

**THE EXPERIENCES OF STUDENTS
PARTICIPATING IN AN HIV/AIDS
TEACHER EDUCATION PILOT
PROGRAMME**

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**THE EXPERIENCES OF STUDENTS PARTICIPATING
IN AN HIV/AIDS TEACHER EDUCATION
PILOT PROGRAMME**

by

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Aan die beste Mamma op aarde...

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DECLARATION OF AUTHENTICITY

I, Carine Jonker (student number 20017163), declare that this study titled: *The experiences of students participating in an HIV/AIDS teacher education pilot programme*, which I hereby submit for the degree Master Educationis in Educational Psychology at the University of Pretoria, is my own work and has not been previously submitted by me for a degree at this or any other university. All resources and citations from literature have been acknowledged in-text and referenced in full.

Carine Jonker

April 2011

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ABSTRACT

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The current research study was a qualitative investigation to explore and describe how students, registered for the Education 364 module, experienced the HIV/AIDS teacher education pilot programme (TEPP), implemented at the University of Pretoria. The availability of in-depth interview transcriptions, as raw data, permitted analysis of existing data from a different perspective. Transcriptions of a focus group interview and two individual interviews with Afrikaans students were purposefully selected and inductively analysed. Two main themes emerged following the thematic analysis of interview transcriptions. Findings indicate that the content of the HIV/AIDS TEPP provided students with a solid HIV/AIDS-related theoretical basis. Findings furthermore suggest that the HIV/AIDS TEPP could be adapted for different levels of knowledge and teaching phases. Appropriate and sufficient resource materials, in accordance with the explicit needs of each teaching phase, could be developed. Practical examples and clear guidelines may be incorporated into HIV/AIDS programmes to equip teachers to deal with difficult situations. In addition, sufficient time allocation to and early implementation of HIV/AIDS programmes seem necessary. The value of a range of teaching and learning methodologies and the role of HIV/AIDS programme presenters were emphasised. Since existing teacher training may not adequately prepare teachers to address HIV/AIDS challenges, the need for continuous development, lifelong learning as well as support for teachers were also highlighted. Finally, findings indicate that engagement in affective and identity-construction domains may reduce HIV/AIDS fatigue and encourage students to take on active roles to address HIV/AIDS-related challenges.

KEY WORDS

Content analysis	Pilot programme
Curriculum development	Secondary data
Experiences	Teacher
HEAIDS	Teacher training
HIV/AIDS	Thematic analysis

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ACRONYMS AND ABBREVIATIONS USED IN THIS DISSERTATION

AIDS	Acquired Immune Deficiency Syndrome
CPTD	Continuing Professional Teacher Development
DoE	Department of Education
DBE	Department of Basic Education
DHET	Department of Higher Education and Training
DoH	Department of Health
FET	Further Education and Training (teaching phase)
HEAIDS	Higher Education HIV/AIDS Programme
HEI	Higher Education Institutions
HIV	Human Immunodeficiency Virus
HSRC	Human Sciences Research Council
NGO	Non-Governmental Organisation
UNAIDS	Joint United Nations Programme on HIV/AIDS
UNESCO	United Nations Educational, Scientific and Cultural Organization

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TABLE OF CONTENT

	Page
CHAPTER ONE	
INTRODUCING THE STUDY	
1.1 INTRODUCTION AND RATIONALE	1
1.2 PURPOSE OF THE STUDY	4
1.3 RESEARCH QUESTIONS	5
1.4 CLARIFICATION OF CORE CONCEPTS AND TERMINOLOGIES	5
1.4.1 EXPERIENCES.....	5
1.4.2 UNDERGRADUATE EDUCATION MODULE (EDUCATION 364).....	6
1.4.3 HIGHER EDUCATION HIV/AIDS (HEAIDS).....	6
1.4.4 HIV/AIDS TEACHER EDUCATION PILOT PROGRAMME (HIV/AIDS TEPP).....	7
1.4.5 HIV/AIDS.....	7
1.4.6 STUDENT.....	7
1.4.7 TEACHER, EDUCATOR AND LECTURER.....	8
1.4.8 LEARNER.....	8
1.4.9 CURRICULUM.....	8
1.5 BRIEF OVERVIEW OF PARADIGMS, METHODOLOGIES, ETHICAL CONSIDERATIONS AND QUALITY CRITERIA	8
1.6 OUTLINE OF CHAPTERS	10
1.7 CONCLUSION	11

CHAPTER TWO

LITERATURE REVIEW AND THEORETICAL PERSPECTIVE

2.1	INTRODUCTION	12
2.2	HIV/AIDS AND EDUCATION	13
2.2.1	THE EDUCATION SECTOR	14
2.2.2	STIGMA, DISCRIMINATION AND DENIAL	15
2.2.3	CULTURAL AND SOCIALISED BELIEFS	16
2.3	HIV/AIDS EDUCATION AND TEACHER TRAINING	17
2.3.1	THE ROLE OF TEACHERS WITH REGARD TO HIV/AIDS	18
2.3.2	ENABLING TEACHERS TO ADDRESS HIV/AIDS CHALLENGES	19
2.3.3	CONTINUOUS PROFESSIONAL DEVELOPMENT AND SUPPORT FOR TEACHERS	23
2.4	HIV/AIDS CURRICULUM DEVELOPMENT	24
2.4.1	HIV/AIDS CURRICULUM AND MODELS OF HEALTH BEHAVIOUR	24
2.4.2	CURRICULUM DESIGN	25
2.4.3	CURRICULUM IMPLEMENTATION	27
2.5	THEORETICAL PERSPECTIVE	30
2.5.1	SOCIAL COGNITIVE THEORY: BASIC ASSUMPTIONS ABOUT LEARNING AND BEHAVIOUR	31
2.5.2	SOCIAL COGNITIVE THEORY AND SELF-EFFICACY BELIEFS	32
2.6	THEORETICAL ASSUMPTIONS	33
2.7	CONCLUSION	35

**CHAPTER THREE
RESEARCH DESIGN AND METHODOLOGY**

3.1	INTRODUCTION	36
3.2	PARADIGMATIC PERSPECTIVES	36
3.2.1	CONSTRUCTIVISM AS META-THEORY	36
3.2.2	QUALITATIVE METHODOLOGICAL PARADIGM	38
3.3	RESEARCH METHODOLOGY AND STRATEGIES	40
3.3.1	QUALITATIVE CONTENT ANALYSIS AS RESEARCH DESIGN	40
3.3.2	PURPOSIVE SAMPLING OF INTERVIEW TRANSCRIPTIONS	42
3.3.3	DATA GENERATION OF SELECTED DATA SOURCES	43
3.4	DATA ANALYSIS AND INTERPRETATION	45
3.5	REFLECTING ON MY ROLE AS RESEARCHER	48
3.6	ETHICAL STRATEGIES	50
3.6.1	PERMISSION TO UTILISE EXISTING DATA	50
3.6.2	ANALYSIS AND REPORTING	51
3.6.3	INFORMED CONSENT	51
3.6.4	CONFIDENTIALITY AND ANONYMITY	51
3.7	QUALITY CRITERIA	52
3.7.1	CREDIBILITY	52
3.7.2	TRANSFERABILITY	53
3.7.3	DEPENDABILITY	54
3.7.4	CONFIRMABILITY	54
3.7.5	AUTHENTICITY	55
3.8	CONCLUSION	55

CHAPTER FOUR THE RESULTS AND INTEGRATED FINDINGS OF THE STUDY

4.1	INTRODUCTION	56
4.2	THEMATIC ANALYSIS: EMERGING THEMES	56
	THEME 1: STUDENT EXPERIENCES REGARDING CURRICULUM ISSUES IN THE PILOTING OF THE HEAIDS HIV/AIDS TEPP	57
	Sub-Theme 1.1: Module content	57
	Sub-Theme 1.2: Module format	62
	THEME 2: STUDENT PROFESSIONAL AND PERSONAL EXPERIENCES REGARDING HIV/AIDS	68
	Sub-Theme 2.1: Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP	69
	Sub-theme 2.2: Personal experiences of students related to HIV/AIDS	78
4.3	REVISITING LITERATURE AND SOCIAL COGNITIVE THEORY	83
4.4	CONCLUSION	85

---oOo---

CHAPTER FIVE CONCLUSION AND RECOMMENDATIONS

5.1	INTRODUCTION	86
5.2	REVISITING THEORETICAL ASSUMPTIONS	87
5.3	ADDRESSING THE SECONDARY RESEARCH QUESTIONS	89
5.3.1	SECONDARY QUESTION 1: What positive experiences did students participating in the HIV/AIDS TEPP voice?	89
5.3.2	SECONDARY QUESTION 2: What negative experiences did students participating in the HIV/AIDS TEPP express?	90
5.3.3	SECONDARY QUESTION 3: How can student experiences inform teacher training HIV/AIDS curriculum development?	92
5.4	ADDRESSING THE PRIMARY RESEARCH QUESTION	93

	Page
5.5 SILENCES IN THE DATA	96
5.6 DELIMITATIONS AND LIMITATIONS OF THE STUDY	97
5.7 RECOMMENDATIONS	98
5.7.1 RECOMMENDATIONS FOR FURTHER RESEARCH	99
5.7.2 RECOMMENDATIONS FOR PRACTICE	99
5.7.3 RECOMMENDATIONS FOR TRAINING	100
5.8 CONCLUDING REMARKS	101

---oOo---

REFERENCES	102
ADDITIONAL REFERENCES CONSULTED	120
ADDENDA	122

---oOo---

LIST OF FIGURES

	Page
FIGURE 1.1: Overview of the study	4
FIGURE 2.1: Outline of Chapter 2	13
FIGURE 2.2: Triadic reciprocal interaction (Adapted from Schunk, 1991).....	31
FIGURE 5.1: Overview of Chapter 5	86

LIST OF TABLES

TABLE 3.1: Methodological decisions	40
TABLE 3.2: Outline of interviews that contributed to the generation of data	43
TABLE 4.1: Results of the thematic analysis of data	56
TABLE 4.2: Categories as well as inclusion and exclusion criteria pertaining to the sub-theme <i>Module content</i>	58
TABLE 4.3: Categories as well as inclusion and exclusion criteria pertaining to the sub-theme <i>Module format</i>	62
TABLE 4.4: Categories as well as inclusion and exclusion criteria pertaining to the sub-theme <i>Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP</i>	69
TABLE 4.5: Categories as well as inclusion and exclusion criteria pertaining to the sub-theme <i>Personal experiences of students related to HIV/AIDS</i>	78

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CHAPTER ONE

INTRODUCING THE STUDY

1.1 INTRODUCTION AND RATIONALE

Chapter 1 provides a framework and a brief overview of the current study. In this regard, I outline the rationale for and purpose of the study in light of the relevant research questions. Subsequently, I clarify core concepts and summarise the paradigmatic perspective, methodology decisions as well as the ethical considerations and quality criteria that informed the study.

The current study analyses data from a broad research project that was conducted in Higher Education Institutions (HEI) throughout South Africa (2008-2009). The Higher Education HIV/AIDS Programme (HEAIDS) was an initiative of the Department of Education undertaken by Higher Education South Africa (HESA) in order to address the prevention, management and alleviation of HIV/AIDS in the education sector (Evaluation module, 2008). The overall purpose of the HEAIDS project was *'to enhance the personal and professional competencies of teacher education graduates through the provision of support for the piloting of an HIV/AIDS Teacher Education Module in teacher education faculties and for the identification, evaluation and dissemination of effective strategies for incorporation of HIV/AIDS related education into teacher education and other curricula'* (Evaluation module, 2008, p. 4).

The HEAIDS project was implemented in 23 teacher education faculties in HEI in South Africa (Evaluation module, 2008), of which one was the University of Pretoria. At the University of Pretoria the HIV/AIDS teacher education pilot programme (HIV/AIDS TEPP)¹ was presented as part of a third year undergraduate education module (Education 364) (Coetzee, 2008). Since HIV/AIDS is a widespread economic, cultural, developmental and social challenge it is not viewed only as a health issue (Donald, Lazarus & Lolwana, 2002; Hernes, 2002; Prinsloo, 2005; Sukati, Vilakati & Esampally, 2010; UNAIDS, 2009b)² and programmes such as the HIV/AIDS TEPP are necessary to address the HIV/AIDS epidemic.

¹ I use the acronym HIV/AIDS TEPP to refer to the HIV/AIDS teacher education pilot programme in the current study.

² Refer to Chapter 2 for a detailed review of relevant literature.

As appointed research intern for the HEAIDS project at the University of Pretoria, I was presented with the opportunity to utilise secondary data (i.e. data generated in the HEAIDS project) for the current study. The overarching HEAIDS project incorporated research data generated from all the institutions participating in the pilot project, whereas I was especially interested in exploring the experiences of a specific student group enrolled in the HIV/AIDS TEPP at the University of Pretoria. In this regard, scholars have noted that there is a lack in current South African HIV/AIDS policies and implementation plans to incorporate how participants (Griesel-Roux, Ebersöhn, Smit & Eloff, 2005), especially Afrikaans participants³ (Bacus, 2008), experience HIV/AIDS programmes. Bacus (2008) argues that numerous Afrikaans individuals may believe that the risk of HIV/AIDS is not ‘personal’ with a reluctance to acknowledge the extent of the epidemic.

While research (Griesel-Roux *et al.*, 2005) has been conducted to investigate adolescent’ (i.e. learners in secondary schools) experiences of HIV/AIDS education programmes, it appears that more research is necessary in HEI, especially in terms of HIV/AIDS teacher education and training. The overall wellbeing of a nation is partly dependent on the contributions made by higher education (Geyser, 2004). Therefore, South African HEI need to create pedagogies of sexualities that offer students access to theories, research methodologies and knowledge required to address questions of sexual health and rights (Bennet & Reddy, 2009).

The entire education system and its institutions are placed under threat by HIV/AIDS since the epidemic reduces the demand and supply of educational services (Haldenwang, Hichert & Esterhuyse, 2009; Kelly, 2002). Furthermore, the loss of teachers, impairment of quality, numerous negative effects on learners, teachers and communities as well as the constraint on resources can weaken the education system’s ability to provide quality general and HIV/AIDS education (Griesel-Roux *et al.*, 2005; Hernes, 2002; Kelly, 2002). Literature indicates that schools, at primary (group most receptive to efforts that seek to influence behaviour) and secondary (group most at risk) level, must take on the responsibility for sexuality education (Donald, Lazarus & Lolwana, 2006; World Bank, 2002). Teachers therefore seem to have an important role to play concerning HIV/AIDS prevention through pro-active (e.g. HIV/AIDS education, promoting resilience) and re-active (e.g. providing psychosocial support) strategies (Donald, Lazarus *et al.*, 2006; Ebersöhn & Ferreira, forthcoming; Ferreira & Ebersöhn, 2011; Kelly, 2000; Van den Berg, 2008; Wood & Hillman, 2008).

³ White Afrikaans-speaking individuals (i.e. mother tongue speakers) are primarily associated with South Africa and are commonly referred to as Afrikaners (Bacus, 2008).

Since the majority of new HIV/AIDS infections occur in young people (15-24 years) (UNAIDS, 2009b; UNAIDS, 2010) teachers should be knowledgeable about and comfortable with HIV/AIDS issues, highlighting the need for intensive HIV/AIDS teacher training regarding the reality of teaching and coping with HIV/AIDS (Dawson, Chunis, Smith & Carboni, 2001; Theron, 2005). Teachers need to be open and free when talking about HIV/AIDS, be well informed and equipped with knowledge, able to deal with challenges and adequately trained with regard to HIV/AIDS curriculum, policy and programme requirements (Coombe, 2003b; Van den Berg, 2008). Although numerous policies (DoE, 1999; DoE, 2000; DoE, 2001; DoE, 2007b) stipulate the responsibilities of teachers and the need to equip teachers to undertake essential and demanding tasks, HEI may not be providing sufficient training to enable teachers to fulfil their roles competently (Loots & Mnguni, 2007).

Furthermore, although education appears to be an effective preventive approach mediating the impact of the HIV/AIDS epidemic (Haldenwang *et al.*, 2009; Hernes, 2002; Kelly, 2002; Sukati *et al.*, 2010; Van den Berg, 2008; World Bank, 2002), little attention has thus far been given to the preference of curriculum design, appropriate teaching and learning strategies as well as motivational determinants for learning about HIV/AIDS (Hadera, Boer & Kuiper, 2007; Wood & Webb, 2008). Despite ample activities surrounding HIV/AIDS, there appears to be a lack of depth, direction and detail regarding HIV/AIDS practices (Jansen, 2007). The paradigm of education is shifting in the face of HIV/AIDS and the concepts, planning and implementation principles need to be reconceptualised (Crewe in Jansen, 2007, p. 6) to address the needs of learners, teachers and communities. Certain challenges may be experienced when a programme such as the HIV/AIDS TEPP is instigated since it appears that HIV/AIDS programmes are not easily implemented in HEI (Cairns, Dickinson & Orr, 2006). The design, implementation, evaluation, usefulness as well as the limitations of HIV/AIDS programmes, from the students' points of view, require further investigation to ensure relevance and effectiveness of programmes (Evaluation module, 2008; UNAIDS, 2009b). More so, in order to enable teachers to effectively address HIV/AIDS issues it is necessary to ascertain teachers' perceptions of HIV/AIDS (Theron, 2005).

The current paucity of literature, as discussed above, together with the concerns relating to inadequate HIV/AIDS education in HEI, especially teacher training, as well as HIV/AIDS curriculum development confirms that these areas of research require further attention. It therefore seems worthwhile to explore how students experienced the HIV/AIDS TEPP. In Figure 1.1, I provide an overview of the current study.



FIGURE 1.1: OVERVIEW OF THE STUDY

1.2 PURPOSE OF THE STUDY

The purpose of the current research study was to explore and describe (Babbie & Mouton, 2001; Cohen, Manion & Morrison, 2007) how students, registered for the Education 364 module (EDU 364) (Coetzee, 2008), experienced the HIV/AIDS TEPP, implemented at the University of Pretoria in 2008. My intention was to identify themes, concerning students' experiences, which emerged during participation in the HIV/AIDS TEPP. I also aimed at gaining insight into how students' experiences of the HIV/AIDS TEPP may inform future teacher training in HIV/AIDS education.

1.3 RESEARCH QUESTIONS

In light of the rationale and purpose of the current study as described above, I was guided in my inquiry by the following primary research question:

How might insight into education students' experiences of the HIV/AIDS teacher education pilot programme inform future teacher training in HIV/AIDS education?

In an attempt to understand the abovementioned primary research question, I explored the following secondary research questions:

- What positive experiences did students participating in the HIV/AIDS TEPP voice?
- What negative experiences did students participating in the HIV/AIDS TEPP express?
- How can student experiences inform teacher training HIV/AIDS curriculum development?

I attempted to gain insight into student experiences, highlighting the potential value and challenges that the HIV/AIDS TEPP had for students participating in the HIV/AIDS TEPP. The current study therefore aimed to add to the existing body of knowledge relating to HIV/AIDS and education since it investigated students' experiences of the HIV/AIDS TEPP. In addition, the study potentially contributed to HIV/AIDS curriculum development by describing a specific student group's views of what they found beneficial and lacking in the programme as well as student recommendations for the content, format and strategies for future HIV/AIDS education in HEI. To address research questions posed by the current study, key concepts as indicated below need to be clarified.

1.4 CLARIFICATION OF CORE CONCEPTS AND TERMINOLOGIES

In the context of the current study, the following core concepts and terminologies are elucidated in order to ensure a clear and common understanding of the relevant concepts.

1.4.1 EXPERIENCES

The *Dictionary of Qualitative Inquiry* (Schwandt, 2001) proclaims that qualitative inquiry deals with human lived experience. Multiple voices recognising and fostering the connection

between individuals' education and their personal experiences, as well as the presence of different identities encapsulate experiences (Neuman, 1997). Experiences incorporate the different viewpoints of people in different circumstances, the ways that people actively make sense of their experiences, the psychological, socio-cultural and linguistic factors as well as processes which influence this process of creating meaning (Wilkinson, Joffe & Yardely, 2004). According to Schwandt (2001) two German words, 'Erlebnis' and 'Erfahrung' are employed to explain the notion that there are different senses of experiences. Erlebnis signifies experience as something a person has, an event or venture associated with a subject, while erfahrung implies experience as something a person undergoes so that subjectivity is drawn into a meaningful event.

Within the context of the current study, the experiences that students had relating to the HIV/AIDS TEPP can be conceptualised as a sequence of events participated in, or lived through (erfahrung) that made an impression on them and through which knowledge as well as competency (erlebnis) were developed, cultivating their point of view.

1.4.2 UNDERGRADUATE EDUCATION MODULE (EDUCATION 364)⁴

The Education 364 (EDU 364) module is a third year module presented by the Faculty of Education (Coetzee, 2008) at the University of Pretoria. Within the Baccalaureus Educationis (BEd) programme, EDU 364 is part of a series of core modules (Coetzee, 2008; Department of Higher Education and Training, 2010; Education, 2008) required to complete an undergraduate degree at the University of Pretoria. The EDU 364 is also included, by numerous students, as an elective during the completion of a degree (e.g. BA [own choice] in Psychology). The purpose of the EDU 364 module is to facilitate students' knowledge and understanding of positive approaches to childhood and education. The HIV/AIDS TEPP was situated within EDU 364 as part of theme three (the wellbeing of children in South Africa), unit 8 (health and wellness promotion - HEAIDS) (Coetzee, 2008). See Addendum E for additional detail of content, pedagogy and outcomes of EDU 364.

1.4.3 HIGHER EDUCATION HIV/AIDS (HEAIDS)

The Higher Education HIV/AIDS (HEAIDS) Programme was an initiative of the Department of Education undertaken by Higher Education South Africa (HESA). The project was funded

⁴ The 'Opvoedkunde 364' (OPV 364) module is the Afrikaans counterpart of the Education 364 (EDU 364) module presented at the University of Pretoria.

by the European Union under the European Programme for reconstruction and development in terms of a partnership agreement with the Department of Education.

The HEAIDS research project aspired to enhance the personal and professional competencies of teacher education graduates through the implementation of the HIV/AIDS TEPP in HEI. The project further strove to identify, evaluate and disseminate strategies necessary for the effective incorporation of HIV/AIDS related education into teacher education and other curricula (Evaluation module, 2008).

1.4.4 HIV/AIDS TEACHER EDUCATION PILOT PROGRAMME (HIV/AIDS TEPP)

For the purpose of the current study, an HIV/AIDS teacher education pilot programme refers specifically to the HIV/AIDS TEPP implemented at the University of Pretoria. The HIV/AIDS TEPP was initiated by HEAIDS to enhance the personal and professional competencies of education graduates through the piloting of an HIV/AIDS module in teacher education faculties across 23 public HEI (Evaluation module, 2008). HEAIDS provided teaching and learning materials including learning guides and a DVD (containing footage of children infected and affected by HIV/AIDS) to HEI.

1.4.5 HIV/AIDS

HIV is the Human Immunodeficiency Virus transmitted through blood, semen and vaginal fluids which weakens the individual's immune system. AIDS (Acquired Immune Deficiency Syndrome) is the collection of diseases that are acquired from being HIV positive. When the immune system of the individual infected with HIV deteriorates to the point where life-threatening and unusual illnesses occur, it is believed that the individual has AIDS (HIV/AIDS Teacher Education Pilot Programme Learning Guide, 2008). In the current study the term HIV/AIDS is used to correlate with the terminology used by HEAIDS and the HIV/AIDS TEPP.

1.4.6 STUDENT

In the current study, student refers to third-year male and female undergraduate Afrikaans-speaking students, mostly teacher-training students, enrolled in the EDU 364 module at the University of Pretoria.

1.4.7 TEACHER, EDUCATOR AND LECTURER

Educator denotes any individual who teaches, educates or trains other persons at an education institution. An educator may further assist in rendering professional education services, education auxiliary or support services provided by or in an education department (DoE, 1996; DHET, 2010). The term ‘teacher’ signifies a school-based educator, with the primary responsibility of classroom teaching at a school. A teacher will begin his/her career as specialist in a specific phase and/or subject, (or combination thereof) (DHET, 2010). Within the current publication, the term ‘educator’ and ‘teacher’ may be used interchangeably. Furthermore, lecturer refers to presenters of the HIV/AIDS TEPP as referred to by students participating in the HIV/AIDS TEPP.

1.4.8 LEARNER

The term ‘learner’, in the current study, refers to any young person enrolled in a primary or secondary school. Teachers should develop a supportive environment for learners and respond to the diverse needs of learners (DHET, 2010).

1.4.9 CURRICULUM

The concept ‘curriculum’ has undergone a transformation during the twentieth century and may have a broad or more focused meaning depending on the context in which it is applied (Carl, 2002; Tanner & Tanner, 2007). Curriculum is generative, not passive or inert, and encompasses formal subject matter as well as the processes through which the participant becomes increasingly knowledgeable (Tanner & Tanner, 2007). The core of a curriculum remains the provision of a systematic plan for teaching (instruction) and learning in order to achieve specified results, goals or outcomes (Geysler, 2004). For the purpose of the current study, ‘curriculum’ is regarded as part of ‘subject curriculum’ (Walters in Carl, 2002, p. 37) specifically curriculum for HIV/AIDS education.

1.5 BRIEF OVERVIEW OF PARADIGMS, METHODOLOGIES, ETHICAL CONSIDERATIONS AND QUALITY CRITERIA

In this section, I provide a brief overview of the research design, research methodology, ethical strategies and quality criteria relating to the current study. Seeing that my intent was to interpret the experiences of students participating in the HIV/AIDS TEPP, constructivism

seemed to be an appropriate meta-theoretical paradigm by which the current study could be steered (Creswell, 2009). I purposively selected transcriptions of a focus group interview and two individual interviews with Afrikaans students who had direct experience with the HIV/AIDS TEPP. Experiences and interpretations are not construed in isolation but actively constructed in a socio-cultural context (Donald, Lazarus *et al.*, 2006; Schwandt, 2001). Through the investigation of students' individual experiences, I sought to capture the meaning and collective themes of their lived experiences (Starks & Trinidad, 2007).

I considered a qualitative approach (methodological paradigm) suitable for addressing the objectives of the current study since qualitative research abides by an inductive style of inquiry with the intention of accumulating rich descriptive data (Nieuwenhuis, 2007a). The value of qualitative research lies in the particular description and themes developed in the context of a specific area of inquiry (Creswell, 2009). By means of a qualitative approach, it was possible to explore and describe students' experiences, of the HIV/AIDS TEPP, shaped by their subjective and socio-cultural perspective (Wilkinson *et al.*, 2004). Refer to section 3.2 for a detailed discussion concerning the paradigmatic perspective in the current study.

I used a qualitative content analysis research design (Mouton, 2001) in the current study. I personally transcribed the original audio-recordings of the Afrikaans focus group as well as the individual interviews (obtained from the HEAIDS project), in a verbatim manner. The availability of in-depth interview transcriptions, as raw data, permitted analysis of existing data from a new perspective (James & Sorensen in Corti & Thompson, 2004, p. 333). Refer to section 3.3 for an elaborative examination of research methodology employed in the current study. I furthermore applied thematic analysis, as content analysis method, in order to make sense of secondary data by breaking up the data into manageable themes, categories and sub-categories (Creswell, 2009; Mouton, 2001). The purpose was to inductively analyse existing textual data (i.e. interview transcriptions) in terms of common words, phrases or patterns that aided me in my understanding and interpretation of emerging data (McMillan & Schumacher, 2010; Mouton, 2001). I conducted the thematic analysis by following the guidelines described by Braun and Clarke (2006) (see Addendum A). I investigated participants' experiences of the HIV/AIDS TEPP in an attempt to approximate their construction of the HIV/AIDS TEPP (Nieuwenhuis, 2007c) as documented in aforementioned transcriptions. See section 3.4 for an in-depth discussion of the data analysis and interpretation process of the current study.

