Gauteng West.
 By having arranged for a bigger research population with extended criteria,
 the researcher would have had a larger number of schools to choose from for
 a more comprehensive understanding of the optimal management of teaching
 for effective learning in South African primary schools that provide multi-grade
 teaching.
- Availability of participants. At one of the two research sites only two
 educators were teaching in a multi-grade teaching context and were available

for observation and focus group interviewing. This limited number of participants could possibly have resulted in not gathering a convincing amount of data to answer the research questions adequately. However, with the classroom observation done and the interviews conducted, the researcher experienced saturation of information shared later in the data collecting process, which confirmed that the data that was collected was adequate to answer the research question satisfactorily.

- Contradicting participant responses. Some of the answers given by the school principals contradicted what the educators teaching in multi-grade classes said. The researcher interpreted these contradictions as attempts to provide information that describes ideal scenarios at the school and not the reality of the situation that the multi-grade context provides. Contradictory data was not used, with valuable time wasted while collecting this data.
- Safety of the researcher. The researcher felt a threat to her own safety during some encounters with violent protests in the Gauteng West Hekpoort area. The researcher's vehicle was pushed off the road by protestors during the attempted visit to a possible third research site. Roads were also closed due to burning tyres and violent protests, and the researcher had to take various detours on the way to the research sites in the two-week timeline of the field work, which could have had a dampening influence on the researcher's zest for increased knowledge and insight in such demotivating circumstances.

5.7 CONCLUDING REMARKS

Managing multi-grade teaching is a challenge that schools face. The optimal management of multi-grade teaching and learning determines learners' progress and academic performance and the morale and attitude of educators teaching multi-grade classes. Multi-grade teaching is inevitably part of the South African education system and should be recognised as contributing to the preparedness of future citizens for quality engagement in adult life. The school principal, HoDs, educators, learners and parents are all role players in the establishment of a sound culture of teaching and learning that values effective management of multi-grade teaching. The managing of multi-grade teaching for optimal learning in South Africa has many obstacles to

overcome and shortcomings to face and it requires thorough and consistent training for teachers teaching in such contexts to ensure optimal learning opportunities for each individual learner.

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Appendix A Request for permission to conduct research



Request for permission to conduct research at:

School name

Title of research:

aabaala

Managing	multi-grade	teaching	for	optimal	learning	in	Gauteng	West	primary

<u>scrioois</u>
Date:
Name and Surname of principal:
Contact number:
Email address:
Dear principal of

I, Marlise Tredoux, am doing research under supervision of Prof HM van der Merwe, a Professor in the Department of Educational Leadership and Management, towards a MEd at the University of South Africa. I am inviting you to participate in a study entitled: Managing multi-grade teaching for optimal learning in Gauteng West primary schools.

The aim of the study is to determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts, to identify the importance and benefits of specialised training for teachers teaching multi-grade classes and to develop strategies for teachers teaching multi-grade classes to ensure optimal learner development.

Your school has been selected because of the involvement in the management of multi-grade teaching and your successes with the implementation of strategies to ensure optimal learning in multi-grade classrooms.

The study will entail the following:

- Two Educators teaching in a multi-grade classroom will be selected. They will
 be observed in their classrooms with the observation focusing mainly on
 teaching methods and classroom management strategies. Documents such
 as teacher files and lesson plans will supplement the observation actions.
- The researcher will conduct an individual interview with the school principal to find out what the challenges and benefits of multi-grade teaching are, and how, as executive leader of the school, foster positive attitudes to multi-grade teaching and what the structures are for effective school management and school functioning within a multi-grade context.
- The principal, selected two teachers per research site as well as the two HODs will be subject to a focus group interview. The focus group interview will be arranged at a place and time convenient to all of the participants.

Benefits of the study are:

Research studies provide valuable information, which helps researchers gather information about specific topics. Information gathered by the researcher may benefit the educational system as a whole by scrutinising certain issues and providing a voice for the disenfranchised. Conclusions can then be made from the outcome of the research and possible solutions to questions or problems can be derived from that.

There are no known potential risks involved in the study.

There will be no reimbursement or any incentives for participation in the research. The feedback procedure will entail participants being subjected to a debriefing session where they can self-correct, reflect upon a recent experience and to discuss what went well and identify opportunities for improvement. All participants can also request a report on the findings and results after completion of interviews and observation.