In addition, the ethical guidelines which the current study had to contend with included permission to utilise data, analysis and reporting, informed consent as well as confidentiality and anonymity (Babbie, 2005; Cohen *et al.*, 2007; Corti & Thompson, 2004; Creswell, 2009; Evaluation module, 2008; Gravetter & Forzano, 2009; Mouton, 2001; Vivar, McQueen, Whyte & Armayor, 2007). In section 3.6, I offer a detailed description of the ethical considerations that guided the inquiry.

Finally, the trustworthiness of the current study could not be established separately but was an integral part of the overall design and implementation of the various processes throughout the study. I employed various strategies to address qualitative research criteria of credibility, transferability, dependability confirmability and authenticity (Babbie, 2005; Babbie & Mouton, 2001; Cohen *et al.*, 2007; Creswell, 2009; Mertens, 1998; Nieuwenhuis, 2007b; Nieuwenhuis, 2007c; Patton, 2002).

In Figure 1.1, the strategies employed to ensure trustworthiness in the current study were presented synoptically. I guarded against a biased description of the data, striving to ensure that the content of the text was conveyed in a scientific manner. Refer to section 3.7 for a detailed discussion relating to the trustworthiness strategies employed in the current study.

1.6 OUTLINE OF CHAPTERS

CHAPTER 2: LITERATURE REVIEW

Chapter 2 outlines a thorough literature review on relevant aspects within the context of the current study including HIV/AIDS and education, HIV/AIDS and teacher training as well as HIV/AIDS curriculum development in order to explore the experiences of students participating in the HIV/AIDS TEPP. I conclude the chapter with a presentation of the theoretical framing of the study to ensure consistency between the purpose of the current study and the relevant theory of the topic of enquiry.

CHAPTER 3: RESEARCH DESIGN AND METHODOLOGY

Chapter 3 offers a description of the research process in terms of the selected research design and methodology followed during the current research study in order to explore the research questions. The selected methods of data generation, data analysis and interpretation are explained and justified. I also reflect on my role as researcher. I conclude the chapter with a thorough discussion on ethical considerations and quality criteria guidelines followed.

CHAPTER 4: THE RESULTS AND INTEGRATED FINDINGS OF THE STUDY

Chapter 4 outlines a presentation and discussion of the results and findings obtained during the current study in an integrated manner. The results are presented in terms of themes, categories and sub-categories that emerged during an inductive thematic analysis process. Finally, I present the interpretation of the results. To this end, I review the literature outlined in Chapter 2.

CHAPTER 5: CONCLUSIONS AND RECOMMENDATION

Chapter 5, the concluding chapter, provides a summary of the main findings and conclusions in terms of the research questions and purpose (as posed in Chapter 1) of the current study. I outline potential contributions as well as challenges I faced in completing the current study and conclude the chapter with recommendations for further research, training and practice.

1.7 CONCLUSION

Chapter 1 provided the introduction, background and rationale of the current study as well as my motivation for selecting my particular research focus. The relevance and contribution of the study as well as the research questions were presented. A clarification of key concepts was provided as well as a succinct outline of the selected paradigm, research design and methodological choices. I also briefly considered the ethical issues and quality criteria relating to the trustworthiness of the current study. Finally, a concise discussion of the chapters to follow was outlined.

In Chapter 2, I turn my discussion to existing literature by presenting a comprehensive review of subject matter relevant to the current study. I also discuss the chosen theoretical framework, namely Social Cognitive Theory (Bandura, 1986).

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2.1 INTRODUCTION

Chapter 1 presented an outline of the current study by specifying the rationale, purpose and guiding questions directing the inquiry. Furthermore, I described the core concepts and briefly introduced the paradigmatic perspectives, methodological strategies and trustworthiness in terms of quality criteria and ethical considerations.

Chapter 2 provides an overview of relevant literature on three main literature bases including HIV/AIDS and education, HIV/AIDS and teacher training as well as HIV/AIDS curriculum development in order to explore the experiences of students participating in the HIV/AIDS TEPP. The first section of this chapter focuses on the impact and importance of education by exploring the critical role the education sector plays in eradicating issues such as stigma and discrimination by addressing cultural as well as socialised beliefs relating to HIV/AIDS. The second section concentrates on teacher training to enable capacity to address HIV/AIDS challenges. In this section, I explore the teachers' role relating to HIV/AIDS, as well as the importance of continuous professional development and support for teachers in the face of the epidemic. The third section considers HIV/AIDS curriculum development by examining pertinent research findings on HIV/AIDS programmes. The last section outlines the theoretical framing of the study to ensure consistency between the purpose of the current study and the relevant theory of the topic.

Relevant research concerning the current study is explored throughout this chapter to investigate established information and to identify possible gaps in research in an attempt to inform future teacher training in HIV/AIDS education. Figure 2.1 presents an outline of Chapter 2.

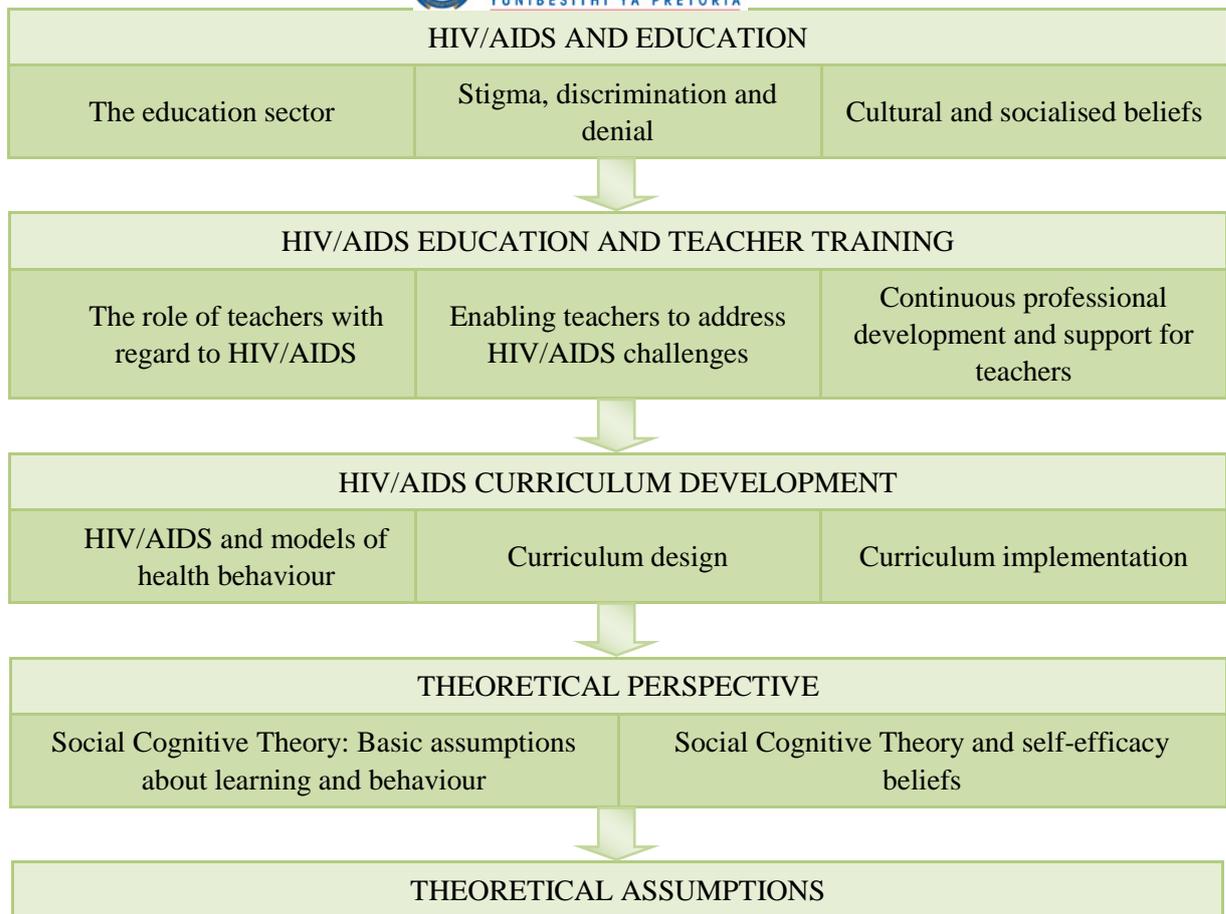


FIGURE 2.1: OUTLINE OF CHAPTER 2

2.2 HIV/AIDS AND EDUCATION

One of the most devastating challenges currently faced by the education system seems to be HIV/AIDS (DoE, 2007b; UNAIDS, 2009b). The Joint United Nations Programme on HIV/AIDS (UNAIDS) estimated at the end of 2009 that 33.3 million people were living with HIV/AIDS and 2.6 million new infections had occurred (UNAIDS, 2010). The spread and consequences of HIV/AIDS in many African countries have been alarming (Eba, 2007). In South Africa HIV/AIDS relentlessly change demographics given that South Africa has the largest HIV-positive population in the world (estimated at 5.6 million) with new infections occurring at a rate of 1800-2000 per day (Bacus, 2008; Department of Health in Haldenwang *et al.*, 2009, p. 146; UNAIDS, 2009a; UNAIDS, 2010). One protective factor available to society seems to be situated within education (Kelly, 2002; UNESCO, 2008a; World Bank, 2002).



2.2.1 THE EDUCATION SECTOR

HIV/AIDS is a major educational issue presenting a central and urgent challenge to education institutions (Donald *et al.*, 2002). The South African response to HIV/AIDS before 1998 was primarily restricted to the health sector. However, since then government, including the Department of Education, have shown commitment in addressing HIV/AIDS (Bhana, 2008; Webb & Gripper, 2010; Wood & Hillman, 2008) as once again indicated through the *Integrated Strategy on HIV and AIDS 2011-2015* (Department of Basic Education, 2010). Mediating the impact of the HIV/AIDS epidemic relies on prevention which in turn depends to a great extent on education and mitigation through education (Haldenwang *et al.*, 2009; Hernes, 2002; Kelly, 2002; Sukati *et al.*, 2010; Van den Berg, 2008). Formal and non-formal education, viewed as the ‘social vaccine’ against HIV/AIDS, may offer a means of escaping the grip of the epidemic (Kelly, 2002). Important HIV/AIDS information can reach learners from a receptive stage, influencing attitudes and ensuing long-term healthy behaviours (Kelly, 2002; UNAIDS, 2009b; UNAIDS, 2010; World Bank, 2002). In addition, the reduction of HIV/AIDS prevalence rates among young people has been associated, especially, with school education since it offers a ready-made, cost-effective infrastructure for the deliverance of HIV/AIDS prevention efforts (UNAIDS, 2009b; World Bank, 2002). Quality education appears to be a valuable tool in transforming environments in which HIV/AIDS thrive and reduce vulnerability as well as behaviours that generate or perpetuate risk (Kelly, 2002; UNAIDS, 2009b). Furthermore, access to learning opportunities through partnerships with local stakeholders (e.g. ministries of education, youth service organisations, community leaders, schools, teachers and parents) may have a constructive impact on communities by reaching individuals not enrolled in formal education (UNAIDS, 2009b; UNESCO, 2008a; Van den Berg, 2008).

To deal effectively with HIV/AIDS the education sector should facilitate pro-active (e.g. prevention programmes) and re-active (e.g. curative action) strategies (Donald, Lazarus *et al.*, 2006; Kelly, 2000; Van den Berg, 2008). To fulfil a crucial role in addressing the HIV/AIDS epidemic the education sector should prevent the spread of HIV/AIDS by adopting a comprehensive education sector approach that informs decision-making and action with evidence. Social support needs to be presented in collaboration with key stakeholders by providing basic care and assistance to learners and teachers (affected by or infected with HIV/AIDS) in and out of school. The education sector could further enhance HIV/AIDS awareness and strengthen response capacity by mainstreaming HIV/AIDS into the education

system. Awareness-raising could include capacity-building and organisational strengthening of, for example, ministries and teacher training institutions. In addition, the education sector should ensure accessible, sustainable, inclusive and quality education by supplying expected services in relation to the epidemic and all other areas (Beckmann & Prinsloo, 2007; Coombe, 2003a; Coombe, 2003b; Kelly, 2002; UNAIDS, 2009b; UNESCO, 2008a). Barriers to the implementation of HIV/AIDS education (for example, possible inadequate awareness, stigma, discrimination and denial) as well as resistance on the part of communities may hamper educational efforts (UNAIDS, 2009b). Stigma, discrimination and denial pertaining to HIV/AIDS and education are discussed next.

2.2.2 STIGMA, DISCRIMINATION AND DENIAL

Stigma⁵ is inextricably linked to HIV/AIDS and being HIV positive is generally considered to be a powerful label to bear in institutions, communities and society (Bacus, 2008; Eba, 2007; Jansen, 2007). Stigma harms those labelled at the core of their humanness, since it defines them as being different from others (process of ‘otherisation’) (Beckmann & Prinsloo, 2007; Eba, 2007; Petros, Airhihenbuwa, Simbayi, Ramlagan & Brown, 2006). Addressing HIV/AIDS effectively is laden through stigma as it exaggerates difference into irrational fear of the ‘other’, leading to public resistance and the unwillingness to be tested, treated or to take preventative steps (Bacus, 2008; Beckmann & Prinsloo, 2007; Jansen, 2007). Fears in terms of discrimination and disclosure may be a consequence of HIV-related stigma (Eba, 2007; Ferreira & Ebersöhn, 2011). Rampant stigmatisation and discrimination could invigorate HIV/AIDS by negating educational prevention and care efforts through silence and denial (Eba, 2007; UNAIDS in Bacus, 2008, p. 34).

The difficulties in communicating information on HIV/AIDS appear to be affected by perceived parental disapproval, religious barriers as well as cultural and social assumptions (Bacus, 2008; UNAIDS, 2009b). The silence within society to accept the reality of HIV/AIDS has negative consequences, including perpetuation of stigma and discrimination towards HIV positive individuals (Bacus, 2008; Jansen, 2007). Silence constrains warnings of death and disease giving way to myth, misconceptions, superstition and denial as well as marginalising those infected with or affected by HIV/AIDS, inadvertently condoning destructive behaviour (Jansen, 2007; UNAIDS in Bacus, 2008, p. 34; Zhang, Li, Mao, Stanton, Zhao, Wang &

⁵ ‘A negative label or perception resulting in social isolation and victimisation’ (Donald, Lazarus *et al.*, 2006, p. 21).

Mathur, 2008). Denial is a direct result of stigma linked to HIV/AIDS. By distancing themselves from the disease, it seems there is still reluctance in certain communities to acknowledge the existence of HIV/AIDS on a personal level (Bacus, 2008; De Kock & Wills, 2007). Denying that a problem exists can make it difficult to find a solution (Van Wyngaard, 2004). Beckmann and Prinsloo (2007) argue that the epidemic affects everyone since it has vast social and economic ramifications. Claiming therefore, that HIV/AIDS is ‘not my problem’ will only reinforce stigmatisation with dramatic consequences on individuals and public health efforts (Beckmann & Prinsloo, 2007; Eba, 2007). As stigma and discrimination are more likely to thrive in an environment of ignorance, fear and insufficient knowledge, HIV/AIDS education can be useful in addressing such stigma and discrimination (Eba, 2007; Theron, 2005; UNESCO, 2008a).

Education efforts should entail a holistic, comprehensive framework for action, including psychosocial⁶ support, and communicate tailored HIV/AIDS messages to address the needs of individuals and communities (Bacus, 2008; Eba, 2007; Ebersöhn, Eloff & Swanepoel-Opper; Melkote, Muppidi & Goswani, 2000). Key stakeholders should be involved in order to review societal and cultural values which may increase vulnerability, stigma and discrimination (Beckmann & Prinsloo, 2007; Pengpid, Peltzer & Igumbor, 2008; UNAIDS, 2009b; UNESCO, 2008a).

2.2.3 CULTURAL AND SOCIALISED BELIEFS

South Africa is a diverse society indicating the need to consider the socio-cultural context within which HIV/AIDS is spreading (Haldenwang *et al.*, 2009; Louw, 2004; Marcus, 2002). Although HIV/AIDS affects all race groups in South Africa (Human Sciences Research Council, 2002), the conceptualisation of HIV/AIDS appears to be interconnected with entrenched understanding of ‘who gets it’, ‘where it comes from’ and ‘why it persists’ (Jansen, 2007, p. 58). Culture and race may therefore be key variables in shaping attitudes towards HIV/AIDS discourses (Jansen, 2007). A genuine comprehension of HIV/AIDS needs to be enhanced in order to address racist cultural stereotypes (Bacus, 2008; Beckmann & Prinsloo, 2007; De Kock & Wills, 2007; Jansen, 2007; Marcus, 2002). Theron (2005) detected, in her study, that white teachers had voiced more prejudiced responses in comparison with black teachers. Behaviours attributed to certain race groups, misperceptions

⁶ ‘*Psychosocial support refers to actions that target vulnerable individuals as to enable well-being*’ (Ebersöhn & Ferreira, forthcoming, p. 3).

as well as the ‘blaming and shaming’ surrounding HIV/AIDS may amplify racist cultural stereotypes and create a false sense of security or disengagement from HIV/AIDS (Jansen, 2007; Marcus, 2002; Nduna & Mendes, 2010; Petros *et al.*, 2006; Theron, 2005). A shared private understanding, within different cultural groups, may add to denial, discrimination and stigmatisation based on religious beliefs, cultural stereotypes, misinformation as well as ignorance of HIV/AIDS which can be detrimental in addressing the epidemic (Bacus, 2008; Eba, 2007; De Kock & Wills, 2007; Jansen, 2007; Petros *et al.*, 2006).

The education sector and teachers may challenge norms towards HIV/AIDS and play an influential role in changing individual and community mindsets. Teachers themselves however are shaped by their culture and may be constrained by ingrained beliefs as well as social and cultural forces to question prevailing norms (Wood, 2008; Wood, 2009b). The importance of cultural and social context when implementing HIV/AIDS programmes cannot be underestimated. Programmes that are sensitive to social as well as cultural values may be more successful in addressing the threat of the HIV/AIDS epidemic (Ahmed, Flisher, Mathews, Mukoma & Jansen, 2009; Mporfu, Lawrence, Ngoma, Siziya & Malungo, 2008; Walcott, Meyers & Landau, 2008; Wood, 2008) and establish a common language of acceptance (Theron, 2005). The next section explores HIV/AIDS education and teacher training.

2.3 HIV/AIDS EDUCATION AND TEACHER TRAINING

In South Africa the teaching profession is the largest occupational group, signifying teachers as indispensable assets to address HIV/AIDS challenges and provide psychosocial support for learners as well as communities (DBE, 2010; DoE, 2007b; Ebersöhn & Ferreira, forthcoming; Ferreira & Ebersöhn, 2011; UNAIDS, 2009b; UNESCO, 2008a). Initial Teacher Education (ITE) qualifications need to ensure personal, professional and academic development of teachers to develop a confident, capable and continually learning community of teachers (DoE, 2007b; DHET, 2010). Quality training, including education on sexuality, reproductive health and HIV/AIDS requires a meaningful investment in teachers’ professional development (DBE, 2010; DoE, 2007b; UNAIDS, 2009b). The following section considers the various roles teachers need to fulfil with regard to HIV/AIDS.

2.3.1 THE ROLE OF TEACHERS WITH REGARD TO HIV/AIDS

Teachers must support learners with diverse learning styles and needs in an inclusive education system (DoE, 2001; DoE, 2007b; Donald, Lazarus *et al.*, 2006). Seven interrelated roles for competent teachers were depicted by *The Norms and Standards for Educators* (DoE, 2000) and retained by *The Draft Policy on the Minimum Requirements for Teacher Education Qualifications selected from the Higher Education Qualifications Framework* (DHET, 2010). Teachers (as collective) can represent roles in a school (DHET, 2010). These roles indicate that a teacher should be a specialist in a particular learning area, subject or phase; specialist in teaching and learning; specialist in assessment; curriculum developer; leader, administrator and manager; scholar and lifelong learner as well as a professional who plays a community, citizenship and pastoral role (DoE, 2000; DHET, 2010). The need has developed for teachers to be multi-skilled in order to fulfil the role as teacher and respond to increasingly complex needs of learners and communities (Coombe, 2003b; Loots & Mnguni, 2007; Van den Berg, 2008). The roles allocated to teachers have become even more crucial in the face of social challenges such as the HIV/AIDS epidemic (DoE, 1999; Ferreira & Ebersöhn, 2011; UNESCO, 2008a). Teachers may be one of the first barricades against the epidemic as drivers of quality education and should therefore respond effectively to HIV/AIDS challenges to sustain teaching and learning (DoE, 2007b; Kelly, 2002; Van den Berg, 2008; Wood & Hillman, 2008). In addition, educational efforts should entail more than academic achievement since success can be obtained only if learners feel cared for and learn to care for others (Nodding, 2010).

One of the critical dimensions of teachers' community, citizenship and pastoral role is HIV/AIDS education (DHET, 2010). However, questions have arisen whether teachers possess the necessary array of skills, competencies and confidence to fulfil the roles allocated to them, particularly the policy-prescribed pastoral role, in the face of HIV/AIDS (DHET, 2010; Ferreira & Ebersöhn, 2011; Loots & Mnguni, 2007). Teachers may take on the role of counsellor, but are not necessarily trained in this regard (Donald, Lazarus *et al.*, 2006; Ferreira & Ebersöhn, 2011). Ferreira, Ebersöhn and McCallaghan (2010) experienced at the onset of their research that teachers understood the theoretical nature of the pastoral role but found practical application of knowledge difficult. Crewe (in Jansen, 2007, p. 5) points out that the responsibility of teachers (i.e. whether teachers can or should be expected to be involved in HIV/AIDS) has not been extensively discussed.

In addition, quality assurance of teacher training is a concern as teachers seemingly lack preparation to teach in the field of HIV/AIDS, reproductive health as well as psychosocial life-skills and may receive little training concerning professional as well as ethical conduct concerning HIV/AIDS (Kelly, 2000; Khan & Saeed, 2010; Njue, Nzioka, Ahlberg, Pertet & Voeten, 2009; Sileo, Sileo & Pierce, 2008). Effective dealing with HIV/AIDS in the education system therefore relates to the re-conceptualisation of teacher preparation (Crewe in Jansen, 2007, p. 6). Teacher training institutions should consequently improve HIV/AIDS education quality in addition to teaching sexuality and life skills in a sensitive and effective way to provide teachers with the knowledge and skills needed for their changing roles (DoE, 2007a; Mugimu & Nabadda, 2009). Reviewing teacher training aims to ensure that teachers model positive acceptance and are prepared to meet the challenges presented by HIV/AIDS (Theron, 2005; UNAIDS, 2009b).

2.3.2 ENABLING TEACHERS TO ADDRESS HIV/AIDS CHALLENGES

HEI and teacher education programmes may not be providing sufficient training to enable teachers to fulfil the aforementioned specialist roles competently (DHET, 2010; Loots & Mnguni, 2007). Teachers who are naturally inclined to provide support may act from a desire to help, irrespective of training or required policy implementation (Ferreira & Ebersöhn, 2011; Wood & Hillman, 2008). However, teachers may feel inadequately equipped, with a lack of self-efficacy, to make a real difference and properly implement HIV/AIDS curricula (McGinty & Mundy, 2009; Wood & Hillman, 2008).

Research studies (Ahmed, Flisher, Mathews, Jansen, Mukoma & Schaalma, 2006; Ahmed *et al.*, 2009; Bhana, 2008; Njue *et al.*, 2009; Ongunya, Indoshi & Agak, 2009; Van den Berg, 2008; Wood & Hillman, 2008) indicate that teachers may experience discomfort with sex education in the context of HIV/AIDS, struggle with the transfer of sexual reproductive knowledge and find the sensitive nature of these topics personally challenging. Certain aspects may impede teachers from providing effective HIV/AIDS education and hinder the inclusion of HIV/AIDS education in the classroom. Two of the most significant barriers involve limited training opportunities (Bacus, 2008; Mathews, Boon, Flisher & Schaalma, 2006; Njue *et al.*, 2009; Ongunya *et al.*, 2009; Plummer, Wight, Wamoyi, Nyalali, Ingal, Mshana, Shigong, Obasi & Ross, 2007; Van den Berg, 2008; Webb & Gripper, 2010) and insufficient support (Chen, Dunne & Zhao, 2004; DHET, 2010; Njue *et al.*, 2009; Webb & Gripper, 2010) for teachers to provide effective HIV/AIDS education.

Furthermore, it appears that teachers are inadequately prepared to employ interactive and participatory teaching methods leading to inexperience in and resistance to participatory strategies (Mukoma, Flisher, Ahmed, Jansen, Mathews, Klepp & Schaalma, 2009; Njue *et al.*, 2009; Plummer, Wight, Obasi, Wamoyi, Mshana, Todd, Mazige, Mokokha, Hayes & Ross, 2007). Limited access to or inadequate HIV/AIDS learning and teaching materials may also hinder teachers' effectiveness when attempting to address HIV/AIDS issues (Bacus, 2008; Mufune, 2008; Plummer, Wight, Wamoyi *et al.*, 2007; Visser, 2005). Teachers' personal convictions, preferences and beliefs can further hamper HIV/AIDS and sex education if information is perceived as contradictory to cultural values and beliefs (Ahmed, Flisher, Mathews, Mukoma & Jansen, 2009; Helleve, Flisher, Onya, Mukoma & Klepp, 2009; Van den Berg, 2008; Wood, 2009b). Moreover, reluctance to HIV/AIDS education as well as lack of commitment and self-efficacy may obstruct implementation of HIV/AIDS education (Bacus, 2008; McGinty & Mundy, 2009; Visser, 2005). Finally, resistance, stigma, discrimination and suspicion on the part of communities and parents may amplify the barriers teachers experience in implementing HIV/AIDS education (Bacus, 2008; Mufune, 2008).

Studies (Chen *et al.*, 2004; Dawson *et al.*, 2001) indicate that previous sex education and HIV/AIDS training seemed to improve teachers factual knowledge base and establish a more positive and supportive attitude concerning HIV/AIDS. Research conducted by Ferreira and Ebersöhn (2011) showed that training encouraged teachers to initiate and sustain acts of psychosocial support in school communities. Previous training further appears to be a significant determinant of teachers incorporating (Mathews *et al.*, 2006) and providing comprehensive HIV/AIDS education with fidelity, enhanced self-efficacy and confidence (Chen *et al.*, 2004; Helleve, Flisher, Onya, Kaaya, Mukoma, Swai & Klepp, 2009; Lindau, Tetteh, Kasza & Gilliam, 2008; Mathews *et al.*, 2006; Mukoma *et al.*, 2009; Theron, 2008a).

From the above literature and research studies, it appears that teachers should be sufficiently prepared for their role in HIV/AIDS education. Mugimu and Nabadda (2009) are of the opinion that the success of HIV/AIDS education depends on the quality and relevance of teacher training being offered. Therefore, it seems imperative that pre- and in-service teacher training equip teachers with HIV/AIDS education, resources and skills as well as on how to instruct topics such as sexuality, drugs and health issues (Griesel-Roux, 2005; Kelly, 2000; Ongunya *et al.*, 2009; UNAIDS, 2009b; UNESCO, 2008a; UNESCO, 2008b). Numerous studies (Ahmed *et al.*, 2006; Dawson *et al.*, 2001; Griesel-Roux, 2005; Mathews *et al.*, 2006; Mufune, 2008; Mugimu & Nabadda, 2009; Nsubuga & Bonnet, 2009; Ongunya *et al.*, 2009;

Plummer, Wight, Wamoyi *et al.*, 2007) confirm the need for and the value of improved HIV/AIDS education in teacher training programmes.