Yours sincerely	
Marlise Tredoux	(Researcher)

Appendix B Participation consent form – HoD/Teacher



PARTICIPATION CONSENT FORM – HOD / TEACHER

Dato:						
Managing multi-grade	teaching fo	or optimal	learning in	Gauteng	West prim	ary

DEAR PROSPECTIVE PARTICIPANT

Date:

schools.

My name is Marlise Tredoux. I am doing research under the supervision of Prof HM van der Merwe, a Professor in the Department of Education Leadership and Management, towards a MEd at the University of South Africa. I am inviting you to participate in a study entitled: *Managing multi-grade teaching for optimal learning in Gauteng West primary schools.*

WHAT IS THE PURPOSE OF THE STUDY?

The aim of the study is to determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts, to identify the importance and benefits of specialised training for teachers teaching multi-grade classes and to develop strategies for teachers teaching multi-grade classes to ensure optimal learner development.

WHY AM I BEING INVITED TO PARTICIPATE?

You were selected on the basis of your involvement in the management of multi-grade teaching and the successes with the implementation of strategies to ensure optimal learning in a multi-grade classroom. You are in charge of managing and teaching a multi-grade classroom on a daily basis by coordinating classroom activities and the needs of learners from different ages.

I obtained your school's contact details from the Gauteng Department of Education before requesting consent to conduct the research. The number of participants is 10 in total selected from 2 different schools with teachers teaching in multi-grade classrooms, the HOD's as well as the school principals.

WHAT IS THE NATURE OF MY PARTICIPATION IN THIS STUDY?

The study involves being observed in your classroom with the observation focusing mainly on teaching methods and classroom management strategies in a multi-grade classroom. Documents such as teacher files and lesson plans will supplement the observation actions. The selected teachers, HOD's and the principal will also be subjected to a focus group interview. The focus group interview will be arranged at a place and time convenient to all of the participants.

During the focus group interview questions will be put to the group rather than to put the individual on the spot. Questions will be easy to understand, one-dimensional, clear, short, stimulating, appropriate and open-ended.

The expected duration of participation and the time needed to complete the focus group interview is about 100 minutes. The time allocated to conduct the observation in the classroom will stretch over a period of four days for about 1200 minutes in total.

CAN I WITHDRAW FROM THIS STUDY EVEN AFTER HAVING AGREED TO PARTICIPATE?

Participating in this study is voluntary and you are under no obligation to consent to participation. If you do decide to take part, you will be given this information sheet to keep and be asked to sign a written consent form. You are free to withdraw at any time and without giving a reason.

WHAT ARE THE POTENTIAL BENEFITS OF TAKING PART IN THIS STUDY?

- To contribute towards the advancement of education as a whole.
- To exercise one's autonomy and take an active role in society.
- To have your voice heard and to help combat feelings of helplessness.
- To do something interesting.

 Research improves services not just for you but also for future generations that could eventually help you and your children.

ARE THERE ANY NEGATIVE CONSEQUENCES FOR ME IF I PARTICIPATE IN THE RESEARCH PROJECT?

There are no known risks of harm or side-effects to the potential participants identified in this study.

WILL THE INFORMATION THAT I CONVEY TO THE RESEARCHER AND MY IDENTITY BE KEPT CONFIDENTIAL?

Your name will not be recorded anywhere and no one will be able to connect you to the answers you give. Your answers will be given a code number or a pseudonym and you will be referred to in this way in the data, any publications, or other research reporting methods. Your answers may be reviewed by people responsible for making sure that research is done properly, including the transcriber, external coder, and members of the Research Ethics Review Committee. Otherwise, records that identify you will be available only to the researcher working on the study, unless you give permission for other people to see the records. A report of the study may be submitted for publication, but individual participants will not be identifiable in such a report. Absolute confidentiality or anonymity regarding focus groups are guaranteed. A focus group interview is a small, but demographically diverse group of people whose reactions are studied to determine the reactions that can be expected from a larger population. While every effort will be made by the researcher to ensure that you will not be connected to the information that you share during the focus group interview, I cannot guarantee that other participants in the focus group will treat information confidentially. I shall, however, encourage all participants to do so. For this reason, I advise you not to disclose personally sensitive information in the focus group interview.

HOW WILL THE RESEARCHER PROTECT THE SECURITY OF DATA?

Hard copies will be locked away safely while soft copies will be encrypted and stored on the researcher's computer for five years after which soft copies will be deleted and hard copies shredded.