To overcome abovementioned barriers it seems that teacher training programmes should incorporate and emphasise certain aspects to enable teachers' competence regarding HIV/AIDS. Teacher training should offer authentic experiences, training teachers what to do (raise competence) and how to do it well in diverse contexts (Pajares & Schune in Webb & Gripper, 2010, p. 29). Methods for enhancing teachers instructional efficacy (personal beliefs relating to teacher's capabilities to help learners learn) through the integration of efficacy-building sources (e.g. actual performance and vicarious experiences) should be developed (Schunk, 2008). By strengthening teachers' confidence levels the implementation of HIV/AIDS education may be improved (Helleve, Flisher, Onya, Kaaya, *et al.*, 2009; Njue *et al.*, 2009).

In addition, it would be beneficial to provide teachers with high quality resources and teacher manuals containing detailed information and instructions concerning HIV/AIDS lessons and activities adapted for different school levels (Carl, 2002; Kelly, 2000; Mukoma *et al.*, 2009; UNESCO, 2008b). Teachers need to be effectively trained to employ alternative, interactive and participatory teaching and learning methods (Ahmed *et al.*, 2006; Kinsman, Nakiyingi, Kamili, Carpenter, Quigley, Pool & Whitworth, 2001; Njue *et al.*, 2009; UNAIDS, 2009b; UNESCO, 2008b) to teach HIV/AIDS effectively and address HIV/AIDS fatigue (De Lange & Stuart, 2008).

Teacher training should furthermore include preparation and practical opportunities to promote safety; make appropriate referrals to psychosocial, health, protection and other services as well as support teachers in identifying signs of risk (such as harmful drug use) and learners in need (UNAIDS, 2009b). Adequate provision for content such as sociology and economics; life-skills pedagogy; ethical practices; child and adolescent psychology (including counselling skills) as well as improvement of communication skills with regard to HIV/AIDS should be made (Ferreira & Ebersöhn, 2011; Ongunya *et al.*, 2009; Sefhedi, Montsi & Mpofo, 2008; Sileo *et al.*, 2008; UNESCO, 2008b; Wood & Hillman, 2008). Expert guidance through the support of dedicated HIV/AIDS lecturers and supervisors at teacher training institutions, should form an integral part of teacher training (Chen *et al.*, 2004; Coombe, 2003b; Griesel-Roux, 2005; Kelly, 2002; Plummer, Wight, Wamoyi *et al.*, 2007; UNAIDS, 2009b).

Furthermore, self-awareness needs to be part of teacher training. Values, beliefs, assumptions and attitudes concerning HIV/AIDS may influence what teachers teach, necessitating the examination of perceptions (Wood, 2008). Teachers often have fixed ideas and beliefs about the roles they see themselves fulfilling in the teaching profession (Hattingh & De Kock, 2008). Teachers may therefore require help in internalising and changing their own behaviour in respect of both HIV/AIDS and in teaching HIV/AIDS curricula (Coombe, 2003b). Teachers may embrace or reject learning opportunities due to their current sense of self (Handley, Sturdy, Fincham & Clark, 2006). Incorporating value clarification modules in teacher training may enable teachers to address their own concerns and create a broader understanding of social and cultural complexities of the epidemic (UNAIDS, 2009b; Wood & Webb, 2008).

Lastly, research (Ferreira & Ebersöhn, 2011; Ferreira, Ebersöhn & Odendaal, 2010) suggests that although teachers seem willing to fulfil the pastoral role and support communities to address HIV/AIDS challenges, they do not feel adequately equipped to do so. Effective strength-based training may encourage teachers to initiate and sustain support efforts. Positive approaches identify and support for example protective factors, resilience, sustainability and intrinsic initiatives. Assets are used to address challenges in various contexts and are based on the belief that all learners and communities can make contributions towards positive change through their own capacities, skills and resources (Donald *et al.*, 2002; Ebersöhn & Eloff, 2003). Teacher training should therefore enable teachers to establish relationships as well as support networks with parents, communities and other stakeholders concerning HIV/AIDS treatment, care and support to promote resilience in schools and communities (Ebersöhn & Ferreira, forthcoming; Theron, 2008b; UNAIDS, 2009b). Positive psychology frameworks and asset-focused strategies therefore seem to be a suitable manner for psychosocial capacity and resilience building for learners, teachers and communities (Ebersöhn *et al.*, 2010; Ebersöhn & Ferreira, forthcoming; Ferreira & Ebersöhn, 2011; Ferreira, Ebersöhn & McCallaghan, 2010; Ferreira, Ebersöhn & Odendaal, 2010).

A holistic and critical approach to HIV/AIDS training, highlighting the value of interventions that transcend a sexual health agenda may enable teachers to move beyond traditional responsibilities and play an important role as agents of change in schools and communities (Mathews *et al.*, 2006; Wood, 2009a). Although adequate initial teacher training is crucial, continuous development and support for teachers, as discussed in the next section, are also essential.

2.3.3 CONTINUOUS PROFESSIONAL DEVELOPMENT AND SUPPORT FOR TEACHERS

Members of a profession maintain their professional standing through a constant relationship ('lifelong learning') with education (DoE, 2006; Haldenwang *et al.*, 2009). The teaching occupation is no exception given that one of the teacher's roles, as promulgated by policies (DoE, 2000; DHET, 2010) is that of scholar, researcher and lifelong learner. Donald, Lazarus, *et al.* (2006) point out that initial teacher training, although essential, is only the beginning of a lifelong journey. Continuing Professional Teacher Development (CPTD) was established to encourage teachers to enhance theoretical subject and pedagogical content knowledge as well as teaching skills and practical work in order to identify and address barriers to learning or to develop new specialisations in order to support teaching and learning (Bhana, 2008; DoE, 2007b; DHET, 2010). HIV/AIDS update training or accredited HIV/AIDS components within CPTD courses should be a priority for teachers to increase their knowledge, comfort, confidence and attitudes in addressing the needs of learners and families (Deutschlander, 2010; UNESCO, 2008b). In HEI the benefits of lifelong learning and continuous professional development for lecturers to increase knowledge, skills, quality of performance and to meet institutional objectives have also been highlighted (Le Grange, Greyling & Kok, 2006).

Furthermore, teachers need continuous professional and intuitional support to deal with socially relevant issues such as HIV/AIDS (UNAIDS, 2009b; UNESCO, 2008b). Development seems to thrive when teachers are integrally involved, reflecting on their own practice as well as when employers provide sustained leadership and support (including a supportive school culture) (DoE, 2007b; Shepherd, Kavanagh, Picot, Cooper, Harden, Barnett-Page, Jones, Clegg, Hartwell, Frampton & Price, 2010). Pre- and in-service teachers should therefore receive supervision, continuous support and mentoring. Linking services and providing support for teachers (e.g. through support networks and sharing resources) seem crucial (Burr, Storm & Gross, 2006; Theron, 2005; UNAIDS, 2009b) in order to address HIV/AIDS challenges effectively.

HIV/AIDS curriculum development appears to be an additional area of concern pertaining to HIV/AIDS. Despite generally high levels of basic awareness about HIV/AIDS, knowledge gaps persist (World Bank, 2002). HIV/AIDS curricula, planning and delivery therefore, require extensive and immediate change to equip participants⁷ and presenters⁸ to deal

⁷ Participants (in the current study) refer to any learner, student or adult partaking in an HIV/AIDS programme.

⁸ Presenters (in the current study) of HIV/AIDS programmes may include school teachers or lecturers in HEI.

effectively with the challenges of HIV/AIDS as well as delivering much needed educational services to communities (Loots & Mnguni, 2007; UNESCO, 2008a; Van den Berg, 2008). HIV/AIDS curriculum development is discussed in the following segment.

2.4 HIV/AIDS CURRICULUM DEVELOPMENT

The role of education in reducing the spread of HIV/AIDS is essentially a matter of curriculum issues (Kelly in Van den Berg, 2008, p. 40). Curriculum change needs to be influenced by a greater degree of realism to make provision for and satisfy the needs of specific groups in order to reflect the vision of what education is in the day of HIV/AIDS (Allemano, 2008; Carl, 2002; Coombe, 2003b). HIV/AIDS curriculum development is a continuous process with interlinked phases including curriculum design, dissemination, implementation and evaluation (Carl, 2002; Geysler, 2004; Richter, Potts, Prince, Dauner, Reininger, Thompson-Robinson, Corwin, Getty & Jones, 2006).

Well-planned and implemented life skills, sexuality, reproductive health and HIV/AIDS curriculums seem to result in an increase of subject knowledge, skill development, improved self-efficacy protection (e.g. efficacy to refuse sex or obtain condoms) as well as positive intentions, attitudes and perceptions required to change behaviours related to HIV transmission (Cheng, Lou, Mueller, Zhao, Yang, Tu & Gao, 2008; Fan, Conner & Villarreal, 2007; Givaudan, Leenen, Van de Vijver, Poortinga & Pick, 2008; James, Reddy, Ruiters, McCauley & Van den Borne, 2006; Li, Stanton, Wang, Mao, Zhang, Qu, Sun & Wang, 2008; Maticka-Tyndale, Wildish & Gichuru, 2007; Smylie, Maticka-Tyndale & Boyd, 2008; Sukati *et al.*, 2010; UNAIDS, 2009b; Visser, 2005; Yankah & Aggleton, 2008). The following sections focus on the design and implementation of HIV/AIDS curriculum. Firstly, some theoretical models on which HIV/AIDS curricula are based are explored.

2.4.1 HIV/AIDS CURRICULUM AND MODELS OF HEALTH BEHAVIOUR

In South Africa, HIV/AIDS programmes are grounded in various theories and models (Dickson-Tetteh & Ladha in Van den Berg, 2008, p. 48; Fan *et al.*, 2007; Melkote *et al.*, 2000; Page, 2004). Different emphasis is placed on various issues by each theoretical school of thought. However, many theories may lack an adequate framework when applied to an African context (Airhihenbuwa & De Witt Webster, 2004; Melkote *et al.*, 2000). HIV/AIDS interventions based on biomedical models or rational cognitive theories are mainly directed towards treatment and results entrenched in isolated disciplines, but do not consider socio-

cultural beliefs (including gender and race), socio-economic context, political variables, self-efficacy, power in sexual relations or the social reality and emotional ramifications of stigma (Beckmann & Prinsloo, 2007; Bennet & Reddy, 2009; Jansen, 2007; Marcus, 2002; Melkote *et al.*, 2000; Van den Berg, 2008).

Concerns have also been raised about the generalising of assumptions of risk and the lack of diversity in HIV/AIDS prevention programmes (HSRC, 2002). Programmes driven by mass media interventions (such as loveLife) seldom incorporate differences in language, culture and socio-economic contexts which may result in marginalisation of minorities or homogenising of the target audiences (HSRC, 2002; Van den Berg, 2008). Meaningful HIV/AIDS education programmes should draw on the whole ecosystem (including the individual, interpersonal processes, cultural context, socio-economic impact and the media that shape human behaviour) to deal thoroughly with issues in society (e.g. substance abuse, moral degeneration, traditional myths and customs) that support the spread of the epidemic (Bacus, 2008; Beckmann & Prinsloo, 2007; Jansen, 2007; Marcus, 2002; Melkote *et al.*, 2000; UNAIDS, 2009b). Combination prevention programmes advocate the coincident application of diverse behavioural, biomedical as well as structural HIV/AIDS prevention and treatment actions to effectively address the sources of the epidemic in synergy (DBE, 2010; UNAIDS, 2009b; UNAIDS, 2010). Programmes should be relevant to counteract HIV/AIDS fatigue and ensure efforts address issues important to individuals and communities (UNAIDS, 2009b). Participants must be involved in planning, implementation and evaluation of HIV/AIDS curricula to promote effectiveness (UNAIDS, 2009b). The following section focuses on the design of an HIV/AIDS curriculum, programme or module.

2.4.2 CURRICULUM DESIGN

The curriculum design phase is a holistic, flexible process that encompasses various dynamic interactive components (Carl, 2002; Geysers, 2004; Toohey, 1999). Norris, Mbokazi, Rorke, Goa and Mitchell (2007) express the opinion that ‘one size does not fit all’ when planning an HIV/AIDS programme. An effective HIV/AIDS curriculum design should be adjusted to cover the entire discourse spectrum (disease to desire) and incorporate how participants experience programmes in order to have a clear understanding of what participants need and respond to (Francis, 2010; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; Shepherd *et al.*, 2010; Van Dyk, 2008). Furthermore, curriculum design should consider cultural, social, economic and political factors that affect the spread of the epidemic, the context of a country

(e.g. differences between rural and urban areas), language as well as the developmental level and population characteristics of participants (Carl, 2002; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; Marcus, 2002; Melkote *et al.*, 2000; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; Wood, 2008).

The content of an HIV/AIDS curriculum should be based on relevant knowledge informed by theoretical approaches and empirical evidence of what works (Jansen, 2007; Ntombela, Stilwell & Leach, 2008; Toohey, 1999; UNAIDS, 2009b). Although it is implausible that the needs of all participants will be met by using a single curriculum (Walcott *et al.*, 2007), it appears that HIV/AIDS programme content should extend to numerous factors. At the outset, scientifically accurate information and knowledge such as HIV/AIDS aetiology; sexually transmitted infections; pregnancy and mother-to-child transmissions; reproductive health and sexuality; modes of transmission; HIV/AIDS effects on the body; the process of progression, symptoms, lack of cure, treatment options as well as cultural practices and social stereotypes can be incorporated (Bacus, 2008; Griesel-Roux, 2005; Jansen, 2007; Kelly, 2002; Marcus, 2002; Mpofo *et al.*, 2008; UNAIDS, 2009b).

Following upon accurate information, content should emphasise psychosocial life skills and behavioural competency skills such as decision-making proficiency; critical thinking; interpersonal relationships; negotiation, conflict resolution; communication; self-awareness; stress and anxiety management; coping with pressures (e.g. peer pressure); assertiveness as well as self-esteem and self-confidence (Bacus, 2008; Buthelezi, Mitchell, Moletsane, De Lange, Taylor & Stuart, 2007; Kelly, 2002; King in Page, 2004, p. 23; Mpofo *et al.*, 2008; Popham & Hall in Page, 2004, p. 23; UNAIDS, 2009b; Van den Berg, 2008; Yankah & Aggleton, 2008). The curriculum may also adopt a human rights and citizenship perspective dealing with respect and regard for others as well as tolerance and peace to foster inclusive models of belonging to combat stigma and discrimination (Fields & Hirschman, 2007; Kelly, 2002; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; UNAIDS, 2010).

Sexuality, relationships and responsibility content may include gender-equality and power-sharing between males and females; fidelity in marriage and management of the marriage relationship if HIV/AIDS is present to ensure a better understanding of sexuality, its role in relationships as well as the norms for healthy sexuality (Kelly, 2002; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; UNAIDS, 2010; UNESCO, 2008a). In addition, the desirability and responsibility of voluntary HIV/AIDS counselling and testing should be emphasised (Bacus,

2008; Kelly, 2002). Lastly, content can include the meaning of a healthy lifestyle in reducing susceptibility to HIV-infection (e.g. value of abstinence, limiting the number of sexual partners) as well as promoting the quality of life and extended survival years of HIV-infected individuals through treatment, care, support and counselling (Eba, 2007; Griesel-Roux, 2005; Kelly, 2002; Mpofu *et al.*, 2008).

Although HIV/AIDS content is essential, it can be too general or technical. Content should be simplified (Fan *et al.*, 2007; Plummer, Wight, Wamoyi *et al.*, 2007) and provide deep, meaningful learning opportunities focusing on personal understanding where new ideas are linked to previous knowledge and experiences (Geyser, 2004; Toohey, 1999; UNAIDS, 2009b). Implementation of the appropriate teaching methods is therefore essential. Different instructing strategies (Cawood *et al.* in Carl, 2002, p. 125) can be utilised when content is delivered, however static transmission of knowledge seems to be an ineffective pedagogical model in the context of HIV/AIDS (Jansen, 2007). If the focus is on ‘transfer’ of content through facts, principles, concepts and theories the opportunity for meaningful investigation may be sacrificed for coverage resulting in surface learning (Geyser, 2004; Toohey, 1999). HIV/AIDS education should engage participants through discussion of personal meaning to inspire application of knowledge into action (Jansen, 2007; Kelly, 2002). The following section examines HIV/AIDS curriculum implementation.

2.4.3 CURRICULUM IMPLEMENTATION

Curriculum implementation is the specific phase during which the relevant HIV/AIDS design is applied in practice (Carl, 2002). The manner in which participants are taught and the positioning of their knowledge is as important as the content (Francis, 2010; Jansen, 2010). Curriculum implementation and presentation should therefore be interesting and emotionally engaging to enhance learning appeal and the value of formal HIV/AIDS content (Bacus, 2008; Fan *et al.*, 2007; Francis, 2010; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; Marcus, 2002; Shepherd *et al.*, 2010; Sukati *et al.*, 2010). Sukati, *et al.* (2010) revealed that participants criticised the excessive use of lecture methods in an HIV/AIDS course. Consequently, the implementation of alternative, interactive and participatory teaching methods seems essential to explore values and attitudes as well as gain new skills and knowledge (Plummer, Wight, Wamoyi *et al.*, 2007; UNAIDS, 2009b). Different modes of deliverance such as visual-image and arts-based strategies (e.g. photovoice, video and film education); media campaigns; drama, theatre and music in small group sessions may be

employed (Bacus, 2008; Buthelezi *et al.*, 2007; De Lange, Mitchell, Moletsane, Stuart & Buthelezi, 2006; De Lange & Stuart, 2008; Griesel-Roux *et al.*, 2005; Jansen, 2007; King in Page, 2004, p. 23; McLean & Hiles, 2005; Njue *et al.*, 2009; Sukati *et al.*, 2010; Toohey, 1999; Torabi, Crowe, Rhine, Daniels & Jeng, 2000).

Furthermore, personal experiences, real-life encounters (e.g. personal contact with HIV-positive individuals) and visits to relevant places should be encouraged to elicit consequences, provide opportunities to personalise information and experience another person's position vicariously (Eba, 2007; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; King in Page, 2004, p. 23; Marcus, 2002; Sukati *et al.*, 2010; Toohey, 1999). Staff from health clinics, local HIV/AIDS experts or other professional external community service providers can be utilised as resource or to cover activities that may be difficult to address (Burr *et al.*, 2006; Smylie *et al.*, 2008; UNAIDS, 2009b). Modelling and practice of skills (e.g. communication skills) to increase self-efficacy can also be effective (Buthelezi *et al.*, 2007; King in Page, 2004, p. 23). By applying participatory and modelling strategies engagement with real-life issues may take place (De Lange & Stuart, 2008).

Interaction and involvement where participants take the lead (e.g. peer education and peer support groups) (Bacus, 2008; Griesel-Roux *et al.*, 2005; Ongunya *et al.*, 2009; Smylie *et al.*, 2008; UNAIDS, 2009b; World Bank, 2002) can be a useful strategy. However, teacher-led interventions are more cost-effective due to the infrequent need for training (Shepherd *et al.*, 2010). Open and frank channels of communication with clear and consistent messages may effectively convey HIV/AIDS prevention messages. To ensure that discussions are not reduced to abstract talk about sex and biological functions, honest and respectful discussions should take place (Buseh, Glass & McElmurray in Bacus, 2008, p. 63; Kelly, 2002; UNAIDS, 2009b). Furthermore, active involvement, recruitment and partnerships with communities, NGOs, businesses, churches, the health sector and voluntary organisations (Griesel-Roux, 2005; Kelly, 2002; UNESCO, 2008a) are needed. Establishing linkages with critical support services working at community level, are essential so that participants can access or be referred to prevention and care services (HSRC, 2002; Kelly, 2002; UNAIDS, 2009b). Considerable exposure and positive relationships through the active engagement of communities may ensure reinforcement of information, promote resilience and address possible resistance to HIV/AIDS curricula implementation (Allemano, 2008; Ebersöhn & Ferreira, forthcoming; McLean & Hiles, 2005; UNAIDS, 2009b).

Additional factors that should be considered when HIV/AIDS subject matter is implemented concern the duration and timing, class size as well as possible placement within a curriculum. Ample implementation time of HIV/AIDS programmes is a necessity, since a lack of time may cause inconsistent implementation as well as superficial coverage of content and activities (Kinsman *et al.*, 2001; Njue *et al.*, 2009; UNAIDS, 2009b; Van den Berg, 2008). Large class sizes may further hinder participants' enthusiasm (Mukoma *et al.*, 2009). The most appropriate time to implement HIV/AIDS curriculum (adapted for the developmental level) seems to be during the early years of schooling before learners are sexually active or have dropped out of school (Bhana, 2007; Kelly, 2002; UNAIDS, 2009b; World Bank, 2002). However, Bhana (2008) points out that childhood innocence discourses, embedded within varying social contexts, can make it difficult for teachers to provide sexuality and HIV/AIDS knowledge in primary schools. Chen *et al.*, (2004) revealed in their study that the implementation of HIV/AIDS programmes in universities and secondary schools was deemed acceptable, but the appropriateness for primary schools was questioned. Nonetheless, UNAIDS (2009b) emphasise that sexuality-related content will not encourage young learners to become sexually active, increase the frequency of intercourse or the number of sexual partners. Ongunya, *et al.* (2009) argue that HIV/AIDS programmes should be made lifelong (from childhood to adulthood) with Nsubuga and Bonnet (2009) supporting this view, advocating for HIV/AIDS education at various stages of development. In HEI it is recommended that pedagogies of sexuality are introduced at all levels, especially to first-year students as part of the undergraduate curriculum (Bennet & Reddy, 2009; Bezuidenhout & Summers, 2009; Sukati *et al.*, 2010).

Kelly (2000) identified three options relating to the implementation of HIV/AIDS within a curriculum each with advantages and limitations. The three approaches include a separate subject approach (freestanding separate subject), carrier subject approach (HIV/AIDS becomes an integral part of an existing subject) and an integration approach (HIV/AIDS are integrated into all subject areas). In South Africa national policies (DoE, 2002; DoE, 2003), with special reference to the Life Orientation (LO)⁹ learning area, require the incorporation of HIV/AIDS into the school curriculum (Francis, 2010; Jansen, 2007). However, with a general disregard among learners and in a crowded curriculum, HIV/AIDS education may receive little attention if it is not integrated within all school activities and subjects (Mukoma *et al.*, 2009; Van den Berg, 2008; Van Laren, 2007; Webb & Gripper, 2010).

⁹ LO is an interdisciplinary, holistic subject that draws on integrated knowledge, values, skills and processes from various disciplines to prepare learners for life (DoE, 2002, p. 4; DoE, 2003, p. 9; DHET, 2010, p. 29).

Furthermore, there appear to be varied opinions on the place of HIV/AIDS in school curriculum, especially in subjects other than Life Orientation (Van Laren, 2007). Numerous scholars indicate that a standardised life-skills education curriculum, based on national guidelines, should be a regular part of the curriculum (Burr *et al.*, 2006; Griesel-Roux *et al.*, 2005; Kelly, 2002; Kinsman *et al.*, 2001). World Bank (2002) states that where curriculum is already overloaded, integrating new themes into existing subjects may be more effective than adding additional subjects. UNAIDS (2009b) argues that to maximise the impact, HIV/AIDS curricula should be included in compulsory subjects to reinforce and ensure sufficient attention to HIV/AIDS, sexuality and reproductive health. On the other hand, Ongunya, *et al.* (2009) recommend that HIV/AIDS programmes should be taught as a separate field to allow for sufficient review of information. Nonetheless, it appears that for effective HIV/AIDS education, HIV/AIDS curricula should be an integral part of overall educational priorities and not viewed as an optional or isolated issue (Kelly, 2002; UNAIDS, 2009b).

2.5 THEORETICAL PERSPECTIVE

To gain insight into students' reality construction I embraced Social Cognitive Theory (Bandura, 1986) as theoretical framework. Following the line of current literature and based on the nature of the current study as well as the research questions, I explored student experiences through Social Cognitive Theoretical lenses as the theory seemed well suited to explain human personal development, human learning and adaptation as well as change in different cultural milieus (Bandura, 2002). In this regard, students participating in the HIV/AIDS TEPP entered the programme with experiences, concepts and values derived from a unique history, background, gender, class and race as determinative factors influencing and developing their unique views.

Bandura (1986) developed Social Cognitive Theory which underlines the notion that human learning, to a great extent, occurs in a social context where individuals are actively contributing to their development within a system of triadic reciprocal causation (Bandura, 1989b; Schunk, 1991). Human nature is characterised by immense potential, shaped by direct and vicarious experiences in a variety of forms, within biological limits (Bandura, 2002; Bigge & Shermis, 1999; Schunk, 1991). Furthermore, past experiences are utilised to evaluate, direct and inform new experiences (Bandura, 2002). Individuals can consequently select, influence and construct their own circumstances (Bandura, 1989a). The following sections elaborate on the basic assumptions of Social Cognitive Theory.

2.5.1 SOCIAL COGNITIVE THEORY: BASIC ASSUMPTIONS ABOUT LEARNING AND BEHAVIOUR

Social Cognitive Theory encompasses several assumptions about learning and performance of behaviours. The first assumption concentrates on the dynamic model of causation involving triadic reciprocal interacting determinants. The interrelationship between environmental factors, interdependent behaviours and personal factors continuously influence one another bio-directionally as demonstrated in Figure 2.2 (Bandura, 1989a; Bandura, 1989b; Bigge & Shermis, 1999; Schunk, 1991). The environment affects and shapes the individual in important ways, but the individual also affects the environment by selecting and shaping the environment (Bigge & Shermis, 1999; Lefrancois, 1997). Individuals are thus agents influencing themselves and their environment by contributing to their own motivation, behaviour and development within a network of reciprocally interacting influences (Bandura, 1989a; Bandura, 1989b).

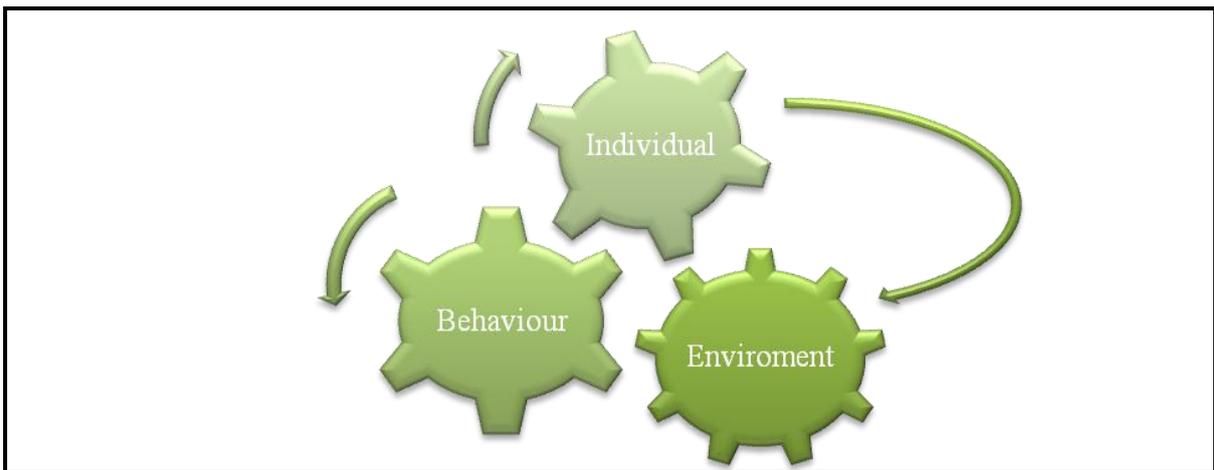


FIGURE 2.2: TRIADIC RECIPROCAL INTERACTION (Adapted from Schunk, 1991)

Another assumption of Social Cognitive Theory posits learning and performance as distinct processes (i.e. distinguishes between new learning and performance of previously learned behaviours) (Schunk, 1991; Schunk, 2008). Even though much learning occurs by doing, a great deal also takes place through observing. Learning is thus viewed as construction of internal representation of behaviour through informative feedback resulting from direct behaviour and observing behaviour in others, and the consequences of both (Bigge & Shermis, 1999). However, factors such as motivation, reinforcement, interest, incentives to perform, perceived need, physical state, social pressures as well as competing activities influence whether what is learned is ever performed (Schunk, 2008).

Social Cognitive Theory further assumes that human learning to a large extent is a function of enactive (through doing or direct experience) and vicarious (observational reinforcing experiences) learning (Bigge & Shermis, 1999; Lefrancois, 1997; Schunk, 2008). The consequences of past behaviour create expectations concerning future behaviour informing the appropriateness of behaviour and motivating individuals. Behaviours that produce successful consequences are retained, those leading to failure are refined or abandoned. Learning complex skills may occur through action and/or observing models (Schunk, 2008). Modelling includes observing or listening to an actual person as stimulus for an observer's response, a symbolic or nonhuman model (e.g. film characters), electronic model (e.g. DVD) or a print model (e.g. books). Although models do not guarantee learning or performance of learned behaviours models (as sources of vicarious learning) may accelerate learning since individuals learn cognitively how to perform tasks and what the consequences or actions may be (Lefrancois, 1997; Schunk, 2008). The following section considers self-efficacy beliefs as viewed in the Social Cognitive Theory.

2.5.2 SOCIAL COGNITIVE THEORY AND SELF-EFFICACY BELIEFS

Bandura (1989b) asserts that self-efficacy operates as an important set of proximal determinants of human motivation, affect and action. Self-efficacy has two related components. The first relates to skills required for successful performance, the second concerns the individual's personal estimation of competence (Bandura, 1989b; Lefrancois, 1997). Self-efficacy therefore refers to an individual's perceptions of his/her capabilities to successfully produce actions or engage in a specific area of behaviour as well have as having a sense of control over events that affect their lives (Betz, 2004; Schreuder & Coetzee, 2008; Schunk, 2008).

Individuals who believe they can exercise control over potential situations are not disturbed by threats and may believe that they will have the power to influence or even control their environment. However, those who believe they cannot manage potential threats may feel anxiety or deem failure as a result of low ability (Bandura, 1989b; Peeler & Jane in Webb & Gripper, 2010, p. 29). Furthermore, self-efficacy beliefs may determine motivation levels, since individuals with a strong belief in their capabilities may exert greater effort in the face of difficulty and persist at a task to master the challenge as active agents in their own motivation (Bandura, 1989b; Bigge & Shermis, 1999; Schunk, 2008).

2.6 THEORETICAL ASSUMPTIONS

Based on the review relating to existing literature and Social Cognitive Theory (Bandura, 1986) as chosen theoretical framework, I approached the current study with certain theoretical assumptions concerning HIV/AIDS and education, HIV/AIDS and teacher training as well as HIV/AIDS curriculum development. Firstly, I assumed that education is crucial for HIV/AIDS prevention efforts (Haldenwang *et al.*, 2009; Hernes, 2002; Kelly, 2002; UNAIDS, 2009b; Van den Berg, 2008) to eradicate issues such as stigma and discrimination (Beckmann & Prinsloo, 2007; UNAIDS, 2009b) and to recognize cultural and socialised beliefs (Bacus, 2008; Beckmann & Prinsloo, 2007; De Kock & Wills, 2007; Jansen, 2007; Marcus, 2002; Wood, 2009b) in which HIV/AIDS may flourish.

Secondly, I assumed that if students are confronted with an HIV/AIDS programme a certain level of resistance, to engage with or learn about HIV/AIDS, may be experienced due to factors such as religious barriers; cultural and social assumptions; personal acknowledgment of the disease and contradiction of personal convictions and values (Ahmed *et al.*, 2009; Bacus, 2008; De Kock & Wills, 2007; UNAIDS 2009b; Van den Berg, 2008). However, I further assumed that an HIV/AIDS programme may increase students HIV/AIDS knowledge, positive attitudes and self-efficacy beliefs (Norr, Norr, Kaponda, Kachingwe & Mbweza, 2007; Schunk, 2008; Shepherd *et al.*, 2010; Webb & Gripper, 2010) resulting in greater confidence and comfort when confronted with HIV/AIDS challenges (Ahmed *et al.*, 2006). Enhanced confidence may further motivate students to become involved in community efforts to support those affected by HIV/AIDS (Webb & Gripper, 2010).

My third theoretical assumption relates to the manner in which students may possibly learn about HIV/AIDS. Students may ascertain knowledge and skills through enactive and vicarious processes, that is students may learn through personal experiences or through observation (Lefrancois, 1997; Schunk, 1991; Schunk, 2008). Learning through observation may include modelling (Lefrancois, 1997; Schunk, 2008) which could possibly enhance motivation and accelerate learning (Schunk, 2008).

Furthermore, I assumed that HIV/AIDS programme presenters play a significant role in effective implementation of HIV/AIDS curricula. A presenter may enhance or hinder the learning process of participants through modelling as well as the instruction methods employed. In this regard, literature indicates that linearly transmission of HIV/AIDS factual

knowledge, without the use of interactive and participatory methods, may constrain the teaching and learning process (Jansen, 2007; Plummer, Wight, Obasi *et al.*, 2007; UNAIDS, 2009b).

Guided by Social Cognitive Theory (Bandura, 1986), my other theoretical assumption concern self-efficacy beliefs. A lack of self-efficacy may hamper teachers' efficiency, thereby negatively influencing the implementation of an HIV/AIDS programme (McGinty & Mundy, 2009; Wood & Hillman, 2008). As high self-efficacy has been associated with successful teaching (Andersen, Dragsted, Evans & Sorensen in Webb & Gripper, 2010, p. 29), teachers with high self-efficacy may risk more with curriculums, use new teaching approaches, have a positive classroom environment, support learners' ideas and address learners' needs (Gibbs in Webb & Gripper, 2010, p. 29). Teachers with a strong sense of self-efficacy seem more likely to have an impact on the behaviour and achievements of learners than those with low self-efficacy (Ashton & Webb in Schunk, 2008, p. 113; Bandura in Webb & Gripper, 2010, p. 29).

I further assumed that teachers need ample training to be effective in roles allocated to them (Coombe, 2003b; DoE, 2007b; Loots & Mnguni, 2007; Van den Berg, 2008). In addition, comprehensive HIV/AIDS teacher training seems essential for teachers to be comfortable with HIV/AIDS issues (Ahmed *et al.*, 2006; Dawson *et al.*, 2001; Griesel-Roux, 2005; Mathews *et al.*, 2006; Mufune, 2008; Nsubuga & Bonnet, 2009; Ongunya *et al.*, 2009; Mugimu & Nabadda, 2009; UNAIDS, 2009b; Webb & Gripper, 2010). Furthermore, continuous development and support for teachers surrounding HIV/AIDS challenges may be essential to strengthen teacher's confidence levels (Burr *et al.*, 2006; Helleve, Flisher, Onya, Kaaya, *et al.*, 2009; Njue *et al.*, 2009; UNAIDS, 2009b).

Finally, I assumed that an effectively developed HIV/AIDS curriculum is essential, not only for teacher training, but for HIV/AIDS intervention in all sections of education to address the HIV/AIDS epidemic successfully. HIV/AIDS curricula, therefore need to be specifically developed (Carl, 2002; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; King in Page, 2004, p. 23; Marcus, 2002; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; Wood, 2008) for the intended target group keeping cultural, social, economic and political factors; the context of a country; language as well as the development level and population characteristics of the participants in mind (Ahmed *et al.*, 2009; Carl, 2002; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; King in Page, 2004, p. 23; Marcus, 2002; Mpofu *et al.*, 2008; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; Walcott *et al.*, 2008; Wood, 2008).

2.7 CONCLUSION

Chapter 2 positioned the current study within existing literature and a theoretical framework in order to explore the experiences of students participating in the HIV/AIDS TEPP. I commenced the chapter by exploring the importance of HIV/AIDS and education by investigating the critical role of the education sector as well as the responsibility of education to eradicate issues such as stigma and discrimination by addressing cultural as well as socialised beliefs relating to HIV/AIDS. Thereafter, I discussed HIV/AIDS and teacher training by investigating the role of teachers concerning HIV/AIDS and highlighted the importance of continuous professional development and support for teachers to address HIV/AIDS challenges. Finally, I paid specific attention to the development of HIV/AIDS curricula by exploring relevant literature and research findings on HIV/AIDS programmes.

In Chapter 3, I discuss the empirical study conducted based on the theoretical framework outlined in this chapter. I explain the research design employed as well as the methodological choices I made within the context of the current study.

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CHAPTER THREE

RESEARCH DESIGN AND METHODOLOGY

3.1 INTRODUCTION

In Chapter 2, I embarked on a literature investigation relevant to HIV/AIDS education, HIV/AIDS and teacher training as well as HIV/AIDS curriculum development in order to explore the experiences of students participating in the HIV/AIDS TEPP. I further presented a description of the chosen theoretical framework, namely Social Cognitive Theory.

Chapter 3 provides a comprehensive outline of the direction and processes followed during the current study to obtain possible answers to the primary research question. I introduce the paradigmatic approach that informed the research endeavour, and justify the choice of research design and methodology as well as data collection strategies and data analysis procedures. I conclude the chapter with a discussion on the role I assumed in the current research study as well as the ethical guidelines and quality criteria pursued during the study.

3.2 PARADIGMATIC PERSPECTIVES

A research paradigm may be regarded as a fundamental model or frame of reference used as a means of organising observations and ways of reasoning (Babbie, 2005). In the current study, I employed a qualitative research approach anchored in constructivism.

3.2.1 CONSTRUCTIVISM AS META-THEORY

In practice, the distinction between research epistemologies is not always clear-cut. Epistemologies can overlap and have evolved into hybrid forms that may complement other approaches (Nieuwenhuis, 2007b). Deciding on a meta-theory for the current study was therefore not a straightforward decision. After many discussions and deliberations with my supervisors, I opted for constructivism as an appropriate meta-theory since the current study aimed to provide a rich description and understanding of the experiences of students participating in the HIV/AIDS TEPP using transcripts of a focus group and two individual interviews. Researchers in the field of education have found that the constructivist paradigm is an appropriate research paradigm for conducting research in this field (Adams, Collair, Oswald & Perold, 2004).

According to Jansen (2004) intersubjective meanings as well as the social context, conventions, norms and standards of a particular person or community are essential to achieve understanding and meaning. Interpretation is necessary given that behaviour is constituted by social conventions (Jansen, 2004). Constructivism argues that knowledge is not passively received, but constructed by active agents making meaning of their lives, within and through socio-cultural contexts (Donald, Lazarus *et al.*, 2006). There is a historical and socio-cultural dimension to the construction of meaning since interpretations are not construed in isolation, but against a background of shared understandings, practices, language, et cetera. Therefore, reality is socially constructed (Mertens, 2010; Schwandt, 2001). The assumption is maintained that individuals develop subjective meanings of their experiences and seek to understand the world in which they live (Creswell, 2009). Knowledge is thus continuously developed by individuals, groups and societies within a pre-existing social milieu, ever interpreting and reinterpreting itself (Donald, Lazarus *et al.*, 2006; Mertens, 2010). Individuals therefore have the capacity to interpret and construct multiple realities that are time- and context-dependent (Mertens, 2010; Patton, 2002).

Within the constructivist approach, the researcher generates or inductively develops a theory or pattern of meaning, rather than starting with a theory. The intent is to make sense of (or interpret) the meanings others have concerning the world (Creswell, 2009). Qualitative methods such as interviews, observations and document reviews are predominant in the constructivist paradigm (Mertens, 2010). Seeing that a constructivist researcher's goal is to understand the multiple social constructions of meaning and knowledge, the current study incorporated the transcriptions of a focus group interview and two individual interviews with students who had direct experience with the HIV/AIDS TEPP (Mertens, 2010). Through the close examination of students' individual experiences, I sought to capture the meaning and common themes of their lived experiences (Starks & Trinidad, 2007).

Since constructivism is an alternative to positivism, which has dominated psychological thinking and research, it has been argued that researchers adopting a qualitative approach, such as constructivism, risk discarding the scientific procedures of verification and abandoning the hope of discovering useful generalisations about human behaviour (Cohen *et al.*, 2007; Donald, Lazarus *et al.*, 2006). However, my aim was not to generalise the findings within a macro-sociological perspective, but to give a rich, in-depth description of students' experiences of the HIV/AIDS TEPP (Cohen *et al.*, 2007). The constructivist paradigm emphasises that research is a product of the values of researchers and cannot be independent

of the researcher (Mertens, 2010). Nonetheless, in order to address the danger of imposing my own subjective interpretations concerning the current study, I employed a research journal to monitor and take account of any subjective presence in the study and furthermore had numerous discussions with my supervisors. I recognised that my own background may have shaped my interpretation, and I positioned myself within the research to acknowledge how my interpretation flows from my personal, cultural and historical experiences (Creswell, 2009).

3.2.2 QUALITATIVE METHODOLOGICAL PARADIGM

Qualitative research approaches attempt to collect rich descriptive data in order to describe or develop an understanding of a particular phenomenon or context (Nieuwenhuis, 2007a). The phenomena under investigation occur in a natural setting (e.g. universities) and are examined in all their complexity (Leedy & Ormrod, 2005; Willig, 2008). Rather than predicting, controlling or identifying cause-effect relationships qualitative research attempts to explore and understand the meaning (explicitly the quality and texture of experiences) attributed to social or human phenomena (Creswell, 2009; Streubert & Carpenter in Vivar, McQueen, Whyte & Armayor, 2007, p. 64; Willig, 2008). Educational researchers have found that research questions, views of the world and the practicalities of situations are best answered by qualitative research methods given that qualitative research is interested in how individuals experience events and make sense of the world (Adams *et al.*, 2004; Willig, 2008).

Acknowledging that a variety of ways exist to make sense of the world, a qualitative approach seemed suitable for the current study. Qualitative research honours an inductive style of inquiry, which enabled me to focus on individual meaning and the importance of portraying the complexity of the situation (Creswell in Creswell, 2009, p. 4). Methodologically, I therefore conducted the current study from a qualitative paradigm since qualitative research aims to provide a comprehensive description of a specific phenomenon and aspires to comprehend situations in their particular unique context (Adams *et al.*, 2004). My intention was to explore and describe the experiences of students participating in the HIV/AIDS TEPP implemented at the University of Pretoria. I attempted to gain an appreciation of the participants' experiences shaped by their subjective and socio-cultural perspective (Wilkinson *et al.*, 2004). The focus was on how the participants viewed, understood and constructed meaning out of their experiences relating to the HIV/AIDS TEPP (Nieuwenhuis, 2007a).

Qualitative research approaches have various strengths. A qualitative research approach describes phenomena situated and embedded in local contexts and is responsive to local situations, conditions and needs. The data, in a qualitative research approach, are based on participants' own categories of meaning and provide a holistic picture of what 'real' life is like from a participants' point of view. Qualitative data in the words and categories of participants lead to exploration of how and why phenomena occur. The collection of data within a naturalistic setting is therefore an advantage of a qualitative research approach since it provides an understanding and description of people's personal experiences of phenomena and determines how participants interpret constructs. Qualitative research further lends itself to the study of dynamic processes and describes complex phenomena, which allow for a deeper understanding of an event. Furthermore, qualitative researchers are responsive to changes occurring during a study, which may result in a shift in the focus of the study where needed (Cohen *et al.*, 2007; Johnson & Onwuegbuzie, 2004; Vivar *et al.*, 2007). On the other hand, qualitative research also presents limitations. The generalisation of produced knowledge as well as possible quantitative predications may be difficult. Qualitative research does not lend itself to testing of hypotheses or theories and may be viewed as a narrow micro-sociological perspective with lower credibility. Data collection may take more time when compared to quantitative research and data analysis can be time-consuming and costly. A researcher can further affect the participant's responses and the researcher's personal biases may influence results (Cohen *et al.*, 2007; Johnson & Onwuegbuzie, 2004; Vivar *et al.*, 2007).

In addressing the limitations of qualitative research, I was conscious of the fact that the current research study's emphasis was not on the scope of the information provided or the discovery of general laws but rather on the quality, uniqueness and depth of information (Nieuwenhuis, 2007a). The value of qualitative research lies in the particular description and themes developed in context of a specific site (Creswell, 2009). My objective was to interpret and make sense of what was in the data, not to measure or make quantitative predications (Nieuwenhuis, 2007c). Employing secondary data (see section 3.3.2), in the current study, saved time during data collection and manual analysis ensured that the data-analysing process, although time-consuming, was cost-effective. Nieuwenhuis (2007b) argues that a qualitative approach accepts researcher subjectivity as something that cannot be eradicated. Nevertheless, to limit my own subjectivity and bias, I constantly discussed the research with my supervisors, recorded supervision sessions for additional review and reflected in my research journal. I further employed various strategies to ensure the trustworthiness of the current study (see section 3.7).

3.3 RESEARCH METHODOLOGY AND STRATEGIES

In this section, I discuss the research design and research methodology relating to the current study. Table 3.1 provides a summary of the choices I made with regard to the research design, research methodology, ethical strategies and quality criteria. The various aspects of my methodological decisions are subsequently discussed in detail.

TABLE 3.1: METHODOLOGICAL DECISIONS

METHODOLOGICAL DECISIONS	
Research Design	Qualitative content analysis
Data collection method	Selecting and analysing texts: transcriptions of a focus group and two individual interviews
Source of data	Afrikaans students enrolled in EDU 364
When administered	31 October 2008
Who conducted	Naydene de Lange ¹⁰
Data analysis and interpretation	Inductive thematic analysis
Ethical considerations	Permission to utilise data; analysis and reporting; confidentiality and anonymity; informed consent
Trustworthiness strategies to ensure rigour	Credibility; transferability; dependability; confirmability; authenticity

3.3.1 QUALITATIVE CONTENT ANALYSIS AS RESEARCH DESIGN

Creswell (2009) states that research designs are the procedures and plans that span research decisions from extensive assumptions to meticulous methods of data collection and analysis. The choice of a research design is informed by the researcher's assumptions, procedures of inquiry as well as specific methods of data collection, analysis and interpretation. A research design is thus the '*plan or proposal to conduct research*' (Creswell, 2009, p. 5).

The nature of the current research problem, paradigmatic approach and the audience for the current study played a role in the selection of the research design (Creswell, 2009). The current study is an empirical study inductively analysing existing secondary textual data (Mouton, 2001). The text analysed was based on an Afrikaans focus group and two individual interviews. The interviews were audio-recorded and transcribed for data analysis. Considering that the purpose of the current study was to gain insight into the experiences of students

¹⁰ Professor Naydene de Lange, a former scholar at the University of KwaZulu-Natal, currently at Nelson Mandela Metropolitan University. Furthermore, she was a member of the original HEAIDS research team.

participating in the HIV/AIDS TEPP by means of interview transcriptions, a qualitative content analysis research design (Mouton, 2001) effectively served the purpose of the current research study. By conducting a qualitative content analysis of data, my intention was to explore and describe the various themes that emerged when students participated in the HIV/AIDS TEPP.

Mouton (2001) defines qualitative content analysis as a research design in which content of text or documents are analysed. Content analysis is the analysis and interpretation of recorded communication undertaken with any written or visual material, including interview transcriptions (Babbie, 2005; Cohen *et al.*, 2007; Donald, Jacobs, Razavieh & Sorensen, 2006). Qualitative content analysis entails emerging questions and procedures, data usually collected in the participants' setting, inductive data analysis building from particular to general themes and the researcher making interpretations of the meaning of the data (Creswell in Creswell, 2009, p. 4). Content analysis incorporates systematic, replicable, observable and rule-governed forms of analysis in a theory-dependent system for the generation of pre-existing categories and emergent themes (Cohen *et al.*, 2007).

Content analysis has several advantages and is useful for research involving large volumes of texts (Mouton, 2001). Errors associated with the interaction between researchers and participants are limited since the analysis of text and documents are an unobtrusive method (Babbie, 2005; Donald, Jacobs *et al.*, 2006; Mouton, 2001). The data are also in a permanent form (i.e. text) which makes verification through re-analysis and replication possible (Cohen *et al.*, 2007). In addition, content analysis may be economical in terms of both time and money (Babbie, 2005).

Using qualitative content analysis can however present challenges. Limitations regarding the authenticity of the data sources, representativeness of texts analysed and little information on intentions and background of the original study could hinder interpretation (Mouton, 2001). Content analysis is further limited to the examination of recorded communication (Babbie, 2005). The use of transcriptions may also imply the loss, distortion as well as a reduction in the complexity of data and important contextual information such as non-verbal communication might have been neglected or omitted (Cohen *et al.*, 2007). Aforementioned limitations were adequately dealt with in the current study. The authenticity of the data source was verified, since I was present during the focus group as well as individual interviews. I also had sufficient background information on the HEAIDS study and was aware of the

original intentions of the project. Furthermore, I transcribed the original audio-recordings personally. Recording and transcribing the interviews allowed me to start the process of familiarising myself with the data and making deductions from an early stage in the research process. I also remained aware of my own possible preconceptions, interests, biases, preferences, background and agenda concerning the data by reflecting in my research journal, having discussions with my supervisors as well as conducting a stakeholder check of the data analysis.

3.3.2 PURPOSIVE SAMPLING OF INTERVIEW TRANSCRIPTIONS

Sampling constitutes any procedure for selecting units of observation and is related to decisions on the research method to be used (Babbie, 2005). The idea behind qualitative research is to select participants, sites, documents or material that will best help the researcher understand the problem and the research question (Creswell, 2009). For the current study, I purposefully selected the transcriptions of the Afrikaans focus group and two individual interviews (as conducted by the HEAIDS project) as a sample. Purposive sampling is often a feature of qualitative research. A sample is handpicked on the basis that the target population contains particular characteristics and knowledge required for the research aim (Babbie, 2005; Cohen *et al.*, 2007; Gravetter & Forzano, 2009). Purposive sampling may not be representative or generalisable, but the aim is rather to acquire in-depth information from a sample that may provide relevant information (Cohen *et al.*, 2007).

The current study used previously collected data (i.e. data obtained during the HEAIDS programme) (McMillan & Schumacher, 2010). The re-use of qualitative data provides an opportunity to analyse raw materials of recent or earlier research again (Corti & Thompson, 2004). Re-interpretations and new questions can be set by analysing qualitative data and the availability of raw data, such as transcriptions of in-depth interviews. This enables further exploration of the data from a new perspective (James & Sorensen in Corti & Thompson, 2004, p. 333). Using secondary data saves time and money since existing data are utilised. However, it is not possible to control data collection errors and the analysis is constrained by the original objective of the research (Mouton, 2001). Re-using data further risks the potential loss of essential contextual experiences and lacks reflective interpretation (Corti & Thompson, 2004).

As I was personally involved in the HEAIDS project (as research intern) and was present during the focus group and individual interviews, I had adequate knowledge about the context and background of the original study. Professor Naydene de Lange (the facilitator of the Afrikaans focus group and individual interviews) was part of the original HEAIDS research team and her input, as stakeholder check, increased the authenticity of the context. The use of the original audio-recording enhanced the capacity to re-use data and I transcribed the focus group as well as the individual interviews personally which further maximised the potential of the data for re-use as it limits the subjective interpretations of the real-life original (Corti & Thompson, 2004). The entire focus group and individual interviews were transcribed and represent the original data collection in its entirety (Corti & Thompson, 2004). In Addendum A the verbatim transcriptions are provided.

3.3.3 DATA GENERATION OF SELECTED DATA SOURCES

The aim of data collection during qualitative research is to establish a comprehensive record of participants' words and actions (Willig, 2008). During the HEAIDS project a focus group and two individual interviews were conducted with Afrikaans students who voluntarily participated in the interviews (see Table 3.2). Purposive sampling was used to select participants for involvement in the HEAIDS study (Evaluation module, 2008). Participants were selected voluntarily based on the fact that they were already enrolled in the Education 364 module, in which the HIV/AIDS TEPP was presented.

TABLE 3.2: OUTLINE OF INTERVIEWS THAT CONTRIBUTED TO THE GENERATION OF DATA

Participant	Gender	Race	Age	Focus group interview	Individual interviews
1	Female	Caucasian	25	✓	
2	Female	Caucasian	23	✓	
3	Female	Caucasian	21	✓	✓
4	Female	Caucasian	20	✓	
5	Male	Caucasian	22	✓	
6	Female	Caucasian	22		✓

Professor Naydene de Lange facilitated the Afrikaans focus group and individual interviews (see Addendum B for the interview schedules). The focus group and individual interviews were conducted on the Groenkloof Campus of the University of Pretoria in an enclosed room

outside regular class times. Participants were informed at the beginning of the interviews of the fact that the session would be audio-recorded, of their rights during and after the session as well as the potential risks in relation to confidentiality within the focus group interview. Limitations in terms of confidentiality existed due to the group nature of the focus group activity, but participants were requested to honour a code of confidentiality (Evaluation module, 2008). Participants had the right to refrain from answering questions and could withdraw from the research project at any point. As I was the research intern for the HEAIDS project, I attended the Afrikaans focus group and individual interviews and thereafter transcribed the audio-recordings in a verbatim manner.

Semi-structured interviews are widely used to elicit viewpoints of participants for qualitative analysis (Wilkinson *et al.*, 2004; Willig, 2008). The aim of qualitative interviews is to see the world through the eyes of the participant in order to obtain rich descriptive data that will aid in the understanding of the participant's construction of knowledge and social reality (Nieuwenhuis, 2007b). An individual interview is a two-way conversation in which the interviewer asks the participant questions in order to investigate the participant's ideas, beliefs, views, opinions and behaviours (Cohen *et al.*, 2007; Nieuwenhuis, 2007b). The individual interviews, conducted by the HEAIDS research project, were semi-structured interviews. Participants were required to answer a set of predetermined questions allowing for probing and clarification of answers (Evaluation module, 2008; Nieuwenhuis, 2007b).

In addition to individual interviews, an Afrikaans focus group was also conducted by the HEAIDS research project. Focus groups are an interview style designed for small groups and usually involve interaction between a researcher (or facilitator) and a group of participants as a data source (Berg, 2001, Vivar *et al.*, 2007; Willig, 2008). A focus group is a useful data collection method to elicit different perspectives on a phenomenon. The informal group discussion atmosphere may encourage participants to speak and discuss without restraint (Berg, 2001; Vivar *et al.*, 2007). Data emerge from the interaction of the group as participants engage in discussion with each other (Cohen *et al.*, 2007; Nieuwenhuis, 2007b). Participants are able to build on each other's ideas and comments to provide an in-depth view (Nieuwenhuis, 2007b). The group dynamic can bring forth thoughts and ideas among participants that would not have been anticipated and may not have emerged during an individual interview, since meaning making is a collective and socially shared activity (Babbie, 2005; Lichtman, 2006; Wilkinson *et al.*, 2004). Focus group interviews are time-economical, flexible, capture real-life data in a social environment and may produce a

substantial volume of data rich in detail through the joint construction of meaning (Babbie, 2005; Cohen *et al.*, 2007; Nieuwenhuis, 2007b; Willig, 2008). The group interaction widens the range of contributions by activating forgotten details of experiences, challenging statements and releasing inhibitions that may otherwise discourage participants from disclosing information (Nieuwenhuis, 2007b; Willig, 2008).