WILL I RECEIVE PAYMENT OR ANY INCENTIVES FOR PARTICIPATING IN THIS

STUDY?

There will be no reimbursement or any incentives for participation in the research.

HAS THE STUDY RECEIVED ETHICS APPROVAL?

This study has received written approval from the CEDU Research Ethics Review

Committee, Unisa. A copy of the approval letter can be obtained from the researcher

if you so wish.

HOW WILL I BE INFORMED OF THE FINDINGS/RESULTS OF THE RESEARCH?

All participants can request a report on the findings and results after completion of

interviews and observation. If you would like to be informed of the final research

findings or should you require any further information or want to contact the researcher

about any aspect of this study, please contact Marlise Tredoux on 079 996 2807 or

email marlisetredoux@hotmail.com. Should you have concerns about the way in

which the research has been conducted, you may contact Prof HM van der Merwe on

(012)993 4370 / Cell: 083 442 1503 / Email: vdmerhm@unisa.ac.za.

Thank you for taking time to read this information sheet and for participating in this

study. Please complete the return slip at the back of this document.

Yours sincerely		
Marlise Tredoux		

Researcher

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CONSENT TO PARTICIPATE IN THIS STUDY (Return slip) _____, confirm that the person asking my consent to take part in this research has told me about the nature, procedure, potential benefits and anticipated inconvenience of participation. I have read (or had explained to me) and understood the study as explained in the information sheet. I have had sufficient opportunity to ask questions and am prepared to participate in the study. I understand that my participation is voluntary and that I am free to withdraw at any time without penalty (if applicable). I am aware that the findings of this study will be processed into a research report, journal publications and/or conference proceedings, but that my participation will be kept confidential unless otherwise specified. I agree to the recording of the Interview. I have received a signed copy of the informed consent agreement. Participant Name & Surname (please print) Participant Signature Date Researcher's Name & Surname (please print)

Date

Researcher's Signature

Appendix C Participation consent form – School Principal



Date:					
Managing multi-grade te	eaching for or	otimal learning	in Gauten	g West	primary
schools.					

PARTICIPATION CONSENT FORM - SCHOOL PRINCIPAL

DEAR PROSPECTIVE PARTICIPANT

My name is Marlise Tredoux. I am doing research under the supervision of Prof HM van der Merwe, a Professor in the Department of Education Leadership and Management, towards a MEd at the University of South Africa. I am inviting you to participate in a study entitled: *Managing multi-grade teaching for optimal learning in Gauteng West primary schools.*

WHAT IS THE PURPOSE OF THE STUDY?

The aim of the study is to determine the main challenges teachers and school managers face in school environments with multi-grade classroom contexts, to identify the importance and benefits of specialised training for teachers teaching multi-grade classes and to develop strategies for teachers teaching multi-grade classes to ensure optimal learner development.

WHY AM I BEING INVITED TO PARTICIPATE?

You were selected on the basis of your involvement in the management of multi-grade teaching and their successes with the implementation of strategies to ensure optimal learning in multi-grade classrooms.

I obtained your school's contact details from the Gauteng Department of Education before requesting consent to conduct the research. The number of participants is ten in total selected from two different schools with teachers teaching in multi-grade classrooms, HODs as well as the school principals.

WHAT IS THE NATURE OF MY PARTICIPATION IN THIS STUDY?

The researcher will conduct an individual interview with the school principal to find out what the challenges and benefits of multi-grade teaching are, how he/she, as executive leader of the school, foster positive attitudes to multi-grade teaching and what the structures are for effective school management and school functioning within a multi-grade context.

During the interview questions will be easy to understand, one-dimensional, clear, short, stimulating, appropriate and open-ended.

The expected duration of participation and the time needed to complete the interview is about 60 minutes.

The selected teachers, HODs and the principal will also be subjected to a focus group interview. The focus group interview will be arranged at a place and time convenient to all of the participants.

During the focus group interview questions will be put to the group rather than to put the individual on the spot. Questions will be easy to understand, one-dimensional, clear, short, stimulating, appropriate and open-ended.

The expected duration of participation and the time needed to complete the focus group interview is about 100 minutes.

CAN I WITHDRAW FROM THIS STUDY EVEN AFTER HAVING AGREED TO PARTICIPATE?

Participating in this study is voluntary and you are under no obligation to consent to participation. If you do decide to take part, you will be given this information sheet to keep and be asked to sign a written consent form. You are free to withdraw at any time and without giving a reason.