On the other hand, focus groups may be threatening to some participants limiting disclosure. In addition, focus groups usually consist of a small sample which makes representation difficult, generates less data than interviews with the same number of individuals on a one-to-one basis and analysis of data may be difficult (Babbie, 2005; Cohen *et al.*, 2007; Nieuwenhuis, 2007b; Willig, 2008). Controlling the dynamic within a group can also be a challenge and information may be biased due to participant domination (Babbie, 2005; Nieuwenhuis, 2007b). When one participant dominates the focus group interview it may reduce the probability that the other less assertive participants will participate (Babbie, 2005). The facilitator of the HEAIDS focus group appeared skilled in the facilitation of the focus group as well as individual interviews and encouraged discussions, asking probing questions where necessary and maintaining the focus of the interviews. Domination was limited within the focus group interview and the rapport between the facilitator and the participants appeared to encourage open and honest expression of feelings and experiences (Nieuwenhuis, 2007b). The use of both individual interview and focus group interview transcriptions, within the current study, may counteract the limitations of both interview styles.

3.4 DATA ANALYSIS AND INTERPRETATION

The process of data analysis involves making sense out of data by breaking up the data into manageable themes, patterns or relationships (Creswell, 2009; Mouton, 2001). Creswell (2009) points out that data analysis necessitates the preparation of the data, conducting analysis, understanding the data, representing the data and making an interpretation of the meaning of the data. One of the most common approaches to the analysis of interview data involves the identification of recurring themes across the transcribed talk (Freeman, 2009). I consequently used thematic analysis, as content analysis methodology, to analyse and interpret the focus group and individual interview transcriptions. Within the field of content analysis, thematic analysis is often associated with a qualitative content analysis research design and can be undertaken with any written material, including interview transcriptions (Cohen *et al.*, 2007; Mouton, 2001).

Thematic analysis is a widely used qualitative method for identifying, analysing and reporting repeated patterns of meaning within data context (Braun & Clarke, 2006; Joffe & Yardely, 2004). Thematic analysis seeks to theorise the socio-cultural context as well as structural conditions that enable individual accounts and allows for social as well as psychological interpretations of data (Braun & Clarke, 2006). My focus, during the data analysis process, was to obtain an understanding of the essence of the lived-experiences of the students concerning the HIV/AIDS TEPP. The purpose was to identify and extract common, dominant and significant themes inherent in students' description of their experiences (Leedy & Ormrod, 2005; Nieuwenhuis, 2007c). A theme captures an important, specific pattern found in the data and can represent some level of patterned response or meaning within the data set (Braun & Clarke, 2006; Joffe & Yardely, 2004). Freeman (2009) asserts that the investigation for themes is directed by the research questions set during the research design phase. Therefore, I coded in order to answer my research questions (Joffe & Yardely, 2004). I conducted the thematic analysis by following the guidelines described by Braun and Clarke (2006). In Addendum A, I provide examples of these phases of data analysis.

- **Phase 1: Familiarising myself with the data**

After I had transcribed the focus group and individual interviews in a verbatim manner, I read and re-read my transcriptions in order to become thoroughly familiar with, and to immerse myself in the data (Braun & Clarke, 2006; Cohen *et al.*, 2007). I made margin notes (see Addendum A1) with regard to my general thoughts and impressions, to serve as my initial sorting process (Braun & Clarke, 2006).

- **Phase 2: Generating initial codes**

I then commenced the coding process (see Addendum A2) by identifying interesting features of the data in a systematic fashion across the entire data set, collating data relevant to each code (Braun & Clarke, 2006). The coding process was iterative, with new categories emerging as the data were examined closely (Freeman, 2009).

- **Phase 3: Searching for themes**

After generating initial codes, I collated codes into possible categories and sub-themes, gathering all data relevant to each potential theme (Braun & Clarke, 2006). I grouped the data, ranging from a couple of words to a multi-turned exchange between participants, by colour coding (see Addendum A3.1, A3.2 and A3.3) identified related categories and patterns (Freeman, 2009).

- **Phase 4: Reviewing themes**

I repeatedly scrutinized the raw data until I was satisfied that all the raw data had been sorted, coded and grouped. I used an inductive process, going back and forth between categories and sub-themes in order to identify recurring patterns that were evident across all the data, until I established a comprehensive set of themes. I integrated various similar sub-themes in my attempt to consolidate the emerging themes (see Addendum A4.1, A4.2 and A4.3) (Creswell, 2009).

- **Phase 5: Defining and naming themes**

Ongoing analysis to refine the specifics of each theme constantly took place. This generated a classification system in terms of themes, sub-themes and categories with clear definitions and names for each (Braun & Clarke, 2006). Aforementioned process resulted in the development of my interpretation based on my opinions and connected to an existing body of literature (Freeman, 2009). I checked that the themes worked in relation to the coded extracts and generated a thematic table (see Addendum A5) of the analysis for each interview transcription (Braun & Clarke, 2006).

- **Phase 6: Producing the final analysis results**

In conjunction with my supervisors, I selected compelling extract examples and final analysis of selected extracts (see Addendum A6.1, A6.2, A6.3 and A6.4) in order to relate back to the research questions and literature (Braun & Clarke, 2006). Finally, I developed inclusion and exclusion criteria (see Addendum A7), that guided the constitution of each theme.

I found thematic analysis to be an accessible, flexible, unobtrusive and user-friendly method that provided a rich and detailed account of the data (Braun & Clarke, 2006; Mouton, 2001). Since thematic analysis is an inductive process, research findings emerged from the significant themes inherent in the raw data, without the restraints imposed by a more structured theoretical orientation, that allowed unanticipated insights to be generated (Braun & Clarke, 2006; Nieuwenhuis, 2007c). However, the flexibility of thematic analysis may also be regarded as a limitation, since it permits a wide range of analytic options (Braun & Clarke, 2006). I constantly had to refer to my research questions and aims to ensure that the analysis remained focused. Frequent discussions with my supervisors also aided this process. Thematic analysis furthermore has limited interpretative power beyond description if it is not used within an existing theoretical framework (Braun & Clarke, 2006). Careful consideration with regard to the choice of theoretical framework therefore took place to certify that analytic

claims were anchored in an appropriate theoretical framework (Braun & Clarke, 2006). The coding process involved in thematic analysis was taxing and time-consuming given that there were no standardised categories at the outset of the analysis process. As a result, I had to set aside enough time, within my research schedule, for the analysing process (Babbie, 2005; Joffe & Yardely, 2004).

A further limitation of the data analysis in the current study related to the students' focus during the interviews. Since the HIV/AIDS TEPP was only part of EDU 364 students occasionally discussed other units of the module as well. As I was present during the interviews my assumption, when reading the transcriptions, was that at times the students were addressing the complete EDU 364 module and not the HEAIDS theme within the module. I therefore analysed the data accordingly. I acknowledge that students addressing the complete EDU 364 module and not only the HIV/AIDS TEPP might limit the data analysis and the use of secondary data since data collection cannot be controlled (Mouton, 2001). The results of the thematic analysis are presented in Chapter 4.

3.5 REFLECTING ON MY ROLE AS RESEARCHER

As appointed research intern for the HIV/AIDS TEPP at the University of Pretoria, my role was to provide support to the institution and to the project over the period of preparation, delivery and evaluation of the module. In addition, my appointment as intern provided me with the opportunity to acquire the role of researcher since I could utilise the data for my Master's study. I was not involved in the teaching of the EDU 364 module or related curriculum design. During the research process my role as intern and researcher was made clear to the participants involved in the study. My personal interest in conducting a study of the experiences of students involved in the HIV/AIDS TEPP developed because of my role as research intern for the HEAIDS project.

As a white Afrikaans individual, I was interested in exploring the experiences of Afrikaans students enrolled in the HIV/AIDS TEPP since I had discovered, through my initial literature review, that there was limited research available on the experiences of participants involved in HIV/AIDS programmes (Griesel-Roux *et al.*, 2005) as well as empirical research concerning the Afrikaans community's perceptions of HIV/AIDS (Bacus, 2008). According to Bacus (2008), many Afrikaans individuals remain reluctant to acknowledge the enormity of the HIV/AIDS epidemic and may have the perception that the risk of HIV/AIDS is not 'personal'.

Furthermore, there seems to be an unchallenged silence about HIV/AIDS in Afrikaans communities (Bacus, 2008). I was therefore interested in exploring how Afrikaans students had experienced the HIV/AIDS TEPP.

Creswell (2009) proclaims that a qualitative researcher is the one who assembles the information through various data collection strategies. I was provided with an opportunity to employ existing data as a means of gaining access to valuable information that could be analysed. I therefore was not the main generator of knowledge and reflected on my particular role in the data generation process. Throughout the HEAIDS project as well as the current study I maintained a written research journal consisting of brief field notes and observations as well as my own reflective thoughts (see Addendum C) on the research process and my personal experiences (Creswell, 2009). My research journal was not utilised as a data source, but as a form of quality assurance. Documenting the main decisions and events, which occurred during the research process enabled me to construct a historical record of the complete research process to which I could refer (Mouton, 2001).

Descriptive field notes allowed me to document statements and events that stood out or anything out of the ordinary (surprising, different, difficulties etc.) during the HEAIDS research project. Data on a person's behaviour in a particular situation can be gained through indirect observation. Observation may enable a deeper insight and understanding of the phenomenon being observed (Nieuwenhuis, 2007b). Being part of the Afrikaans focus group and individual interview proceedings provided me with the opportunity of being a complete observer (i.e. observe without participating) of the processes through which meanings were constructed and negotiated, within the social context of the interviews (Creswell, 2009; Wilkonson *et al.*, 2004). In order to account for selective and subjective observations I was conscious of my own biases and reflected continuously in my research journal (see Addendum C). Furthermore, I had informal conversations with certain lecturers and in-depth conversations with my supervisors to examine my observations, thoughts and ideas.

By making use of field notes and reflective thoughts in my research diary, I employed reflexivity (Patton, 2002; Willig, 2008). Reflexivity proposition that researchers should acknowledge and disclose *'their own selves in the research, seeking to understand their part in, or influence on, the research'* (Cohen *et al.*, 2007, p. 171). Reflexive researchers continuously review the ways in which their selectivity, perception, values, background as well as inductive processes and paradigms shape the research (Cohen *et al.*, 2007; Willig,

2008). My interpretations could not be separated from my own background, history, contexts and prior understandings (Creswell, 2009). I was therefore cognisant of my biases, values, and personal background, such as gender, history, culture and socio-economic status, that may have shaped my interpretations formed during the current study (Creswell, 2009).

Throughout the current study, I also recorded ideas and insights gained as I moved through the research process, memoing reflective notes to document personal reflections, emotions and lessons learned from the data (Nieuwenhuis, 2007c; Patton, 2002). Reflecting in my research journal and frequent discussions with my supervisors (which I recorded to ensure thorough investigation of discussions) enabled me to stay mindful of personal values, assumptions and biases from the outset of the study (Creswell, 2009; Starks & Trinidad, 2007). My research journal encouraged me to consider ideas and insights gained during the current study against the themes emerging from the data (Nieuwenhuis, 2007c).

3.6 ETHICAL STRATEGIES

The awareness of ethical concerns, at each step in the research process, is becoming more evident (Cohen *et al.*, 2007; Gravetter & Forzano, 2009). Each stage in the research sequence raises ethical concerns since ethical issues do not end with data collection and analysis (Cohen *et al.*, 2007; Creswell, 2009). Ethical strategies incorporated during the HEAIDS project, which had relevance to the current study, included informed consent as well as confidentiality and anonymity. Due to the qualitative nature of the current study these are valid considerations to take into account (Vivar *et al.*, 2007). Other ethical strategies considered included permission to utilise existing data as well as the ethical analysis and reporting of the current study.

3.6.1 PERMISSION TO UTILISE EXISTING DATA

Permission was granted by HEAIDS to all institutions participating in the HEAIDS research project to utilise any data or information generated by the HEAIDS project. I could therefore use data generated from the Afrikaans focus group and individual interviews for the current research study.



3.6.2 ANALYSIS AND REPORTING

Ethical issues also apply to the actual writing and dissemination of the final research report. All researchers have an obligation to ethically analyse and report their results. An accurate and truthful account of the research process, findings and limitations needs to be documented rigorously (Babbie, 2005). In addition, I aspired throughout the research study to use language or words that were not biased against persons because of gender, sexual orientation, racial/ethnic group, disability or age (Creswell, 2009). I did not suppress, falsify, misrepresent or invent findings to meet my own or an audience's needs (Creswell, 2009; Mouton, 2001). I further disclosed details of the theories, methods and research design relevant to interpretations of the research findings to maintain the objectivity and integrity of the research (Mouton, 2001).

3.6.3 INFORMED CONSENT

No deception or betrayal took place during the HEAIDS study. Informed consent, by means of a consent form, was obtained from each participant participating voluntarily in the HEAIDS interviews. Participants were informed of the HEAIDS project aim and ample information was provided (Gravetter & Forzano, 2009). Furthermore, before signing the consent form, participants were given the opportunity to ask for clarification and to raise any issues or concerns (Evaluation module, 2008; Vivar *et al.*, 2007). Copies of the signed consent forms of the Afrikaans students participating in the focus group and individual interviews are in my possession.

3.6.4 CONFIDENTIALITY AND ANONYMITY

By utilising the transcriptions of the Afrikaans focus group and individual interviews as secondary data in the current study, I had to conform to the ethical and legal guidelines with respect to the preservation of confidentiality and anonymity (Corti & Thompson, 2004). Anonymity was guaranteed to the participants in the current study by certifying that information presented was not associated with or revealed any of the participants' identities (Cohen *et al.*, 2007; Gravetter & Forzano, 2009). I removed any real names mentioned during the focus group and individual interviews throughout the data transcription process. I numbered each individual who spoke according to order of appearance (focus group interview). Confidentiality was ensured by keeping information obtained from participants secret and private (Gravetter & Forzano, 2009).

Only members of the HEAIDS research project have access to the recordings and transcriptions (Evaluation module, 2008) and all data collected will be securely stored in Department of Educational Psychology at the University of Pretoria for a period of 15 years. Involvement in the HEAIDS focus group and individual interviews was voluntary, but participants were alerted to the potential risks and difficulties of ensuring confidentiality especially in the focus group setting. Limitations in terms of confidentiality existed because of the group nature of the activity, but participants were requested to honour a code of confidentiality. The questions posed during the focus group interview were relatively general and participants could refrain from answering any questions that they found too personal (Evaluation module, 2008).

3.7 QUALITY CRITERIA

The aim of the current study, in concordance with the nature of the constructivist approach, was not to discover the ‘ultimate truth’, but rather to gain insight into the experiences of students participating in the HIV/AIDS TEPP by reporting information in the form of rich, comprehensive descriptions. Criteria for judging the rigour of such qualitative research include credibility, transferability, dependability, confirmability and authenticity (Mertens, 1998) which are discussed in the next section.

3.7.1 CREDIBILITY

Credibility within qualitative research can be equated with internal validity within quantitative research (Mertens, 1998, Patton, 2002). Credibility seeks to establish whether there is a correspondence between the way researchers portray their viewpoints and the way respondents actually perceived social constructs (Mertens, 1998). To provide credible research, I continuously adhered to the guidelines of being a professional with integrity, intellectual rigour and a methodological capability (Patton, 2002). I ensured credibility of my research by transcribing the Afrikaans focus group and individual interviews, conducted by HEAIDS, personally. Through verbatim data transcription (that is to say word for word), in contrast to using only summary notes from a tape recording, my own bias was limited (Nieuwenhuis, 2007c).

The data analysis (inductive thematic analysis) adhered to a rigorous analysis, examination and verification of the transcribed interview data (Cohen *et al.*, 2007). Inductive thematic analysis allowed for themes inherent in the raw data to emerge, making data analysis more

trustworthy. A more deductive approach may have created blind spots and blank spots allowing certain preconceptions and biases to obscure the data analysis (Nieuwenhuis, 2007c). Throughout the analysis process, I provided examples and evidence of the raw data (that is verbatim responses) in order to provide a trail of evidence (Cohen *et al.*, 2007).

I applied and supplemented the abovementioned by making use of thorough literature control (see Chapter 2). I aspired to remain open-minded and reflected in my research journal on possible bias, prejudices and subjectivity that might have influenced the analysis and interpretation of the current study. My supervisors assisted and monitored the data analysis and interpretation process in order to enhance the richness and credibility of the findings (Babbie & Mouton, 2001; Nieuwenhuis, 2007b). The credibility of the research findings were further enhanced by a stakeholder check in which an individual with specific interest in the research was allowed to comment on the data analysis, interpretations and conclusions (Nieuwenhuis, 2007c).

3.7.2 TRANSFERABILITY

According to Guba and Lincoln (in Mertens, 1998, p. 183) transferability is the qualitative parallel to external validity within quantitative research. Transferability refers to whether findings of a study can be applied to other participants or in different contexts and relies on the possibility that data may be representative of the broader population (Babbie & Mouton, 2001; Patton, 2002). I provided a rich description of the experiences of students participating in the HIV/AIDS TEPP. My intention was not to generalise the findings, since it is not the purpose of a constructivist, qualitative study (Cohen *et al.*, 2007; Patton, 2002).

The burden of transferability is on the reader to determine the degree of applicability, but it is my responsibility, as researcher, to provide the contextual features of the study to enable the reader to make an effective judgment concerning transferability (Mertens, 1998; Willig, 2008). In this regard, I kept a research journal (see Addendum C) of my decisions during the research process to assist others to follow my reasoning. Furthermore, I documented the analysis and interpretation process so that others could investigate the choices I had made, how the analysis was performed and how I had arrived at the interpretations (Nieuwenhuis, 2007c).

3.7.3 DEPENDABILITY

Dependability within qualitative research can be viewed as parallel to reliability within quantitative research (Guba & Lincoln in Mertens, 1998, p. 184). Dependability therefore considers whether findings of a study would be similar if the study were to be replicated (Babbie & Mouton, 2001). The same findings cannot be guaranteed in other context or with different participants, seeing that change is acceptable and expected within qualitative research (Mertens, 1998). Sufficient documentation of my data, methods and findings is however provided for other researchers to decide whether the study can be repeated in another context/participants of a similar nature (Babbie & Mouton, 2001; Patton, 2002).

I transcribed all the interviews personally and checked the transcriptions to ensure that they did not contain obvious mistakes made during the transcription process (Creswell, 2009). All the interview transcriptions were analysed, since sentences, phrases and whole documents have the highest reliability in analysis (see Addendum A) (Cohen *et al.*, 2007). I included contributions from other persons during the data analysis and regard this as a strategy that strengthened the possibility of the findings being dependable. My supervisors reviewed and discussed the findings of the current study in order to clarify potential misinterpretations and provide suggestions for further analysis. In addition to this, I provided a detailed record of the analysis (see Addendum A). The analysis can thus be investigated by other researchers with the same theoretical framework and research aim to verify results (Cohen *et al.*, 2007). Since the data are in a permanent form (interview transcriptions), verification through re-analysis and replication is possible (Cohen *et al.*, 2007). The concreteness of materials studied in content analysis strengthens the likelihood of dependability. Coding and recoding can take place, in order to ensure that the coding is consistent (Babbie, 2005).

3.7.4 CONFIRMABILITY

Confirmability within qualitative research is comparable to objectivity within quantitative data (Guba & Lincoln in Mertens, 1998, p. 184). Confirmability suggests data, interpretation and findings of the research are not the creation of the researcher and that the data as well as the interpretations can be related to its sources (Mertens, 1998; Patton, 2002). Even though researcher bias may be inevitable, it must be acknowledged and guarded against. The current study utilised the transcriptions of a focus group and individual interviews, which restricted my direct involvement with research participants. The lack of an intimate relationship with research participants may have limited the risk of bias (Nieuwenhuis, 2007c).

I furthermore established an audit trail (by presenting preservation of the transcriptions, drafts and analysis) (Patton, 2002) for other researchers to retrace my research procedures (see Addendum A). Finally, the interview transcriptions and data analysis were reviewed by my supervisors and a stakeholder check was carried out in order to ensure that my conclusions were supported by data (Keller in Mertens, 1998, p. 184).

3.7.5 AUTHENTICITY

According to Stainback and Stainback (in Mertens, 1998, p. 184) authenticity refers to the acquisition of a balanced view of all perspectives, values and beliefs by answering the question *‘has the researcher been fair in presenting views?’* Since I aimed to attain authenticity by gaining insight into the participants’ experiences of the HIV/AIDS TEPP, the similarities I have with the participants, concerning cultural and linguistic background, may be helpful in this quest. However, the latter may have led to researcher bias of which I had to be aware. I constantly reflected in my research journal and had discussions with my supervisors. In doing so, I aimed to process and address any personal biases or assumptions, which I may have held regarding the results and findings of the current study.

3.8 CONCLUSION

In this chapter, I concentrated my discussion on a detailed description of the research process that was followed. Working from a qualitative research approach allowed me to analyse and interpret data from a constructivist perspective by exploring the experiences of students involved in the HIV/AIDS TEPP. Using qualitative content analysis as research design supported the aim of the current study as it enabled me to gain a deeper understanding of, and insight into the life-worlds of the participants. In addition, I discussed my choice of data collection methods, the use of secondary data as well as data analysis and interpretation strategies. I furthermore, deliberated on my role as researcher and explained aspects of trustworthiness relating to quality criteria as well as ethical responsibilities.

In Chapter 4, I present and discuss the integrated results and findings of the current study. I structure the chapter by addressing the themes, sub-themes and categories as they emerged through an inductive thematic analysis process.

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CHAPTER FOUR

THE RESULTS AND INTEGRATED FINDINGS OF THE STUDY

4.1 INTRODUCTION

Chapter 3 described the empirical part of the current study as well as the approach employed for data analysis and interpretation. I justified the methodological choices and procedures on the basis of the research questions and purpose of the current study, as formulated in Chapter 1. Furthermore, the procedures undertaken to ensure trustworthiness and ethical responsibility in order to enhance the rigour of the study were discussed.

In this chapter, I report on the results and findings of the current study in an integrated manner, by situating the study within the wider realm of research pertaining to the topic of enquiry. The discussion of themes, which emerged during an inductive thematic analysis of the raw data, is enhanced through verbatim¹¹ responses.

4.2 THEMATIC ANALYSIS: EMERGING THEMES

I structure this chapter according to the two main themes that emerged following thematic analysis of interview transcriptions, namely *Student experiences regarding curriculum issues in the piloting of the HEAIDS HIV/AIDS TEPP* and *Student professional and personal experiences regarding HIV/AIDS*. Table 4.1 outlines the themes, sub-themes and categories which emerged.

TABLE 4.1: RESULTS OF THE THEMATIC ANALYSIS OF DATA

Theme 1	
Student experiences regarding curriculum issues in the piloting of the HEAIDS HIV/AIDS TEPP	
Sub-theme 1.1: Module content	
1.1.1	Solid theoretical basis
1.1.2	Useful information and resources
1.1.3	Adapt for different knowledge levels and/or teaching phases
1.1.4	Lack of teaching application guidance

¹¹ See Addendum A6.1 for all original Afrikaans verbatim responses.

Sub-theme 1.2: Module format	
1.2.1	Concerns surrounding the duration and timing of the module
1.2.2	Need for alternative teaching and learning methodologies
1.2.3	Challenges related to lecturer and student issues
Theme 2	
Student professional and personal experiences regarding HIV/AIDS	
Sub-theme 2.1: Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP	
2.1.1	Awareness of the necessity for the accurate transfer of information on HIV/AIDS to learners
2.1.2	Recognising learners' ignorance and lack of knowledge of HIV/AIDS
2.1.3	Ability and/or challenges to teach, approach or handle learners, affected by or infected with HIV/AIDS, in the classroom
2.1.4	Necessity of being a role model
2.1.5	Importance of community education and engagement
2.1.6	Further development and support of educators with regard to HIV/AIDS and/or other relevant issues
Sub-theme 2.2: Personal experiences of students related to HIV/AIDS	
2.2.1	'HIV/AIDS, whatever'
2.2.2	Positive, empathetic and personal growth regarding HIV/AIDS

Theme 1
Student experiences regarding curriculum issues in the piloting of the HEAIDS HIV/AIDS TEPP

In this section, I report on the results related to curriculum issues students experienced concerning the HIV/AIDS TEPP. Theme 1 comprises two sub-themes i.e. (1.1) Module content, and (1.2) Module format.

Sub-theme 1.1: Module Content

I commence this section by presenting students' perceptions of the theoretical basis of the HIV/AIDS TEPP. Thereafter, I refer to beneficial information and resources that students obtained from the HIV/AIDS TEPP. Next, I report on the students need to adapt the HIV/AIDS TEPP to suit different levels of knowledge and/or teaching phases. Lastly, I discuss the perceived lack of step by step guidelines within the HIV/AIDS TEPP. Table 4.2 presents the categories as well as the inclusion and exclusion criteria that were applied in the data analysis to ascertain the constituents of this sub-theme.

TABLE 4.2: CATEGORIES AS WELL AS INCLUSION AND EXCLUSION CRITERIA PERTAINING TO THE SUB-THEME *MODULE CONTENT*

Sub-theme		Categories	
1.1	Module content	1.1.1	Solid theoretical basis
		1.1.2	Useful information and resources
		1.1.3	Adapt for different knowledge levels and/or teaching phases
		1.1.4	Lack of teaching application guidance
Inclusion criteria		Data related to the usefulness and limitations of the module content and related resources	
Exclusion criteria		Data related to the module format as well as personal and professional worth of the module content	

Category 1.1.1: Solid theoretical basis

Data reflected that students viewed the theoretical basis of the HIV/AIDS TEPP as a strength. Students indicated that the theoretical content provided them with sufficient theoretical knowledge base as indicated by the following statements:

- ‘... they give a lot of theoretical examples’ (P¹²1, Focus group, Line 25)¹³.
- ‘Because I think the theory behind it is good’ (P3, Focus group, Line 394).
- ‘So I feel we are to some extent now equip with factual knowledge to go on’ (P3, Individual interview 1, Line 176).

Abovementioned statements echoed literature indicating the need for HIV/AIDS education to be informed by theoretical, evidence based knowledge (Jansen, 2007; Ntombela *et al.*, 2008; Toohey, 1999; UNAIDS, 2009b). Provision of accurate HIV/AIDS information, in an appropriate format, seems to be essential for an HIV/AIDS programme (Bacus, 2008; Griesel-Roux, 2005; Jansen, 2007; Kelly, 2002; Marcus, 2002; Mpofu *et al.*, 2008; Ntombela *et al.*, 2008; UNAIDS, 2009b). I noted that the HIV/AIDS TEPP appeared to provide the necessary theoretical base for students. The factual knowledge provided was viewed as a necessary platform from which additional knowledge and skills could be acquired. However, in agreement with existing literature (Melkote *et al.*, 2000), theoretical factual knowledge alone seemed insufficient to engage students on a personal level concerning HIV/AIDS. In this regard, the need for alternative teaching and learning methodologies were emphasised (see category 1.2.2).