WHAT ARE THE POTENTIAL BENEFITS OF TAKING PART IN THIS STUDY?

- To contribute towards the advancement of education as a whole.
- To exercise one's autonomy and take an active role in society.

- To have your voice heard and to help combat feelings of helplessness.
- To do something interesting.
- Research improves services not just for you but also for future generations that could eventually help you and your children.

ARE THERE ANY NEGATIVE CONSEQUENCES FOR ME IF I PARTICIPATE IN THE RESEARCH PROJECT?

There are no known risks of harm or side-effects to the potential participants identified in this study.

WILL THE INFORMATION THAT I CONVEY TO THE RESEARCHER AND MY IDENTITY BE KEPT CONFIDENTIAL?

Your name will not be recorded anywhere and no one will be able to connect you to the answers you give. Your answers will be given a code number or a pseudonym and you will be referred to in this way in the data, any publications, or other research reporting methods. Your answers may be reviewed by people responsible for making sure that research is done properly, including the transcriber, external coder, and members of the Research Ethics Review Committee. Otherwise, records that identify you will be available only to the researcher working on the study, unless you give permission for other people to see the records. A report of the study may be submitted for publication, but individual participants will not be identifiable in such a report.

HOW WILL THE RESEARCHER PROTECT THE SECURITY OF DATA?

Hard copies will be locked away safely while soft copies will be encrypted and stored on the researcher's computer for five years after which soft copies will be deleted and hard copies shredded.

WILL I RECEIVE PAYMENT OR ANY INCENTIVES FOR PARTICIPATING IN THIS STUDY?

There will be no reimbursement or any incentives for participation in the research.

HAS THE STUDY RECEIVED ETHICS APPROVAL?

This study has received written approval from the CEDU Research Ethics Review Committee, Unisa. A copy of the approval letter can be obtained from the researcher if you so wish.

HOW WILL I BE INFORMED OF THE FINDINGS/RESULTS OF THE RESEARCH?

All participants can request a report on the findings and results after completion of interviews and observation. If you would like to be informed of the final research findings or should you require any further information or want to contact the researcher about any aspect of this study, please contact Marlise Tredoux on 079 996 2807 or email marlisetredoux@hotmail.com. Should you have concerns about the way in which the research has been conducted, you may contact Prof HM van der Merwe on (012)993 4370 / Cell: 083 442 1503 / Email: vdmerhm@unisa.ac.za.

Thank you for taking time to read this information sheet and for participating in this study. Please complete the return slip at the back of this document.

Yours sincerely	
Marlise Tredoux	(Researcher)



CONSENT TO PARTICIPATE IN THIS STUDY (Return slip) ____, confirm that the person asking my consent to take part in this research has told me about the nature, procedure, potential benefits and anticipated inconvenience of participation. I have read (or had explained to me) and understood the study as explained in the information sheet. I have had sufficient opportunity to ask questions and am prepared to participate in the study. I understand that my participation is voluntary and that I am free to withdraw at any time without penalty (if applicable). I am aware that the findings of this study will be processed into a research report, journal publications and/or conference proceedings, but that my participation will be kept confidential unless otherwise specified. I agree to the recording of the Interview. I have received a signed copy of the informed consent agreement. Participant Name & Surname (please print) Participant's Signature Date Researcher's Name & Surname (please print)

Date

Researcher's Signature

Appendix D

Consent form – Focus group consent and confidentiality agreement



I grant consent that the
information I share during the focus group may be used by Marlise Tredoux for
research purposes. I am aware that the group discussions will be written down or
digitally recorded and grant consent for these recordings, provided that my privacy will
be protected. I undertake not to divulge any information that is shared in the group
discussions to any person outside the group in order to maintain confidentiality.
Participant's Name (Please print):
Participant's Signature:
Researcher's Name: (Please print):
Researcher's Signature:
Date:

Appendix E Focus group interview schedule and questions



SECTION A: BIOGRAPHICAL INFORMATION OF PARTICIPANTS

1. Gender (Indicate with an "x")

	MALE	FEMALE
Participant A		
Participant B		
Participant C		
Participant D		
Participant E		
Participant F		

2. Age (in years)

	20 – 29	30 – 39	40 – 49	50 YEARS
	YEARS	YEARS	YEARS	AND ABOVE
Participant A				
Participant B				
Participant C				
Participant D				
Participant E				
Participant F				