¹² P: Participant

¹³ The Afrikaans verbatim responses, used in Chapter 4, were translated into English. See Addendum D.

Category 1.1.2: Useful information and resources

The current category related to HIV/AIDS information and resources students deemed beneficial for future use. Resources included scenarios, examples, information for teachers and learners, pictures as well as worksheets. It appeared that information and resources were put forward in a well structured manner, ready for easy classroom use. The following excerpts provide examples of students' views concerning information and resources in the HIV/AIDS TEPP:

- *'There were ... scenarios' (P4, Focus group, Line 71).*
- *'... a lot of it is very useful, one can really use it' (P1, Focus group, Line 115).*
- *'... there is a lot of interesting stuff and the picture stuff is very nice and mmm through those pictures... it is a good way, I can for example use it in the classroom if you don't know how to talk about it, then you can use it...'* (P6, Individual interview 2, Line 54).
- *'... it is structured...'* (P6, Individual interview 2, Line 129).

Furthermore, it seemed that information and resources, especially for foundation phase teachers, were positively received as illustrated in the following extracts:

- *'I think one aspect of the module that was effective, is that in that especially, in the book with the reader, there was a lot of examples of different ages and how you can apply it with different age-groups'* (P3, Focus group, Line 152).
- *'... how you can teach it to different age-groups. Because all the worksheets and stuff are different and I think it is on the child's level, then you can, then it is easier on the child's level, since you can explain what it is to a child under the age of nine, where that entire module has a lot of very good examples and worksheets...'* (P2, Focus group, Line 253).

The above excerpts were in line with research highlighting the importance and benefits of providing teachers with quality resources including teacher manuals containing detailed information on and instructions for HIV/AIDS lessons and activities (Lindau *et al.*, 2008; Mukoma *et al.*, 2009; UNESCO, 2008b). Limited access to and a lack of resources have been associated with ineffective HIV/AIDS programme implementation (Bacus, 2008; Chen *et al.*, 2004; Mufune, 2008; Plummer, Wight, Wamoyi *et al.*, 2007; Visser, 2005; Webb & Gripper, 2010). I discovered that students were impressed with the quality of information presented and resources provided in the HIV/AIDS TEPP. Scenarios, activities and worksheets supplied

in a structured, easy-to-use reader were indicated as a valuable tool that could be utilised to address HIV/AIDS issues. Resources, especially for foundation phase teachers, were seen as beneficial to teach young learners about HIV/AIDS since it took the developmental levels of learners into consideration. The developmental level of learners is a strong predictor of the manner in which learners may understand HIV/AIDS and should be carefully considered (Carl, 2002; Van Dyk, 2008).

Category 1.1.3: Adapt for different knowledge levels and/or teaching phases

Students expressed what they believed were benefits of adapting the HIV/AIDS TEPP for different levels of knowledge and teaching phases. From the students' perspective, the requirements for different teaching phases (i.e. foundation, intermediate senior or FET phases) necessitate specialised knowledge and information for each specific phase. The following statements reflect instances in which students called for the adaptation of the HIV/AIDS TEPP for different knowledge levels and/or teaching phases:

- *'Yes, if he knows that this specific group of students in front of him knows a lot of, or doesn't know a lot of it, has it under control, then he can focus for example a lot more on listening skills' (P2, Focus group, Line 432).*
- *'... if the program continues longer it might be an idea to make it more contexts specific...' (P5, Focus group, Line 446).*
- *'I think it is very effective, but I think there is one problem and that is we don't all necessarily study the same phase and the content of each phases differ... I don't know how they are going to solve it, but I think it is a major problem' (P4, Focus group, Line 436).*
- *'Can't one sort of, like, phase specialised, like what, phase specialised, sort of say... this is HEAIDS for foundation phase, intermediate phase, senior phase... your need for this, is entirely different' (P2, Focus group, Line 453).*

The abovementioned extracts link up with what is highlighted by Carl (1995, 2002) and Geysers (2004) proclaiming that previous experiences and existing knowledge of students should be taken into consideration as well as Norris, *et al.* (2007) proclaiming that an HIV/AIDS programme cannot be 'one size fit all'. HIV/AIDS programmes need to recognise prior learning and should be adapted to student's current knowledge level to increase motivation and interest as well as limit issues such as HIV/AIDS fatigue by preventing replication and duplication in a course. The positioning of students' knowledge is as

important as content (Francis, 2010; Jansen, 2007). In addition, an HIV/AIDS programme should be topical with regard to the needs, language as well as the population characteristics of the students (Carl, 1995; Carl, 2002; Geysers, 2004; Griesel-Roux *et al.*, 2005; Kelly, 2002; Nsubuga & Bonnet, 2009; Shepherd *et al.*, 2010; UNAIDS, 2009b; Wood, 2008). In conclusion, I found that an HIV/AIDS programme should be specifically designed for the knowledge level as well as phase or area in which students are specialising to provide students with the necessary knowledge on presenting HIV/AIDS information to their specific audience. Appropriate and sufficient teaching resource materials should also be developed for each specific phase since the needs of each phase are different.

Category 1.1.4: Lack of teaching application guidance

This category relates to the lack of teaching application guidance as identified by the students participating in the HIV/AIDS TEPP. Although students indicated (sub-theme 1.1) that the content of the HIV/AIDS TEPP provided a solid theoretical framework, students emphasised the need for application examples or step by step guidelines on how theory can be applied in a practical manner. The following contributions were made by the students in this regard:

- *'... but there isn't really any practical examples to tell you this can happen and if it happens then you have to do this' (P1, Focus group, Line 26)*
- *'I think proposals were made of how one can handle a situation, but no practical examples of how one can apply it' (P3, Focus group, Line 57).*
- *'... there were very little practical applications in the module... an idea could be to give broad guidelines on a practical level...' (P5, Focus group, Line 359).*
- *'... and also specific guidelines that say, like the specific guidelines for child abuse. Exactly that sort of thing that tells you, you should do this when you find that out and these are the steps you should follow' (P2, Focus group, Line 477).*

I uncovered the need for additional practical examples as well as step by step guidance (i.e. specific steps that can be taken when identifying or dealing with HIV/AIDS infected or affected learners). The HIV/AIDS TEPP provided sufficient theoretical knowledge. However, the practical application of such knowledge (i.e. examples of how to apply knowledge and information) seemed lacking. Existing literature supports the need for HIV/AIDS guidelines and examples in dealing with HIV/AIDS (Chen *et al.*, 2004; Patel, Branch, Gutnik & Arocha, 2006; Plummer, Wight, Wamoyi *et al.*, 2007; UNAIDS, 2009b). In South Africa, numerous education policies (DoE, 1999; DoE, 2000; DoE 2007b) address HIV/AIDS. Nonetheless, it

seems that specific step by step guidelines which may enable teachers to deal practically with HIV/AIDS are still required. I therefore conclude that more practical examples and clear guidelines need to be incorporated into HIV/AIDS programmes and materials to equip teachers to deal with difficult situations effectively and ethically (Sileo *et al.*, 2008).

Sub-theme 1.2: Module format

In this section, I provide data relating to concerns surrounding the duration and timing of the HIV/AIDS TEPP. I highlight the need for alternative teaching and learning methodologies and conclude the section with a discussion on lecturer-student challenges. Table 4.3 presents the categories as well as the inclusion and exclusion criteria that were applied in the data analysis to ascertain the constituents of this sub-theme.

TABLE 4.3: CATEGORIES AS WELL AS INCLUSION AND EXCLUSION CRITERIA PERTAINING TO THE SUB-THEME *MODULE FORMAT*

Sub-theme		Categories	
1.2	Module format	1.2.1	Concerns surrounding the duration and timing of the module:
			1.2.1.1 Duration of module
			1.2.1.2 When to implement during a course
			1.2.1.3 Lack of in-depth exploration
		1.2.2	Need for alternative teaching and learning methodologies:
			1.2.2.1 More interactive and participatory lecturing
			1.2.2.2 Include real life experiences
			1.2.2.3 Lack of and need for practicals
		1.2.3	Challenges related to lecturer and student issues:
			1.2.3.1 Class size
1.2.3.2 Role of lecturer			
Inclusion criteria		Data which suggest or describe challenges relating to the module format in terms of timing, teaching and learning methodologies as well as lecturer and learner issues	
Exclusion criteria		Data which suggest or describe recommendations or challenges surrounding the module content and/or any additional personal experiences students encountered	

Category 1.2.1: Concerns surrounding the duration and timing of the module

The first major focus of sub-theme 1.2 (i.e. Module format) suggests that students experienced concerns surrounding the duration and timing of the HIV/AIDS TEPP. As discussed in Chapter 1, the HIV/AIDS TEPP was presented as part of a third-year undergraduate education module (Education 364). Most students seemed to agree that the duration of EDU 364 was brief. The following statements supported this argument:

- *'But the seven weeks are not enough...' (P1, Focus group, Line 68).*
- *'... maybe the module was a bit too short' (P5, Focus group, Line 407).*
- *'... seven weeks are a very short time to address anything... and it is also only once a week, it isn't seven, yes, it was too brief' (P2, Focus group, Line 419).*

EDU 364 was a seven-week module. Time limitations, from the outset, thus seemed to present a major issue since the amount of work needed to be covered was extensive. Literature indicates that content for any module may be selected to give students a representative picture of a field. However, the opportunity for meaningful investigation can be sacrificed in order to cover necessary content (Toohey, 1999). The notion of sufficient time allocation for an HIV/AIDS programme is emphasised by existing literature since time tends to be the factor that sorts out what is most valued (Kinsman *et al.*, 2001; Njue *et al.*, 2009; Toohey, 1999; UNAIDS, 2009b; Van den Berg, 2008). Similarly, the data gathered in the current study signified the necessity of adequate implementation time of HIV/AIDS programmes. I discovered that in order to allocate sufficient time to the HIV/AIDS TEPP it would be preferable to present it over an extended period, which leads to the conclusion that the time allocation should be revised.

Students expressed uncertainty about whether the HIV/AIDS TEPP should be presented during the third year of a degree. Most students agreed that the third study year was particularly demanding academically and advocated for the implementation of the HIV/AIDS TEPP in the first year of a degree as captured in the following extracts:

- *'... if we could do it in the first year? Because now it is at the end, it is such a rush and you only want to finish everything... you do not absorb as much, but in your first year, you are eager... you study a lot in your first year, everything was new and you get involved in everything and want to be part of everything and I think in our first year you have more time than, in the third year everything is crammed in, and so on' (P1, Focus group, Line 630).*

- *'... even in our first year, then we can use that knowledge and build on it to make it a lifelong process' (P3, Individual interview 1, Line 173).*
- *'Well honestly I think they should present it in the first year... you recall your knowledge from the first year... and I think you should do it at the beginning of the first year' (P6, Individual interview 2, Line 133).*

The time scheduling of a module (i.e. when a module is implemented during a year) is crucial (Carl, 2002). I found that an HIV/AIDS programme should rather be operationalised early on in a year when students may be proactive and willing to engage with the information and materials presented. Furthermore, it emerged that HIV/AIDS programmes should be implemented during the first year of teacher training. Although limited research exists regarding the timing of HIV/AIDS programmes in HEI, Bezuidenhout and Summers (2009) proposed that HIV/AIDS programmes should be part of undergraduate curriculum at HEI and Sukati *et al.* (2010) came to the conclusion that all first-year students should be exposed to HIV/AIDS education. Aforementioned literature therefore supports the findings in the current study.

Timing issues concerning the EDU 364 module, as discussed above, may have resulted in a superficial exploration of the HIV/AIDS TEPP. The following excerpts illustrate the previously mentioned statement:

- *'... I think that led to the fact that a lot of the stuff was attended to superficially, since a lot of the stuff was only mentioned quickly' (P5, Focus group, Line 407).*
- *'... we did not discuss it in much detail in the class... and it was, according to me, rushed' (P6, Individual interview 2, Line 51).*
- *'That is why they rushed through it because there isn't time' (P6, Individual interview 2, Line 163).*

Due to the lack of time allocated to the HIV/AIDS TEPP an in-depth presentation of the module seemed difficult to achieve which may have hampered the effectiveness of the HIV/AIDS TEPP. In support, existing literature indicates that insufficient time allocation can cause incomplete implementation as well as superficial coverage of HIV/AIDS content and activities (Kinsman *et al.*, 2001; Njue *et al.*, 2009; UNAIDS, 2009b). In crowded curricula, HIV/AIDS education may receive little attention supporting the view that HIV/AIDS programmes should not be an add-on, isolated or separate issue (UNAIDS, 2009b; Webb & Gripper, 2010).

Category 1.2.2: Need for alternative teaching and learning methodologies

Most students underlined the need for a range of different teaching and learning methodologies. The desire to interact with knowledge and be part of the meaning-making process through, for instance, role plays, was expressed. Visual materials, for example a DVD appeared to capture attention and brought an emotional (affective) dimension to the lectures. The following statements indicated the necessity to make use of interactive and participatory teaching and learning methods:

- *'We also did examples in the class, we did role plays (P4, Focus group, Line 73). 'We didn't. That can help' (P1, Focus group, Line 75).*
- *'... such examples of role play or even just informal debate of what you say should have been done, must we do it this or that way, then you get more insight and it helps you to think a bit more critical about the situation...' (P3, Focus group, Line 96).*
- *'Yes, the information was basically just statically delivered to us' (P1, Focus group, Line 102).*
- *'... as introduction to the module show the DVD, so that you already have somebody's, everybody's attention...' (P3, Focus group, Line 572).*
- *'... we watched a video, that video was rather touching... stuff like that is actually a nice way to tell people' (Participant 6, Individual interview 2, Line 98).*

The above statements by students were consistent with literature stating that HIV/AIDS curriculum implementation must be interesting and engaging to bring about the relevance of HIV/AIDS in a new and dynamic manner (Bacus, 2008; Francis, 2010; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; King in Page, 2004, p. 23; Marcus, 2002; Shepherd *et al.*, 2010; Sukati *et al.*, 2010). Corresponding with existing literature (Jansen, 2007; Sukati *et al.*, 2010) it seemed that the static deliverance of HIV/AIDS information was not as beneficial as alternative teaching and learning strategies (Bacus, 2008; Buthelezi *et al.*, 2007; De Lange & Stuart, 2008; Griesel-Roux *et al.*, 2005; King in Page, 2004, p. 23; McLean & Hiles, 2005; Njue *et al.*, 2009; Sukati *et al.*, 2010; Toohey, 1999; Torabi *et al.*, 2000). Interactive and participatory teaching and learning methods (e.g. role plays) as well as modelling (e.g. DVD) appeared to enhance HIV/AIDS education. Students seemed more receptive and responsive to information on HIV/AIDS using such methods. The implementation of interactive and participatory teaching and learning methods as well as modelling appeared essential to allow students to engage with HIV/AIDS information and acquire new skills actively (Plummer, Wight, Wamoyi *et al.*, 2007; Schunk, 2008; UNAIDS, 2009b).

The value of alternative teaching and learning methodologies was further supported by statements regarding the need to interact with people infected with or affected by HIV/AIDS:

- *'... I think being exposed to people who are ill, is also very important, so that they can personally explain "this is how I feel now, this is what I am struggling with", because people who are not in that position, do not have a clue what it is all about... if you know what that person is experiencing, then you can image their position and handle the situation accordingly. Because from children to adults have it, so I think it is very important to realise what that person is experiencing' (P1, Focus group, Line 513).*

Literature corroborates the inclusion of incidents from real life (e.g. personal contact with HIV-positive patients, presentations by HIV-positive individuals or local HIV/AIDS experts) in order to provide opportunities for students to personalise information and experience another persons' position vicariously (Burr *et al.*, 2006; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; Marcus, 2002; Smylie *et al.*, 2008; Sukati *et al.*, 2010; Toohey, 1999).

Some students suggested the inclusion of a practical component in the HIV/AIDS TEPP in order to actively apply the theoretical knowledge gained. Students indicated that information necessary to become involved on a practical level, was not readily available which may have impeded practical engagement in a formal or informal manner. The lack of practicals and relevant information concerning voluntary work is indicated in the following statements:

- *'... there weren't a lot of practicals' (P4, Focus group, Line 45).*
- *'Even though we know we want to do something, we don't know where to start and we don't always know the places' (P3, Focus group, Line 592).*
- *'... it has so much more value than a theoretical classroom where you sit and say here this and this, if you can experience it with all your senses, see it and understand... I think it gives much more value...' (P2, Focus group, Line 610).*
- *'... if you have exposure and you are actually in the presence of those people or children, you can begin to think this is how I should take action because I have firsthand experience of the situation and the persons' circumstances and experiences...' (P3, Focus group, Line 620).*

The theoretical knowledge base presented in the HIV/AIDS TEPP appeared sufficient, however opportunities for students to apply this knowledge on a practical level seemed to be lacking. Practical experiences may provide students with the opportunity to internalise theoretical information by applying knowledge and skills gained and engage with information

in a hands-on manner (i.e. enactive learning). Current literature supports that compulsory or elective practicum and relevant site visits should be encouraged (Ongunya *et al.*, 2009; Sukati *et al.*, 2010). Structured and meaningful learning experiences through practicum and feedback may lead to competent performance (Toohey, 1999). Furthermore, relevant information with regard to NGOs, businesses, churches, local health centres and other community organisation should be supplied for students who wish to volunteer or get personally involved (Griesel-Roux, 2005; Kelly, 2002; UNAIDS, 2009b).

Category 1.2.3: Challenges related to lecturer and student issues

Challenges concerning lecturer and student issues, included class sizes and the role lecturers played in the presentation of HIV/AIDS TEPP content. Smaller classes seemed to be preferred by students in order to immerse themselves in content. However, students appeared to believe that class size should not limit learning experiences. The following comments provide examples of challenges concerning class size:

- *'Yes, we were ten, so easier' (P5, Focus group, Line 138).*
- *'... we've almost been 160 in a lecture hall, so you cannot say, when you speak the rest will be quiet it is mutual respect situation and it works when you do it together, especially if it is something interesting, so it can become a very interesting and heated debate, so people want to hear what the other person has to say, so I think it is possible, even if it is a large class' (P2, Focus group, Line 140).*
- *'And in a large class one can work in smaller groups, there is always possibilities one can apply in a larger group, so I think it isn't necessarily about how many students is in the class, there is always an alternative' (P3, Focus group, Line 146).*

It seems that in larger classes (in which the HIV/AIDS TEPP was implemented) limited interactive and participatory teaching and learning methods were employed. This could have lessened the impact of the information presented, since learners were only passive receivers of knowledge (Jansen, 2007). Although Mukoma, *et al.* (2009) denote that large class sizes may hinder student's enthusiasm when HIV/AIDS programmes is implemented, class size was not identified as a factor necessary for effective HIV/AIDS education in the current study. Rather, the manner in which HIV/AIDS information was presented (confirming the need for participatory teaching and learning methods as discussed previously) as well as the way lecturers managed larger classes (e.g. employing cooperative learning or small groups) were identified as factors necessary for effective HIV/AIDS education.

Linking with the previous categories, students seemed to place the responsibility of interactive and participatory teaching and learning on lecturers presenting the HIV/AIDS TEPP. Essentially, this may imply that students expect lecturers to provide them with the opportunity to fully engage with the content of a module as illustrated in the next statements:

- *'... it all depends on how the module is presented, because it is the same if you as the teacher listen to that child, we are also "children" in the lecturer's class... this theoretical knowledge in this book may be correct and good and all, but if the lecturer or teacher cannot present it in a correct or practical manner, then a lot of it will be lost' (P1, Focus group, Line 88).*
- *'... what a lot of lecturers see as interactive isn't necessarily an interactive lecture to me' (P3, Focus group, Line 379).*
- *'... I would say it is the lecturer's responsibility to create a few more opportunities for us, create more opportunities, not only statically transmitting knowledge to us, but to create opportunities for us to expand our own knowledge and become more involved' (P3, Individual interview 1, Line 152).*

The important role of lecturers, as indicated in above, correlates with much of what is published in terms of the role of lecturers (or teachers) in the teaching and learning process. As choreographers of teaching events, lecturers should facilitate relevant learning opportunities that will meet the needs of students and develop problem solving and decision-making skills. Lecturers should further encourage discussion, active classroom participation and create an atmosphere promoting critical thinking, discovery of knowledge and reflection (Carl, 2002; Tanner & Tanner, 2007). Lecturers should therefore be properly trained to utilise interactive and participatory methods, especially concerning HIV/AIDS education (Ahmed *et al.*, 2006; Kinsman *et al.*, 2001; Njue *et al.*, 2009; UNAIDS, 2009b). In conclusion, HEI staff development should also reinforce lifelong learning and continuous professional development to improve lecturers' knowledge, skills and attitudes (Le Grange *et al.*, 2006).

Theme 2

Student professional and personal experiences regarding HIV/AIDS

In this section, I present the results demonstrating students' professional and personal experiences regarding HIV/AIDS. Two sub-themes emerged from an analysis of the main theme i.e. (2.1) Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP, and (2.2) Personal experiences of students relating to HIV/AIDS.

Sub-theme 2.1: Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP

In this sub-theme, I discuss students’ awareness of the necessity for accurate transfer of information about HIV/AIDS to learners. In addition, data relating to students’ recognition of learners’ ignorance and lack of knowledge about HIV/AIDS are examined. I further deliberate on reported competencies and challenges students experienced with regard to teaching, approaching or dealing with learners affected by or infected with HIV/AIDS. I also report on the significance of teachers as role models and the importance of community engagement surrounding HIV/AIDS issues. Lastly, I explore data concerning the need for continuous teacher development and support with regard to HIV/AIDS. Table 4.4 presents the categories as well as the inclusion and exclusion criteria that were applied in the data analysis to ascertain the constituents of this sub-theme.

TABLE 4.4: CATEGORIES AS WELL AS INCLUSION AND EXCLUSION CRITERIA PERTAINING TO THE SUB-THEME *DEMONSTRATION OF COMPETENCE AND RESPONSIBILITY OF STUDENTS AFTER EXPOSURE TO THE HIV/AIDS TEPP*

Sub-theme:		Categories	
2.1	Demonstration of competence and responsibility of students after exposure to the HIV/AIDS TEPP	2.1.1	Awareness of the necessity for the accurate transfer of information on HIV/AIDS to learners
		2.1.2	Recognising learners’ ignorance and lack of knowledge of HIV/AIDS
		2.1.3	Ability and/or challenges to teach, approach or handle learners, affected by or infected with HIV/AIDS, in the classroom
		2.1.4	Necessity of being a role model
		2.1.5	Importance of community education and engagement
		2.1.6	Further development and support of teachers with regard to HIV/AIDS:
			2.1.6.1 Support network or discussion group
		2.1.6.2 Being a lifelong learner	
Inclusion criteria		Data which suggest or describe students’ competence in teaching and/or addressing HIV/AIDS in the classroom, importance of role models and community involvement as well as continuous professional development	
Exclusion criteria		Data which suggest or describe any personal competence or attitude changes relating to HIV/AIDS as well as module content or format	

Category 2.1.1: Awareness of the necessity for the accurate transfer of information on HIV/AIDS to learners

After exposure to the HIV/AIDS TEPP students seemed to demonstrate awareness of the value of accurate transfer of information about HIV/AIDS to learners. Students indicated that provision of accurate information to teachers and learners might limit stigma and discrimination of infected or affected learners. The following extracts provide examples of students' awareness of the necessity to inform learners through accurate information:

- *'... I feel in a certain way it is necessary to make children aware of the realities and facts of HIV/AIDS... it is your duty as teacher to mention the facts so that everyone is aware of it...' (P3, Focus group, Line 154).*
- *'... one must explain it to them, what exactly it is and you cannot if your friend and if your friend hurts himself, you must call your teacher. You should not try to doctor him yourself, but otherwise nothing will happen to you. He isn't any different than you' (P2, Focus group, Line 176).*
- *'So to make the teacher aware and then by means of the teacher make the children aware of it is very important' (P1, Focus group, Line 230).*

Contradictory to childhood innocence discourses (Bhana, 2008) indicating that teachers may find it difficult to provide sexuality and HIV/AIDS knowledge in primary schools, students appeared willing to teach primary school learners about HIV/AIDS with appropriate resources. Students further seemed aware of the responsibility teachers have to inform learners about HIV/AIDS through the use of accurate information. The abovementioned statements made by students, echoed literature that a genuine understanding of HIV/AIDS within the South African context needs to be enhanced through the early provision of comprehensive and accurate HIV/AIDS information, knowledge and skills (Beckmann & Prinsloo, 2007; Bhana, 2007; De Kock & Wills, 2007; Jansen, 2007; Kelly, 2002; UNAIDS, 2009b). The education sector and teachers have a responsibility to equip learners with appropriate knowledge, skills, attitudes and values that will reduce the likelihood of acquiring or transmitting HIV (Kelly, 2002; Van Laren, 2007).

Category 2.1.2: Recognising learners' ignorance and lack of knowledge of HIV/AIDS

Students expressed their concern about primary school and secondary school learners' lack of knowledge as well as their ignorance relating to HIV/AIDS. Students further acknowledged

the discrimination and stigmatisation that may take place due to limited or inaccurate knowledge. In the following statements, students reflected on their views and experiences with learners' lack of knowledge and ignorance regarding HIV/AIDS:

- *'... a grade five learner the other day... still thinks that AIDS is transmitted by sneezing... so that is also why they have this misconception, "I am not going to play with him because if he sneezes on me, then I'm going to get his germs"... children do not know where, how it works' (P2, focus group, Line 168).*
- *'Because what often happens is that the child is stigmatised and this person now has AIDS and he hides away and nobody wants to play with him. I think if you can, in the first place, make that mind shift in the classroom' (P5, Focus group, Line 183).*
- *'... general ignorance of AIDS also plays a very big role...' (P5, Focus group, Line 196).*

With regard to existing literature, this category appears to correlate with much of what is published in terms of stigma, discrimination, denial, myths and superstition thriving in an environment of ignorance and limited knowledge which may hamper educational efforts and put learners at risk of becoming HIV/AIDS infected (Bacus, 2008; Jansen, 2007; Pharaoh, Frantz & Rhoda, 2007; UNAIDS, 2009b; Van Dyk, 2008; Zhang *et al.*, 2008). I therefore conclude that students demonstrated competence and responsibility by being aware of learners' lack of knowledge and ignorance as well as identifying the importance of providing learners with accurate information regarding HIV/AIDS.