3. Position you hold at school

	Position
Participant A	
Participant B	
Participant C	
Participant D	
Participant E	
Participant F	

4. Qualifications

	Academic	Professional
Participant A		
Participant B		
Participant C		
Participant D		
Participant E		
Participant F		

5. Teaching experience

	Total years in teaching	Total years' experience
		in Multi-grade teaching
Participant A		
Participant B		
Participant C		
Participant D		
Participant E		
Participant F		

6. Grades combined

SECTION B: INTERVIEW QUESTIONS ON THE CHALLENGES AND ADVANTAGES EXPERIENCED BY TEACHERS OF MULTI-GRADE CLASSES

- 1. What is your understanding of the concept multi-grade teaching?
- 2. What motivated your school to introduce multi-grade teaching?
- 3. Can you briefly explain how you group your learners in your classroom?
- 4. How do you maintain good discipline in your classroom?
- 5. How do you plan your lessons?
- 6. What assistance do you receive in your planning for lessons in the multi-grade classroom?
- 7. What tools do you have to assist in teaching a multi-grade class?
- 8. Which teaching methods do you use in your lessons?
- 9. Which learning materials do you use in your lessons?
- 10. Can you please explain how you assess learners in your classrooms?
- 11. What are the challenges that you experience in the multi-grade teaching context?
- 12. What training did you receive to teach multi-grade classrooms?
- 13. What workshops and/or cluster meetings have you attended about managing a multi-grade classroom?
- 14. How often are you supported by curriculum advisors in multi-grade teaching?
- 15. How effective is multi-grade teaching in the education of learners?
- 16. What are the 3 main positive aspects of teaching in a multi-grade classroom?
- 17. What is your general feeling towards multi-grade teaching?
- 18. What can be done by the Department of Education to assist teachers teaching in a multi-grade classroom?
- 19. What do you think should be done to ensure the effectiveness of teaching and learning in your classes?
- 20. Everything considered, do you feel positive or negative towards teaching in a multi-grade classroom? Please substantiate your answer.

Appendix F

Interview schedule with school principal



SECTION A: BIOGRAPHICAL INFORMATION OF THE PRINCIPAL

1. Gender (Indicate with an "x")

	MALE	FEMALE
Participant A		
Participant B		
Participant C		

2. Age (in years)

	20 – 29 YEARS	30 – 39 YEARS	40 – 49 YEARS	50 YEARS AND ABOVE
Participant A				
Participant B				
Participant C				

3. Qualifications

	Academic	Professional
Participant A		
Participant B		
Participant C		

4. Experience

	Total years in teaching	Total years' experience as principal
Participant A		
Participant B		
Participant C		

SECTION B: BIOGRAPHYCAL INFORMATION OF THE SCHOOL

5	School enrolment	
6	Number of teachers at the school	
7	Grades offered at the school	

SECTION C: INTERVIEW QUESTIONS FOR SCHOOL PRINCIPALS ON HIS/HER EXPERIENCES ON MANAGING A SCHOOL WITH MULTI-GRADE CLASSES

- 1. What were the reasons for introducing multi-grade classes at your school?
- 2. How is the school management team organised?
- 3. What are the tasks of the heads of departments in your school to help with curriculum management?
- 4. What are the extra/specialised tools and instruments provided to the teachers teaching multi-grade classrooms in your school?
- 5. What kind of support do you provide to teachers teaching in multi-grade classes?
- 6. Are there any training opportunities provided to teachers teaching in multigrade classes?
- 7. What do you do to ensure that the curriculum is being fully implemented in multi-grade classes?
- 8. How well do learners in multi-grade classes perform in their studies?
- 9. What challenges do you experience as a principal in a school with multi-grade classes?
- 10. What are the positive factors in having multi-grade classes at your school?
- 11. What do you think should be done to ensure effective teaching and learning in multi-grade classes?

Appendix G Observation schedule



1.	GENERAL INFORMATION
1.1	School:
1.2	Grades combined:
1.3	Subject:
1.4	Date:
1.5	Duration of lesson:
2.	CLASSROOM ENVIRONMENT
2.1	Number of learners per grade:
2.2	Sitting arrangement:

	ailability of learning materials:
Gr	ade of text books used:
CL	ASSROOM INTERACTION
Th	e nature of the educator/learner interaction:
ls '	the teacher able to involve learners in both grades in the lesson?
WI	nich teaching strategies does the educator use?
	g shalogiss asso in a saddalor ass.

How ar	e learners assessed?
Does th	ne educator teach according to the lesson plan?
How is	learner discipline maintained in the classroom?

Appendix H

Ethical clearance certificate

UNISA COLLEGE OF EDUCATION ETHICS REVIEW COMMITTEE

Date: 2019/06/12

Dear Mrs Tredoux

Decision: Ethics Approval from 2019/06/ 12 to 2022/06/12

Ref: 2019/06/12/47 208732 / 21/MC

Name MrsMTredoux Student47208732

Researcher(s): Name: MrsMTredoux

E-mail address:marlisetredoux@hotmail.om

Telephone: +27 79 996 2807

Supervisor(s): Name: Prof HM van der Merwe

E-mail address: vdmerhm@unisa.ac.za Telephone: +27 12 993 4370

Title of research:

Managing multi-grade teaching for optimal learning in Tshwane primary schools.

qualification: M. Ed in Educational Leadership and Management

Thankyoufortheapplication or researchethic sclear and by the UNISAC ollege of Education Ethics Review Committee for above mentioned research. Ethics approval is granted for the period 2019/06/12 to 2022/06/2.

The medfzzm risk application was reviewed by the Ethics Review Committee on 2019/06/J 2 in compliance with the UNISA Policy on Research Ethics and the Standard Operating Procedure on Research Ethics Risk Assessment.

The proposed research may now commence with the provisions that:

- 1. The researcher(s) will ensure that research project adheres to evalues and principles expressed in the UNISA Policy on Research Ethics.
- 2. Any adverse circumstance arising in the undertaking of the research project that is relevant to the ethicality of the study should be communicated in writing to the UNISA College of Education thics Review Committee.



- 3. The researcher(s) will conduct the study according to the methods and procedures set out in the approved application.
- 4. Any changes that can affect the study-related risks for the research participants, particularly in terms of assurances made with regards to the protection of participants' privacy and the confidentiality of the data, should be reported to the Committee in writing.
- 5. The researcher will ensure that the research project adheres to any applicable national legislation, professional codes of conduct, institutional guidelines and scientific standards relevant to the specific field of study. Adherence to the following South African legislation is important, if applicable: Protection of Personal Information Act, no 4 of 2013; Children's act no 38 of 2005 and the National Health Act, no 61 of 2003.
- Only de-identified research data may be used for secondary research purposes in future on condition that the research objectives are similar to those of the original research. Secondary use of identifiable human research data requires additional ethics clearance.
- No field work activities may continue after the expiry date 2022/06/12. Submission
 of a completed research ethics progress report will constitute an application for
 renewal of Ethics Research Committee approval.

Note:

The reference number 2019/06/12/47208732/21/MC should be clearly indicated on all forms of communication with the intended research participants, as well as with the Committee.

Kind regards,

rof AT Motlhabane

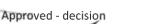
CHAIRPERSON : CEDU RERC

motlhat@unisa.ac.za

rof PM Se**≥b**ate

ACTING EXECUTIVE DEAN

Sebatpm@unisa.ac.za



Appendix I GDE Research approval letter



GAUTENG PROVINCE

Department: Education REPUBLIC OF SOUTH AFRICA

814141112

GDE RESEARCH APPROVAL LETTER

Date:	08 July 2019
Validity of Research Approval:	04 February 2019 — 30 September 2019 2019/136
Name of Researcher:	Tredoux M
Address of Researcher:	1456 Moulton Avenue
	Waverley
	Pretoria, 0186
Telephone Number:	079 996 2807
Email address:	marlisetredoux@hotmail.com
Research Topic:	Managing multi-grade teaching for optimal learning in Gauteng West primary schools.
Type of qualification	Masters: Master of Education in Education Management
Number and type of schools:	Three Primary Schools
District/s/HO	Gauteng West

Re: Approval in Respect of Request to Conduct Research

This letter serves to indicate that approval is hereby granted to the above-mentioned researcher to proceed with research in respect of the study indicated above. The onus rests with the researcher to negotiate appropriate and relevant time schedules with the school/s and/or offices involved to conduct the research. A separate copy of this

letter must be presented to both the School (both Principal and SGB) and the District/Head Office Senior Manager confirming that permission has been granted for the research to be conducted.