Category 2.1.3: Ability and/or challenges to teach, approach or handle learners, affected by or infected with HIV/AIDS, in the classroom

The HIV/AIDS TEPP seemed to enhance students' skills and confidence to identify and address the needs of learners as well as their ability to teach, approach or deal with HIV/AIDS issues. Confidence in skills and abilities were demonstrated through the way in which students voiced the manner in which they would approach learners in need or teach HIV/AIDS content as captured in the following contributions:

- *'... you can first chat with him for a while and if you find out that it is serious you can take action like, a professional person, but to go to professional person directly... to give to a professional person and say speak to the child, then it is a new person for the child to deal with' (P2, Focus group, Line 17).*

- *‘But I think if you have a good relationship with your learners the person may feel sort of comfortable to speak about it. Or you can even do an activity with them, like a nice playful activity to bring it forth... so in a playful manner it might surface’ (P4, Focus group, Line 41).*
- *‘But with small children, they might not know a lot... but just first of all make them aware that this person is just a little ill, it is not that the person must be kicked out, it is a friend and just like your other friends who can get a cold or something now and again, this person is still your friend’ (P5, Focus group, Line 197).*
- *‘... it is easier to explain to them that these little soldiers come along to fight the disease... to explain it to them in such a manner is much easier than just to say listen here “this, this, this” is not going to work with a child under nine’ (P3, Focus group, Line 261).*
- *‘... understand that if it comes your way that you, that you will be able to deal with it’ (P6, Individual interview 2, Line 114).*

Confirming existing literature (Chen *et al.*, 2004; Helleve, Flisher, Onya, Kaaya, *et al.*, 2009; Lindau *et al.*, 2008; Mathews *et al.*, 2006; Mukoma *et al.*, 2009; Theron, 2008a), it appeared that exposure to HIV/AIDS education enhanced students’ basic knowledge, skills and confidence levels when dealing with HIV/AIDS. I found that students seemed willing to engage with learners with regard to HIV/AIDS issues and to identify as well as address the psychosocial needs of learners infected with or affected by HIV/AIDS demonstrating positive and supportive attitudes after exposure to the HIV/AIDS TEPP. In addition, current literature (Nodding, 2010) is in agreement with students on the necessity to build positive relationships between learners and teachers to address challenges central to learners’ lives.

Alternatively, students also identified challenges they might still struggle with even after the completion of the HIV/AIDS TEPP. Students suggested that a lack of in-depth knowledge and skills may limit their abilities to effectively deal with challenges and address the needs of learners as reflected in the following comments:

- *‘... if you feel something is funny or not kosher with the child, then you must ask the advice of a remedial teacher because... if you do not have the knowledge you cannot handle the situation’ (P1, Focus group, Line 4).*
- *‘... in a way this place the teacher in a very difficult situation and with knowledge you do not necessarily know how to apply’ (P3, Focus group, Line 62).*
- *‘I think, I’m Jack of all trades and master of none...’ (P3, Focus group, Line 450).*

- *'That the teacher know what to do because I think if we walk out of here we must be teachers, all of a sudden, first a student and now all of a sudden a teacher and everybody expects of you, yes ok, if this happens what happens now. And that is what they are supposed to teach us. Why else did we study for four years than to know, yes you have the knowledge, you obtained 80% in the exams, but you don't really know... I think teachers should be equipped'* (P2, Focus group, Line 483).

The quality of teacher training regarding HIV/AIDS is questioned both in existing literature (DHET, 2010; Loots & Mnguni, 2007) and by the above statements. Teachers may have the desire to help, but feel inadequately equipped, with a lack of self-efficacy, to make a real difference in the lives of learners (McGinty & Mundy, 2009; Wood & Hillman, 2008). The prerequisite and value of HIV/AIDS education for teachers to deal competently with HIV/AIDS issues are stressed in research (Ahmed *et al.*, 2006; Dawson *et al.*, 2001; Griesel-Roux, 2005; Mathews *et al.*, 2006; Mufune, 2008; Mugimu & Nabadda, 2009; Nsubuga & Bonnet, 2009; Ongunya *et al.*, 2009; Plummer, Wight, Wamoyi *et al.*, 2007). The above statements made by students are echoed in literature questioning whether teachers possess the necessary skills, competencies and confidence to fulfil the roles allocated to them, particularly the pastoral role (DHET, 2010; Loots & Mnguni, 2007).

In addition, some students reiterated different points of views on the integration of HIV/AIDS subject matter into their classrooms as seen in the following extracts:

- *'... I wouldn't necessarily just HIV or AIDS... just focus on it alone, I would rather try to integrate it with some of the other learning areas so that it can be taught in a more subtle manner than the way, we are now doing this whole topic and now we are going to sit down and listen and we are now doing all the facts about it. A person should more, like life orientation, and stuff like that, you should rather integrate it more in that way then there isn't so much emphasis on it, because I think if you only focus on it, then the child, he may sit there actually very self-conscious, since he is being discussed here, instead of the situation being handled in a more subtle way'* (P3, Focus group, Line 234).
- *'So I would integrate it with the curriculum and... I would very much like to bring it into my class'* (P3, Individual interview 1, Line 187).
- *'... but I think the challenge could be, they expect one must incorporate it into all the modules and I don't want to do that because I know how it felt when I was at school*

and they wanted to integrate it into everything and I don't like it' (P6, Individual interview 2, Line 83).

Literature (Kelly, 2000; Ongunya *et al.*, 2009; UNAIDS, 2009b; Van Laren, 2007) confirms abovementioned statements that there are varied opinions about the place of HIV/AIDS in the school curriculum and that the integration of HIV/AIDS across the curriculum is not an easy matter. Although students indicated a possible increase in abilities and knowledge after exposure to the HIV/AIDS TEPP, not all students felt adequately equipped to effectively deal with difficult situations or integrate HIV/AIDS information into the classroom thus corroborating existing literature in this regard (De Lange & Stuart, 2008; McGinty & Mundy, 2009; Wood & Hillman, 2008). The necessity for teachers to be trained to integrate life-skills education into subjects is emphasised by Wood and Hillman (2008). However, teacher's reluctance, personal convictions, preferences and lack of commitment may hamper HIV/AIDS integration (Ahmed *et al.*, 2009; Bacus, 2008; Van den Berg, 2008; Visser, 2005).

Category 2.1.4: Necessity of being a role model

Students seemingly believe that teachers (especially in primary education) may have a substantial impact on learners. This belief is indicated in the statements below:

- *'I think... you don't necessarily have to persuade others you are not sick anymore you can show it. You can for example, you can touch him lightly when you talk to him and others may see it. Or you can through your relationship with that child, show them that they would not get sick if they played with that child' (P4, Focus group, Line 203).*
- *'Your interaction with the child can make a big difference, because I think especially at a very young age, they idolise their teacher and if you put in a lot of effort with that person, with that child, even if he is sick, I don't think they will listen or not play with him' (P4, Focus group, Line 212).*

Linking with the importance of having adequate relationship with learners, literature supports the need for teachers to be positive role models for learners (Ahmed *et al.*, 2009; Theron, 2005; UNESCO, 2008a; UNESCO, 2008b; World Bank, 2002). Although information is essential, knowledge alone is not sufficient to protect learners against HIV infection or to reduce stigma and discrimination (UNAIDS, 2009b). I found that students identified the responsibility of the manner in which teachers interact with learners, especially during

primary school as imperative. Through their behaviour and interactions teachers can make a difference in reducing stigma and discrimination through vicarious processes (i.e. observation of models) (Lefrancois, 1997; Schunk, 1991; Schunk, 2008; World Bank, 2002). Learners may thus learn appropriate or inappropriate behaviours concerning HIV/AIDS through observing the manner in which teachers teach, address or deal with HIV/AIDS (Lefrancois, 1997; Schunk, 2008), stressing the crucial role teachers have as positive role models.

Category 2.1.5: Importance of community education and engagement

Students emphasized the need to engage and educate communities regarding HIV/AIDS issues. Students appeared to be cognisant of the fact that collaborating with communities, resources could be utilised to assist and make a difference within communities. In the following statements, students reflected on the importance of community engagement and education:

- *'... with AIDS there is so much ignorance about it... people believe a lot of myths and stuff about AIDS and people don't know where the truth begins and where the nonsense begins. So it may be a good idea that people come into contact with that information' (P5, Focus group, Line 534).*
- *'And that is also what they say about inclusive education, it is to make the community part of the whole education system...' (P1, Focus group, Line 556).*
- *'... that people can actually work together as a community and rather try together to get through it instead of leading individually and forgetting about those who have to live under these circumstances' (P3 Individual interview 1, Line 121).*

Similar to literature (Griesel-Roux, 2005; Kelly, 2002; Pengpid *et al.*, 2008; UNAIDS, 2009b) I found that students recognised the importance of community involvement in HIV/AIDS programmes. The importance of community (including parents) education and engagement is echoed in literature which states that society as a whole needs to be mobilised, sensitized and involved to a much greater degree to develop responses to HIV/AIDS (Bacus, 2008; Marcus, 2002; Nsubuga & Bonnet, 2009). Furthermore, HIV/AIDS knowledge and skills learned at school must be reinforced by the community and parents (UNAIDS, 2009b). Involving stakeholders is essential to address issues that may enhance vulnerability, stigma as well as discrimination and contribute to the spread of the epidemic (Beckmann & Prinsloo, 2007; UNAIDS, 2009b; Wood, 2008). Active engagement and establishment of positive relationships with communities may reduce possible resistance to the implementation of

HIV/AIDS programmes (Allemano, 2008; McLean & Hiles, 2005; UNAIDS, 2009b). Pengpid *et al.* (2008) suggest that a standard protocol for parent and community involvement in cultural sensitive life skills and sex education programmes should be developed. Although the benefits of community education and engagement are evident, students and teachers need adequate skills and knowledge to enable them to involve the community. Teacher training therefore needs to equip teachers to involve parents, communities and other stakeholders in HIV/AIDS treatment, care and support (UNAIDS, 2009b). I therefore conclude that community education and engagement are crucial, emphasising the need for teachers to be trained to actively engage communities.

Category 2.1.6: Further development and support of teachers with regard to HIV/AIDS and/or other relevant issues

Even in the presence of reported competence and abilities relating to HIV/AIDS, students stated a need for continuous teacher development and support. Students suggested that discussion or support groups, in which teachers could come together to discuss issues, assist and encourage one another, may enhance teachers' confidence and skill levels. The following excerpts reflect instances in which students encouraged the implementation of support networks or discussion groups:

- *'They have a discussion group or something where they can say, "I don't know, I don't know what to do, this is my problem. Do you perhaps know?"' (P2, Focus group, Line 472).*
- *'... support network, then you can get together once a week and reflect and in that way you can start communicating with each other and start extending the thing...' (P3, Focus group, Line 648).*
- *'In that manner you learn about it and I think then you will also get more confidence to walk into a school knowing ok, I already have experience of this and I know more or less what to do' (P3, Focus group, Line 656).*

From examining existing literature it is clear that teachers need continuous professional and intuitional support to cope with challenges such as HIV/AIDS (Burr *et al.*, 2006; Chen, *et al.*, 2004; Louw, Shisana, Peltzer & Zungu, 2009; Njue *et al.*, 2009; UNAIDS, 2009b; UNESCO, 2008b; Webb & Gripper, 2010). Findings of the current study suggest that support or discussion groups have the potential to enhance teachers' confidence levels, knowledge and competence in dealing with difficult challenges. Supervision, mentoring or support groups

can be peer-led (Bacus, 2008; Griesel-Roux *et al.*, 2005; Smylie *et al.*, 2008; UNAIDS, 2009b) or guidance can be provided by lecturers and supervisors at training institutions (Burr *et al.*, 2006; Chen *et al.*, 2004; Coombe, 2003b; Griesel-Roux, 2005; Kelly, 2002; Plummer, Wight, Wamoyi *et al.*, 2007; UNAIDS, 2009b). Teacher development seems to thrive when teachers are integrally involved, reflecting on their own practice and when employers provide adequate support (DoE, 2007b; Shepherd *et al.*, 2010). I therefore conclude that regular support or discussion groups during teacher training as well as thereafter should be established to give students and/or teachers the chance to reflect, discuss and support one another which may enhance skills, knowledge and confidence to effectively deal with HIV/AIDS.

In addition, students acknowledged teachers' responsibility to be lifelong learners. To demonstrate continuous professional development and enhance competence, teachers need to take on the role as lifelong learners. The following contributions relate to the role of lifelong learning:

- *'I think in all professions there is that thing of lifelong learning like from time to time you think you know what to do but then in practice you don't have an idea what to do and then you battle for the first while. But I think if you constantly attend courses or get outsiders or not be afraid to say I don't know and be eager to know more, learning more, then you will gradually know more' (P4, Focus group, Line 495).*
- *'Now there are a lot of other stuff about lifelong learning which one doesn't know anything about that is focused more on yourself to find out about it' (P1, Focus group, Line 545).*

The presumed need of teachers to be lifelong learners corroborates existing literature (Bhana, 2008; DoE, 2007b; DoE, 2007c) which indicates that teachers have a responsibility to continuously develop their knowledge, skills and competency, especially in areas such as HIV/AIDS, in order to become more confident and comfortable in addressing the needs of learners and communities (Deutschlander, 2010; UNESCO, 2008b). Since it appears that teacher training does not currently provide teachers with sufficient training to deal effectively with challenging issues such as HIV/AIDS (Bacus, 2008; Mathews *et al.*, 2006; Njue *et al.*, 2009; Ongunya *et al.*, 2009; UNAIDS, 2009; Van den Berg, 2008; Webb & Gripper, 2010) the need for continuous professional development and lifelong learning becomes even more crucial.

Sub-theme 2.2: Personal experiences of students related to HIV/AIDS

In this section, I explore categories concerning the personal experiences of students with regard to HIV/AIDS. The influence of HIV/AIDS fatigue is investigated. In addition, the positive, empathetic and personal growth experiences students had with regard to HIV/AIDS is examined. Table 4.5 presents the categories as well as the inclusion and exclusion criteria that were applied in the data analysis to ascertain the constituents of this sub-theme.

TABLE 4.5: CATEGORIES AS WELL AS INCLUSION AND EXCLUSION CRITERIA PERTAINING TO THE SUB-THEME *PERSONAL EXPERIENCES OF STUDENTS RELATED TO HIV/AIDS*

Sub-theme:		Categories		
2.2	Personal experiences of students related to HIV/AIDS	2.2.1	'HIV/AIDS whatever'	
		2.2.2	Positive, empathetic and personal growth regarding HIV/AIDS:	
			2.2.1.1	Increased knowledge, awareness, insight, understanding and reality of the impact of HIV/AIDS
			2.2.1.2	Wanting to make a difference or get involved and the emotional impact thereof
		2.2.1.3	Necessity for positive approaches	
Inclusion criteria		Data which suggest or describe students' personal experiences relating to HIV/AIDS including data referring to HIV/AIDS fatigue, knowledge gained and the need to be involved		
Exclusion criteria		Data which suggest or describe professional competence in addressing or teaching HIV/AIDS and any other data pertaining to professional development or community involvement		

Category 2.2.1: 'HIV/AIDS whatever'

Students felt that the constant emphasis on HIV/AIDS may have triggered HIV/AIDS fatigue. It appeared that students deemed apparent overexposure to HIV/AIDS, in the media, as counterproductive. The bombardment of HIV/AIDS messages and information seemed to cause dissociation from HIV/AIDS issues with the impact of the message to be conveyed lost. The following extracts seemed to indicate desensitisation to HIV/AIDS:

- *'I think it gets so much exposure on the TV and the radio and people are so sick to hear about it that you actually disconnect yourself from it' (P1, Focus group, Line 542).*
- *'Then it is like "AIDS, oh I can't hear about it anymore"' (P1, Focus group, Line 585).*

- *'... so we shut down and they might say those things that are necessary to hear but you don't listen anymore, because it is always and everywhere and in everything and everybody always want to, if somebody comes to school they talk about it' (P6, Individual interview 2, Line 41).*

Furthermore, at the onset of the HIV/AIDS TEPP it appeared that students experienced reluctance towards HIV/AIDS:

- *'Yes, in the beginning when they said this is what the module is about, it was sort of... as if people sighed and said "oh not again"' (P2, Focus group, Line 577).*
- *'I thought and felt must we learn about it once again... one gets so exposed with all this HIV and AIDS stuff that I just thought must we learn about it again and what is there left to learn about. I was rather disheartened, to tell the truth' (P3, Individual interview 1, Line 7).*
- *'Well, probably like everybody else who just didn't want to, because I feel it is overdone and it always gets incorporated into everything and so on' (P6, Individual interview 2, Line 16).*

In addition, a lack of HIV/AIDS personal involvement, exposure or interest may have caused an attitude of detachment from issues concerning HIV/AIDS. Detachment may further instigate resistance to engage or learn about HIV/AIDS when confronted with a module such as the HIV/AIDS TEPP. The following statements illustrate the aforementioned discussion:

- *'... and if you are not involved in or exposed to it, then you are not really interested in it or it don't really concern you' (P1, Focus group, Line 228).*
- *'Honestly I really did not think I needed to know anything else about it, so' (P6, Individual interview 2, Line 30).*
- *'... because why you are always like "oh, AIDS whatever" just go on' (P6, Individual interview 2, Line 46).*

The results of the current study indicate that students may be desensitised towards HIV/AIDS. In existing literature HIV/AIDS fatigue is noted as a challenge to address HIV/AIDS effectively (De Lange & Stuart, 2008; Wood, 2008). Overexposure and continual bombardment of HIV/AIDS messages may create a resistance towards engaging or learning about HIV/AIDS. Contrary to Hadera, *et al.* (2007) students in the current study did not initially seem motivated to learn about HIV/AIDS. Since past experiences are utilised to evaluate, direct or inform new experiences (Bandura, 2002) students could have had the

perception that no ‘new or additional knowledge’ could be gained from the HIV/AIDS TEPP. Reluctance to HIV/AIDS education as well as lack of commitment may hinder teachers in their implementation of HIV/AIDS education or to deal effectively with challenging HIV/AIDS issues (Bacus, 2008; McGinty & Mundy, 2009; Visser, 2005). Therefore, it seems relevant that teacher training should include value clarification modules to enable teachers to address personal values, beliefs, assumptions and attitudes regarding HIV/AIDS (Wood & Hillman, 2008; UNAIDS, 2009b).

Category 2.2.2: Positive, empathetic and personal growth regarding HIV/AIDS

Most students reported growth in affective (emotional) and identity-construction (personal) domains with regard to HIV/AIDS. Students indicated that their personal knowledge base, insight and understanding concerning HIV/AIDS had increased. In addition, it seems as if students became more aware of the reality and impact of HIV/AIDS. Aforementioned claims are reflected in the accounts that follow:

- *‘... I feel it made us aware of what is actually happening’ (P3, Focus group, Line 35).*
- *‘... a lot of the stuff was new to me’ (P1, Focus group, Line 228).*
- *‘For me it personally helped to form a picture in my head of what is really going on. That one actually thinks you are involving everyone in what you are doing, but in a subtle way you discriminate, cut people out. Not only in the classroom, but in life as well. And that just made me think about treating all people in the same way again’ (P4, Focus group, Line 336).*
- *‘I feel one thing that enriched me very much and opened my eyes was that DVD we watched. That was something that really touched me, because that is the reality you actually see and the children and the stuff they have to endure’ (Participant 3, Focus group, Line 562).*
- *‘... then I realised I actually know very little and I thought I knew a lot and I felt I could tell people about it but actually not and people don’t really talk so much about it’ (P6, Individual interview 2, Line 44).*
- *‘Yes, I realise it is huge...’ (P6, Individual interview 2, Line 111).*

Despite the probable presence of HIV/AIDS fatigue, I encountered an increase in students’ knowledge, awareness, insight, understanding and reality of the impact of HIV/AIDS. The abovementioned statements corroborates existing literature demonstrating that HIV/AIDS education improves attitudes and HIV/AIDS related knowledge positively (Cheng *et al.*,

2008; Deutschlander, 2010; Givaudan *et al.*, 2008; James *et al.*, 2006; Li *et al.*, 2008; Maticka-Tyndale *et al.*, 2007; Norr *et al.*, 2007; Shepherd *et al.*, 2010; Smylie *et al.*, 2008; Sukati *et al.*, 2010; Visser, 2005; UNAIDS, 2009b; Webb & Gripper, 2010; Yankah & Aggleton, 2008). The HIV/AIDS TEPP appeared to challenge students to evaluate what they really knew about HIV/AIDS. Although HIV/AIDS fatigue is a serious issue, it seemed as if engagement on affective and identity-construction levels (e.g. through materials such as the emotional filled DVD) may have opposed HIV/AIDS fatigue, making students more willing to engage with social issues such as HIV/AIDS. The latter statement is supported by literature indicating that change and personal understanding (Geyser, 2004) may be facilitated if a connection is made with an individual's emotions (Fan *et al.*, 2007).

Handley *et al.* (2006) denote that meaning is developed through relationships and shared identities. Students' personal meaning-making seemed to increase awareness and insight of the impact and reality of HIV/AIDS. The aforementioned statement correlates with literature which indicates the necessity to involve the whole person when it comes to HIV/AIDS education (Jansen, 2007; Kelly, 2002), since students may actively contribute to their own development (Bandura, 1989b; Schunk, 1991). Supporting current literature (Beckmann & Prinsloo, 2007; Eba, 2007; Theron, 2005; UNAIDS, 2009b) findings of the current study further indicate that an increase of knowledge, awareness, insight and understanding regarding HIV/AIDS appeared to combat stigma and discrimination. Students may embrace or reject learning opportunities due to their current sense of self, since learning is not only developing knowledge or practice but also understanding oneself (Handley *et al.*, 2006). I therefore conclude that by engaging students in affective and identify-construction domains a willingness to engage with HIV/AIDS knowledge was uncovered, indicating that students may perform actions that they believe will result in rewarding outcomes (Schunk, 2008).

Some students expressed feelings of empathy and guilt after exposure to the HIV/AIDS TEPP inspiring them to make a difference in the lives of learners. Visual teaching methodologies (i.e. DVD) further seemed to have an emotional impact on students encouraging students to become involved. The following extracts provide an indication of students' emotions as well as a desire to get involved and make a difference:

- *'... you know what is going on and it sort of leaves you... it let you feel somewhat bad because you are not doing anything. It let you say, gee-wiz I am studying all this stuff and I sort of want to say, it doesn't help doing it in this school here, because you can't say where it is not needed, what you learned must be implemented somewhere,*

where it is really needed. I cannot say, I started feeling guilty because I'm not doing anything about it' (P2, Focus group, Line 344).

- *'... but the moment you see stuff like that (DVD) you cannot help becoming emotionally involved in it' (P3, Focus group, Line 566).*
- *'... you feel so sorry for those children, you actually feel like, you feel you just want to go there' (P1, Focus group, Line 586).*
- *'... you feel guilty, what must you do, how must you get involved' (P3, Focus group, Line 599).*

In addition, to increased knowledge, awareness and insight I found that emotional involvement through the use of interactive engaging materials (e.g. DVD) may motivate students to get personally involved and demonstrated a need to make a difference in the lives of individuals affected by or infected with HIV/AIDS. The latter may show the need to involve students, not only on an academic and intellectual level, but in affective and identity-construction domains as well so that students are engaged wholeheartedly. The aforementioned may motivate students to take an active role to address the HIV/AIDS epidemic (Crewe in Jansen, 2007, p. 7; Kelly, 2002).

Finally, students revealed how positive approaches (as discussed in EDU 364) were applicable when addressing challenges, as indicated by the following extracts:

- *'Just a bit more of a positive outlook, a bit more of what can be done, looking practically to what, to what in you, what you can do' (P5, Focus group, Line 301).*
- *'I think you can also implement it in the classroom to speak constantly about the positive, to focus on that. It helps' (P1, Focus group, Line 328).*

EDU 364 included various positive approaches (e.g. the asset-based approach) as conceptual framework. Students, in the current study, alluded to the benefits of approaching challenging issues from positive approaches. According to positive psychology individuals can more effectively use personal resources to achieve positive life outcomes (Coetzee & Viviers, 2007; Seligman, Steen, Park & Peterson, 2005). Every person has strengths as well as protective factors (i.e. buffers) and HIV/AIDS intervention approaches as well as prevention strategies can therefore focus on how these virtues may be fostered in learners and communities (Coetzee & Viviers, 2007; Seligman *et al.*, 2005). Research (Ebersöhn, *et al.*, 2010; Ebersöhn & Ferreira, forthcoming; Ferreira & Ebersöhn, 2011; Ferreira, Ebersöhn & McCallaghan, 2010; Ferreira, Ebersöhn & Odendaal, 2010) confirm the benefits and need for strength-based

interventions for learners, teachers and communities. I therefore conclude that it seems necessary to include such approaches within HIV/AIDS teacher training programmes to enable teachers to identify and utilise learner and community resources in order to promote resilience (Ebersöhn & Ferreira, forthcoming; Ferreira & Ebersöhn, 2011).

4.3 REVISITING LITERATURE AND SOCIAL COGNITIVE THEORY

In this chapter, I integrated the results with findings related to relevant existing literature to situate the results within the wider realm of research in terms of the topic of enquiry. I further made use of Social Cognitive Theory (Bandura, 1986) to gain an understanding of the findings in a manner meaningful to the research questions. Within the current study, students were thus viewed as agents influencing themselves and their environment by actively contributing to their own motivation, behaviour and development within a system of triadic interacting influences (Bandura, 1989a; Bandura, 1989b; Schunk, 1991).

Findings of the current study support existing knowledge in that the content of an HIV/AIDS curriculum should be based on relevant information and empirical evidence to equip teachers with an adequate HIV/AIDS knowledge base. In addition, findings confirm that teachers should be provided with high quality resources and manuals, containing detailed information on and instructions for HIV/AIDS lessons and activities. Aforementioned, as supported by literature, may improve teachers' self-efficacy beliefs (Bandura, 1986) resulting in greater confidence and comfort when confronted with HIV/AIDS challenges. High self-efficacy has been associated with effective teaching and may determine motivation levels. Teachers with a strong belief in their capabilities seem more likely to deal effectively with HIV/AIDS and address the needs of learners as well as communities as active agents (Bandura, 1989b; Bigge & Shermis, 1999; Schunk, 2008). As in other research studies, the importance to engage and accurately inform learners as well as communities concerning HIV/AIDS in order to eradicate ignorance, stigma and discrimination is highlighted through the current study. The benefits of employing positive strength-based approaches during teacher training as well as with community engagement are confirmed by the current study. On the other hand, as indicated by findings of the current study, students may still feel inadequately equipped to make a real difference or properly integrate HIV/AIDS curricula which can hinder the effective implementation of HIV/AIDS education.

Similar to literature, findings also suggest the need for ample implementation time for HIV/AIDS programmes as well as a range of teaching and learning strategies to ensure in-depth coverage of content and activities. Findings further confirm established requirement for quality HIV/AIDS teacher training (including continuous professional development) with adequate step by step guidelines, real-life encounters and practical opportunities to enhance learning appeal and value of formal HIV/AIDS education. According to the Social Cognitive Theory (Bandura, 1986) students have immense potential that is shaped by direct and vicarious experiences. In the current study, structured and meaningful learning opportunities for students to personalise information through enactive (through doing or direct experience e.g. role play) and vicarious (observational reinforcing experiences e.g. DVD) learning seemed to enhance students' knowledge, motivation, confidence and skills concerning HIV/AIDS. In addition, existing research corroborates the findings of the current study indicating the presence of HIV/AIDS fatigue. Students past experiences concerning HIV/AIDS (e.g. the possible overexposure of HIV/AIDS) may have been used to evaluate, direct and inform new experiences (i.e. the HIV/AIDS TEPP) (Bandura, 2002) leading to possible initial reluctance towards the HIV/AIDS TEPP. Nonetheless, despite the presence of possible HIV/AIDS fatigue, the HIV/AIDS TEPP seemed to have had a positive effect on students' professional and personal knowledge, awareness, attitudes, insight and self-efficacy beliefs concerning HIV/AIDS, supporting existing literature in this regard.

Contrary to literature on teachers' uneasiness regarding HIV/AIDS in classrooms, due to the sensitive nature of the topic, it appeared as if students in the current study were comfortable in communications on HIV/AIDS. However, the discussions took place in a purely academic setting (i.e. interviews). Moreover, opposing to existing literature, religious barriers, cultural and social assumptions or contradictions to personal convictions did not appear to play a conscious role in students' possible initial resistance towards HIV/AIDS education. Furthermore, students acknowledged the enormity of HIV/AIDS and did not voice prejudiced responses towards another culture or race, contrary to existing literature.