The following conditions apply to GDE research. The researcher may proceed with the above study subject to the conditions listed below being met. Approval may be withdrawn should any of the conditions listed below be flouted:

09/07/2019

Making education a societal priority

Office of the Director: Education Research and Knowledge Management

7th Floor, 17 Simmonds Street, Johannesburg, 2001 TeE•. (011) 355 0488

Email: Faith.Tshabalala@gauteng.gov.za Website: www.education.gpg.gov.za

- Letter that would indicate that the said researcher/s has/have been granted permission from the Gauteng Department of Education to conduct the research study.
- 2. The District/Head Office Senior Manager/s must be approached separately, and in writing, for permission to involve District/Head Office Officials in the project.
- 3. A copy of this letter must be forwarded to the school principal and the chairperson of the School Governing Body (SGB) that would indicate that the researcher/s have been granted permission from the Gauteng Department of Education to conduct the research study.
- 4. A letter/ document that outline the purpose of the research and the anticipated outcomes of such research must be made available to the principals, SGBs and District/Head Office Senior Managers of the schools and districts/offices concerned, respectively.
- 5. The Researcher will make every effort obtain the goodwill and co-operation of all the GDE officials, principals, and chairpersons of the SGBs, teachers and learners involved. Persons who offer their co-operation will not receive additional remuneration from the Department while those that opt not to participate will not be penalised in any way.
- 6. Research may only be conducted after school hours so that the normal school programme is not interrupted. The Principal (if at a school) and/or Director (if at a district/head office) must be consulted about an appropriate time when the researcher/s may carry out their research at the sites that they manage.
- 7. Research may only commence from the second week of February and must be concluded before the beginning of the last quarter of the academic year. If incomplete, an amended Research Approval letter may be requested to conduct research in the following year.
- 8. Items 6 and 7 will not apply to any research effort being undertaken on behalf of the GDE. Such research will have been commissioned and be paid for by the Gauteng Department of Education.
- 9. It is the researcher's responsibility to obtain written parental consent of all learners that are expected to participate in the study.
- 10. The researcher is responsible for supplying and utilising his/her own research resources, such as stationery, photocopies, transport, faxes and telephones and should not depend on the goodwill of the institutions and/or the offices visited for supplying such resources.
- The names of the GDE officials, schools, principals, parents, teachers and learners that participate in the study may not appear in the research report without the written consent of each of these individuals and/or organisations.

- 12. On completion of the study the researcher/s must supply the Director: Knowledge Management & Research with one Hard Cover bound and an electronic copy of the research.
- 13. The researcher may be expected to provide short presentations on the purpose, findings and recommendations of his/her research to both GDE officials and the schools concerned.
- 14 Should the researcher have been involved with research at a school and/or a district/head office level, the Director concerned must also be supplied with a brief summary of the purpose, findings and recommendations of the research study.

The Gauteng Department of Education wishes you well in this important undertaking and looks forward to examining the findings of your research study.

Mr Gumani Mukatuni

Acting CES: Education Research and Knowledge Management

DATE: 09/07/2019

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Making education a societal priority

Office of the Director: Education Research and Knowledge Management

7th Floor, 17 Simmonds Street, Johannesburg, 2001 Tel: (011) 355 0488Email: Faith.Tshabalala@gauteng.gov.zaWebsite:

Appendix J Letter confirming editing

8 Nahoon Valley Place Nahoon Valley East London 5241 28 December 2019

TO WHOM IT MAY CONCERN

I hereby confirm that I have proofread and edited the following thesis using the Windows 'Tracking' system to reflect my comments and suggested corrections for the student to action to produce a clean copy for examination purposes:

Managing multi-grade teaching for optimal learning in Gauteng West primary schools by MARLISE TREDOUX, submitted in accordance with the requirements for the degree of MASTER IN EDUCATION: EDUCATION MANAGEMENT at the UNIVERSITY OF SOUTH AFRICA.

In addition to the suggested changes I have made, the thesis contains various language and formatting issues that the student is still required to address but as editor I will not see nor verify the final copy of the thesis that is submitted for examination.

BNCarlson

Brian Carlson (B.A., M.Ed.)

Professional Editor

Email: bcarlson521@gmail.com

Cell: 0834596647

Disclaimer: Although I have made comments and suggested corrections, the responsibility for the quality of the final document lies with the **student** in the first instance and not with myself as the editor.

Appendix K Turnitin originality report

Managing multi-grade teaching for optimal learning in Gauteng West primary schools

 $by \; \mathsf{M} \; \mathsf{TREDOUX}$

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