New insight concerning the design of HIV/AIDS programmes relate specifically to contradictions pertaining to the adaptation of HIV/AIDS programmes. Although, as existing literature indicates factors such as culture, language, context of a country, population characteristics and diversity are important when designing an HIV/AIDS programme, findings of the current study suggest that teacher training HIV/AIDS curricula also have to be diversified in terms of specialisation teaching phases. Diversification may include

development of specialised knowledge for teachers as well as relevant resources to enable teachers to address HIV/AIDS challenges effectively in each phase.

In addition, students require HIV/AIDS teacher training to occur early in an academic programme (preferably during the first year) when they are still proactive and eager to engage with information and materials presented. According to Social Cognitive theory (Bandura, 1986; Schunk, 2008) motivation, interest, incentives to perform, perceived need as well as competing activities may influence whether what is learned is performed, highlighting the importance of aforementioned factors (that is diversification and timing of HIV/AIDS programmes). Furthermore, it seems that the manner in which HIV/AIDS information is presented (i.e. through interactive and participatory strategies as well as modelling) as well as the manner in which lecturers managed larger classes affect students' motivation to learn about HIV/AIDS. In conclusion, it appears that student motivation to learn about HIV/AIDS may be enhanced through engagement in affective and identity-formation realms. Social Cognitive Theory (Lefrancois, 1997; Schunk, 2008) posits that students will perform actions they believe will result in rewarding outcomes. Therefore, it appears as if students need to be engaged in affective and identify-construction domains to take on an active role to address HIV/AIDS-related challenges. Engagement with the latter may be established via visual learning materials such as purposeful and interesting DVDs.

4.4 CONCLUSION

In Chapter 4, I discussed the results of the current study based on the themes, sub-themes and categories which had emerged. I presented the results and findings of the current study in an integrated manner in order to situate the results within the wider realm of research in terms of the topic of enquiry.

In the next chapter, I answer the secondary research questions as well as the primary research question. In addition, I explore the theoretical assumptions as posited in Chapter 2 and explore possible silences in the data. Finally, I provide a discussion on the limitations of the current study and make recommendations for future research, practice and training.

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CHAPTER FIVE

CONCLUSION AND RECOMMENDATIONS

5.1 INTRODUCTION

Chapter 4 integrated the results and findings of the current study by situating the results within pertinent literature as well as the chosen theoretical framework. In Chapter 5, I answer the secondary research questions as well as the primary research question that guided the current inquiry. I further discuss possible silences in the data, the limitations of the current study and conclude the chapter with recommendations for further research, practice and training. Figure 5.1 presents an overview of Chapter 5.

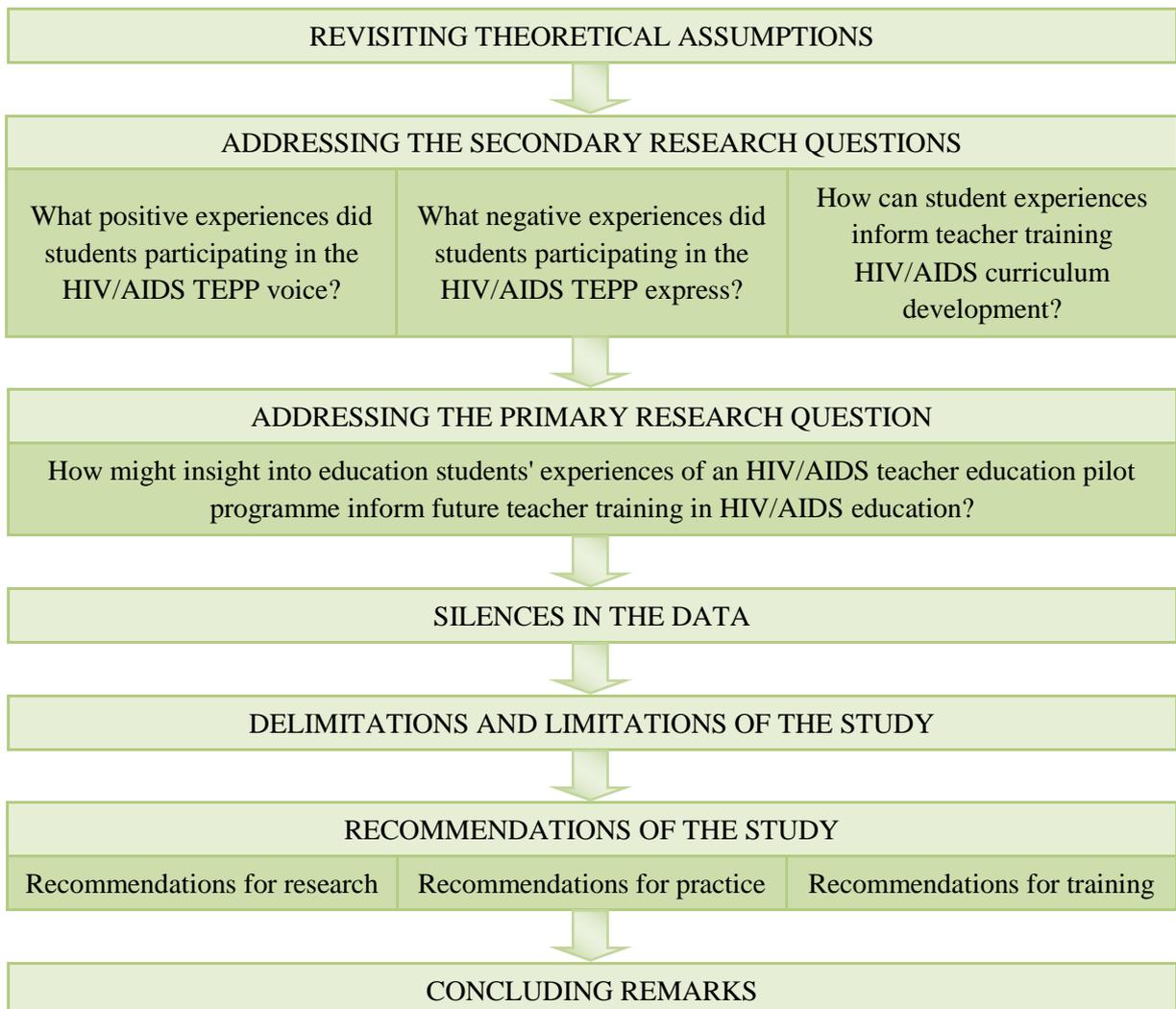


FIGURE 5.1: OVERVIEW OF CHAPTER 5

5.2 REVISITING THEORETICAL ASSUMPTIONS

I approached the current study with certain theoretical assumptions based on relevant literature and Social Cognitive Theory (Bandura, 1986) in order to gain an understanding of the findings. The notion that HIV/AIDS education is vital for prevention efforts (Haldenwang *et al.*, 2009; Hernes, 2002; Kelly, 2002; UNAIDS, 2009b; Van den Berg, 2008) is supported by the findings of the current study. Students, in the current study, seemed to recognise learner ignorance and lack of knowledge concerning HIV/AIDS and emphasized the need to provide learners with accurate HIV/AIDS information in order to address stigma and discrimination. In addition, findings indicate the potential value of HIV/AIDS education to enhance students' personal and professional HIV/AIDS knowledge, competence and skills. However, students did not pertinently recognise their own or learners' cultural and socialised beliefs (Bacus, 2008; Beckmann & Prinsloo, 2007; De Kock & Wills, 2007; Jansen, 2007; Marcus, 2002; Wood, 2009b) concerning HIV/AIDS.

The assumption made regarding students' possible reluctance towards HIV/AIDS seemed to hold true since findings revealed an initial resistance towards the HIV/AIDS TEPP by students. Within the current study, the initial resistance or lack of engagement towards HIV/AIDS education may indicate a lack of personal acknowledgment of the impact of the disease (Bacus, 2008; De Kock & Wills, 2007). However, aforementioned statement is only a hypothesis and further investigation is necessary in order to explore student perceptions regarding personal acknowledgment concerning HIV/AIDS. The main reason for student resistance, at the onset of the HIV/AIDS TEPP, seemed to be due to HIV/AIDS fatigue. Although religious barriers, cultural and social assumptions as well as contradiction of personal convictions (Ahmed *et al.*, 2009; Bacus, 2008; De Kock & Wills, 2007; UNAIDS 2009b; Van den Berg, 2008) may have played a role in students' possible resistance, students did not explicitly express these factors as reasons for initial reluctance towards the HIV/AIDS TEPP.

Despite the presence of possible HIV/AIDS fatigue, the HIV/AIDS TEPP seemed to have had a positive effect on students' professional and personal knowledge levels, attitudes and self-efficacy beliefs. Furthermore, findings confirmed that students became motivated to make a difference and become involved in community efforts to support those affected by or infected with HIV/AIDS. The latter may have been the result of increased confidence and/or personal engagement concerning HIV/AIDS (Ahmed *et al.*, 2006; Schunk, 2008; Webb & Gripper,

2010). However, further research is necessary to confirm a correlation between HIV/AIDS education, students' personal engagement and enhancement of confidence relating to HIV/AIDS.

The assumption of the current study, presuming that students may learn about HIV/AIDS through enactive and vicarious processes (Lefrancois, 1997; Schunk, 1991; Schunk, 2008), was supported by findings. Interactive and participatory strategies (e.g. role play) as well as modelling (e.g. DVD), more so than the static deliverance of HIV/AIDS information (Jansen, 2007; Sukati *et al.*, 2010), seemed to accelerate learning, increase knowledge and enhance motivation as well as engagement with real-life issues (De Lange & Stuart, 2008; Lefrancois, 1997; Schunk, 1991; Schunk, 2008).

Moreover, the assumption that HIV/AIDS programme presenters (including teachers and lecturers) play a significant role in the implementation of HIV/AIDS curricula (Plummer, Wight, Wamoyi *et al.*, 2007; UNAIDS, 2009b) is confirmed by findings according to which students placed the responsibility of effective HIV/AIDS education on lecturers. Findings indicate the necessity of lecturers to employ appropriate instruction methods, especially interactive and participatory strategies (Ahmed *et al.*, 2006; De Lange & Stuart, 2008; Kinsman *et al.*, 2001; Njue *et al.*, 2009; UNAIDS, 2009b), to encourage discussion and participation by creating an atmosphere that promotes critical thinking, discovery of knowledge and reflection (Carl, 2002; Tanner & Tanner, 2007).

The assumption, guided by Social Cognitive Theory (Bandura, 1986), alluding to the importance of teachers self-efficacy beliefs, was confirmed by the findings of the current study. An increase of knowledge, awareness, personal engagement and insight regarding HIV/AIDS seemed to enhance students' competence and efficacy beliefs regarding teaching, approaching or handling learners affected by or infected with HIV/AIDS. However, the current study did not directly measure self-efficacy beliefs and additional research in this regard is necessary.

Furthermore, the perception that teachers need ample training in order to be effective in the collective roles allocated to them (Coombe, 2003b; DoE, 2007b; DHET, 2010; Loots & Mnguni, 2007; Van den Berg, 2008) is reinforced by the findings of the current study. Findings suggest that students may not feel adequately equipped to deal with challenges, such as HIV/AIDS, due to a lack of in-depth knowledge and skills provided during teacher

training. In addition, findings motivated the need, not only for initial teacher training but also continuous professional development to enhance confidence levels which may be an important measure for improving the implementation of HIV/AIDS programmes (Burr *et al.*, 2006; Helleve, Flisher, Onya, Kaaya, *et al.*, 2009; Njue *et al.*, 2009; UNAIDS, 2009b). Comprehensive and continuous HIV/AIDS training, for teachers, is therefore essential (Ahmed *et al.*, 2006; Dawson *et al.*, 2001; Griesel-Roux, 2005; Mathews *et al.*, 2006; Mufune, 2008; Mugimu & Nabadda, 2009; Nsubuga & Bonnet, 2009; Ongunya *et al.*, 2009; Webb & Gripper, 2010).

Lastly, the assumption that an HIV/AIDS curriculum could be specifically developed for an intended target group (Carl, 2002; Griesel-Roux *et al.*, 2005; Jansen, 2007; Kelly, 2002; King in Page, 2004, p. 23; Marcus, 2002; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; Wood, 2008) is supported by the findings of the current study. However, within the current study, findings seem to emphasize the need for HIV/AIDS programmes to be specifically adapted for different knowledge levels and/or teaching phases. Nonetheless, cultural, language, social, economic and political factors as well as the context of a country should also be taken into consideration as indicated by existing literature (Jansen, 2007; Kelly, 2002; Marcus, 2002; Nsubuga & Bonnet, 2009; UNAIDS, 2009b; Wood, 2008).

5.3 ADDRESSING THE SECONDARY RESEARCH QUESTIONS

The purpose of the current study was to explore and describe the experiences of students participating in the HIV/AIDS TEPP in an attempt to inform future teacher training in HIV/AIDS education. In Chapter 1, I posed research questions to guide this inquiry. In the following sections, I consider the secondary research questions and in the process attempt to justify a conclusion which in turn addresses the primary research question.

5.3.1 SECONDARY QUESTION 1: What positive experiences did students participating in the HIV/AIDS TEPP voice?

Positive experiences that emerged from the current study include the theoretical basis provided during the HIV/AIDS TEPP. The theoretical content was viewed as necessary and satisfactory. The resources supplied in the HIV/AIDS TEPP were also positively received. Resources such as scenarios, pictures and worksheets were deemed beneficial for future classroom use.

Findings further suggest that students became more aware of the need to address learner ignorance of HIV/AIDS through the use of accurate information. Provision of accurate information (to both learners and teachers) was viewed as necessary to limit ignorance and address stigma as well as discrimination surrounding HIV/AIDS. In addition, findings suggest that students' ability to teach, approach or handle learners affected by or infected with HIV/AIDS seem to be enhanced after exposure to the HIV/AIDS TEPP.

Furthermore, findings indicate that students became conscious of the responsibility teachers have as positive role models in the lives of learners. The manner in which teachers approach or handle learners (affected by or infected with HIV/AIDS) as well as the way HIV/AIDS issues are addressed in the classroom may be an important example for other learners. Moreover, the need to involve and educate the community was identified as essential in order to address HIV/AIDS effectively, indicating positive attitudes towards community engagement.

Additional positive experiences suggested by the findings relate to personal growth experiences students encountered during the HIV/AIDS TEPP. Students' personal knowledge base, awareness, insight and understanding regarding HIV/AIDS seem to be enhanced by the HIV/AIDS TEPP. Students further appear to become mindful of the reality and enormous impact of HIV/AIDS and were inspired (in affective and identity-construction domains) to be involved in social challenges related to HIV/AIDS. The exposure to positive strength-based approaches was received positively and designated as essential when dealing with vulnerable learners and communities in order to identify and utilise possible assets. Despite the numerous positive experiences voiced by students, challenges relating to the HIV/AIDS TEPP were also expressed as addressed by the second secondary research question.

5.3.2 SECONDARY QUESTION 2: What negative experiences did students participating in the HIV/AIDS TEPP express?

Findings indicate that the HIV/AIDS TEPP could consider students' existing knowledge and needs (including training needs, i.e. area or phase specialisation of students). The repetition and overlapping of content within different modules (within a degree) may decrease interest in a module. Furthermore, the lack of step by step guidelines or examples of how students could apply knowledge in a specific situation were indicated as a limitation of the HIV/AIDS TEPP.

Findings revealed that the limited number of lectures as well as the time when the HIV/AIDS TEPP was implemented, was experienced negatively by students. Students perceived the implementation of the HIV/AIDS TEPP in the third study year and at the end of the academic year as ineffective. In addition, perceived limited time allocated to the HIV/AIDS TEPP may have prevented an in-depth exploration of the module.

Furthermore, the unsatisfactory inclusion of interactive and participatory teaching and learning methodologies by some lecturers during the HIV/AIDS TEPP was viewed as ineffective for learning and active class participation. Although smaller classes seem to be preferred it appears that the major concern is not related to the number of students in the classroom, but rather the lack of alternative teaching and learning strategies employed in large classes. Findings further suggest that students experienced the limited compulsory or elective practical opportunities provided, negatively. Little information seemed to be provided to students on how and where they could get involved in communities on a voluntary basis.

Although, as addressed in the previous section, students' skills and confidence levels may have been enhanced through the HIV/AIDS TEPP, possible challenges which may still be experienced when dealing with HIV/AIDS issues, were identified by students even after completing the HIV/AIDS TEPP. In this regard, findings suggest that students need to be adequately equipped with the necessary skills to deal effectively with learners infected with or affected by HIV/AIDS. The pastoral role is one of the policy-prescribed (DoE, 2000; DHET, 2010) responsibilities allocated to teachers. However, teachers may not be officially trained in this area. It also appears that students may still struggle to integrate HIV/AIDS information sufficiently into subject matter without the necessary training.

Findings point out that at the outset of the HIV/AIDS TEPP, students generally had a negative attitude towards the implementation of the module. A lack of personal involvement and overexposure to HIV/AIDS content may have caused desensitisation and detachment from issues concerning HIV/AIDS. The experiences voiced by students may further inform HIV/AIDS curriculum development relating to teacher training, which is addressed in the current study's third secondary research question.

5.3.3 SECONDARY QUESTION 3: How can student experiences inform teacher training HIV/AIDS curriculum development?

An effective and specifically developed HIV/AIDS curriculum seems essential to address the threat of the HIV/AIDS epidemic successfully. Findings suggest that theoretical content, information and resources included in an HIV/AIDS curriculum should be relevant and based on substantial theory. Furthermore, it seems crucial that content is carefully considered during the design phase in order to adapt the content to the needs and requirements of the target audience. Teacher training curriculum design could therefore incorporate a comprehensive situation analysis of modules containing HIV/AIDS information to prevent repetition of content or knowledge. Effective curriculum design may also consider factors such as cultural, social, language as well as population characteristics of students to make HIV/AIDS a reality for teaching communities.

Findings further suggest that sufficient time could be allocated to an HIV/AIDS programme to ensure in-depth investigation of content and allow for the possible inclusion of practical opportunities. From students' perspectives it appears that an HIV/AIDS programme could be implemented in the first year of teacher training and preferably at the beginning of an academic year.

To ensure participation and personal engagement with HIV/AIDS information, employment of interactive teaching and learning methodologies (e.g. role plays) as well as modelling (e.g. use of DVDs) are essential. Real-life experiences (such as discussions with a positive HIV person) and site visits (e.g. HIV/AIDS hospice) could further be included during HIV/AIDS programmes. In addition, lecturers may equip students with the necessary knowledge and engage students actively through for example class discussions and group work.

From the outset students can be actively involved in the design, implementation and evaluation of teacher training HIV/AIDS education in order to obtain a clear understanding of what students need and respond to. Active involvement of students may enhance the relevance and effectiveness of HIV/AIDS teacher training. The findings of this secondary research question, together with the first two secondary questions, build on the study's conclusions which relate to the primary research question.

5.4 ADDRESSING THE PRIMARY RESEARCH QUESTION

In drawing conclusions, I address the primary research question in this section. Therefore, the primary research question needs to be reconsidered, namely:

How might insight into education students' experiences of the HIV/AIDS TEPP inform future teacher training in HIV/AIDS education?

The findings of the current study indicate that the content of the HIV/AIDS TEPP provided students with a strong HIV/AIDS-related knowledge base as well as structured, constructive information and resources beneficial for future use within, especially foundation phase, classrooms. However, findings also suggest that the HIV/AIDS TEPP could be adapted for different levels of knowledge and teaching phases in order to address the specific needs of the target group. In addition, appropriate and sufficient resource materials, in accordance with the explicit needs of each teaching phase, could be developed. Specially adapted HIV/AIDS programmes may increase students' motivation and interest as well as limit issues, such as HIV/AIDS fatigue, by preventing replication and duplication of information during teacher training.

Findings further indicate the necessity of enhanced teaching application guidance relating to HIV/AIDS education in order to give students a better understanding of how to apply theoretical knowledge (i.e. specific steps that can be taken when identifying or dealing with HIV/AIDS infected or affected learners). Thus, more practical examples and clear guidelines need to be incorporated into HIV/AIDS programmes to equip teachers to deal with difficult situations effectively and ethically. Furthermore, sufficient time allocation to HIV/AIDS programmes, to ensure in-depth and meaningful exploration of HIV/AIDS content and activities, seem necessary. HIV/AIDS programmes could be operationalised early on in the first year when students may be more proactive and willing to engage with the information and materials presented.

The value of a range of teaching and learning methodologies was confirmed by the findings of the current study. Static deliverance of information seems less beneficial and students expressed the desire to interact with knowledge through, for instance, role plays and debates, in order to be part of the meaning-making process. Modelling, through visual materials (e.g. DVDs) appears to capture attention and bring an emotional dimension to lectures. In order to

engage students HIV/AIDS curriculum could emphasise the relevance of HIV/AIDS in a new and interesting manner through employing attention-grabbing materials (e.g. DVD), throughout, but especially at the start of an HIV/AIDS programme. In addition, the inclusion of compulsory or elective practicum components is advised to provide students with the opportunity to become involved on a practical level. Practical experiences may provide students with the opportunity to internalise theoretical information by applying knowledge and skills gained through a theoretical basis.

Though it seems that smaller classes are preferred, a small class size was not identified by students as a factor for effective HIV/AIDS education. Rather it seems that the manner in which HIV/AIDS information is presented as well as the management of large classes (e.g. employing cooperative learning or small groups) impact effective HIV/AIDS education. Lecturers can thus employ interactive and participatory teaching methods so that real-life issues can be exposed and engaged with. Aforementioned statements highlight the crucial role of lecturers to enable interactive and participatory teaching and learning as well as to provide students with opportunities to fully engage with HIV/AIDS content. Lecturers can encourage active participation in the classroom through critical thinking, discovery of knowledge, debate and reflection.

Findings indicate that students' felt their personal competence and responsibility was enhanced through HIV/AIDS education. Students became aware of the importance of learners being informed of HIV/AIDS by means of accurate information in order to increase knowledge, prevent at-risk behaviour of learners and oppose ignorance concerning HIV/AIDS. Students further acknowledged discrimination and stigmatisation due to limited or inaccurate knowledge, supporting the assumption that HIV/AIDS education is crucial for prevention efforts in order to eradicate issues such as stigma and discrimination.

Although students expressed enhanced skills and confidence to identify learners in need as well as their ability to teach, approach or deal with HIV/AIDS issues, students still alluded to possible challenges they may experience concerning HIV/AIDS. Students suggested that a lack of in-depth knowledge and skills may limit their abilities to effectively deal with challenge (i.e. approach or deal with learners infected with or affected by HIV/AIDS). The integration of HIV/AIDS content into subjects, other than Life Orientation, was also identified as a challenge and can be adequately addressed in future HIV/AIDS teacher training programmes.

Factual information on HIV/AIDS is crucial, however knowledge alone seems inadequate to protect learners against HIV/AIDS. The importance of teacher-learner relationships and the responsibility of teachers as positive role models were highlighted by the findings. Through their behaviour and interactions with learners (infected with or affected by HIV/AIDS) teachers may model the absence of stigma and discrimination.

Students furthermore emphasised involving relevant stakeholders (including parents, communities and local organisations) in HIV/AIDS education efforts. Educating and engaging school communities and parents seem essential to address HIV/AIDS challenges. Teachers can be trained to collaborate with parents and communities. Positive strength-based approaches appear well suited to equip teachers in this regard.

Seeing as existing teacher training may not adequately prepare teachers to address challenges such as HIV/AIDS, the need for continuous development, lifelong learning as well as support for teachers is highlighted in the findings of the current study. Discussion or support groups may enhance teachers' confidence and skill levels which, according to Social Cognitive Theory (Bandura, 1989b; Bigge & Shermis, 1999; Schunk, 2008; Webb & Gripper, 2010), may have a positive effect on teachers' self-efficacy beliefs. Increased confidence and self-efficacy beliefs may assist teachers to deal effectively with HIV/AIDS and address the needs of learners as well as communities.

Although an initial reluctance towards HIV/AIDS programmes may be experienced, student involvement on a personal level appears to reduce HIV/AIDS fatigue and make students more willing to engage with HIV/AIDS issues. Affective involvement, through a range of interactive materials and methods, can motivate students to become personally involved and to engage with individuals and communities affected by or infected with HIV/AIDS. According to Social Cognitive Theory (Lefrancois, 1997; Schunk, 2008) individuals will perform actions that they believe will result in rewarding outcomes. Therefore, it appears that during training, teachers who are engaged in affective and identify-construction levels (not only cognitive levels) may probably be motivated to take on an active role (have agency) (Bandura, 1989a; Bandura, 1989b) to address HIV/AIDS-related challenges in their careers. Engagement in affective and identify-construction domains, through HIV/AIDS education, highlight the relevance of including value clarification modules to enable educators to address personal values, beliefs, assumptions and attitudes concerning HIV/AIDS

5.5 SILENCES IN THE DATA

Literature (Bhana, 2007; Kelly, 2002; UNAIDS, 2009b) suggests that the most appropriate time to implement HIV/AIDS curriculum at schools is during the early years of schooling. On the other hand, the study conducted by Chen, *et al.* (2004) revealed that HIV/AIDS programmes implemented at secondary schools and universities were generally accepted, whereas the appropriateness for primary school learners was questioned. With reference to the current study, no particular point of view was indicated regarding the implementation of HIV/AIDS education during primary or high school.

Furthermore, literature suggests that evidence-based HIV/AIDS programmes that are sensitive to local, social as well as cultural factors and values are more successful in addressing the threat of the HIV/AIDS epidemic (Mpofu *et al.*, 2008; UNAIDS, 2009b; Wood, 2008). Content used in designing education materials for HIV/AIDS programmes could therefore be culturally sensitive (Nsubuga & Bonnet, 2009). Although students emphasized the need to adapt the HIV/AIDS TEPP to different knowledge levels and teaching phases, students did not refer to the lack of diversity in materials as highlighted in research (HSRC, 2002). This may indicate a subconscious acceptance regarding the cultural and racialised discourses shaping attitudes towards HIV/AIDS (Jansen, 2007; Marcus, 2002; Nduna & Mendes, 2010; Petros *et al.*, 2006; Theron, 2005). Aforementioned can create the impression that HIV/AIDS is only prevalent certain communities, which may lead to students of other cultures to disengage themselves from issues relating to HIV/AIDS (Bacus, 2008). The aforementioned hypotheses could be investigated through additional research.

Research (Helleve, Flisher, Onya, Mukoma *et al.*, 2009; Wood, 2009b) further indicates that teachers may possibly struggle with implementation of HIV/AIDS curricula if they feel the information contradicts their cultural values and beliefs. Teachers are shaped and influenced by their culture and may be constrained by ingrained beliefs and social as well as cultural forces to question prevailing norms (Wood, 2008; Wood, 2009b). With regard to the aforementioned literature bases, little reference was made by students relating to the possible influence culture, beliefs or values may have on their perceptions of HIV/AIDS education. The possibility that students, in the current study, lack awareness concerning reflections on socialised identity may explain the silence pertaining to the previous two arguments. Additional research is necessary to explore reflexivity concerning socialised identity.

5.6 DELIMITATIONS AND LIMITATIONS OF THE STUDY

One of the delimitations of the study which needs to be taken into consideration is related to the sampling strategy employed. Purposive sampling of documents (i.e. transcribed interviews from the HEAIDS project) was used to obtain knowledge and information on a specified interest of inquiry. Since the available data were limited to audio recordings and transcriptions, it was not possible to collect additional data or explore the topic under investigation further. The results of the current study therefore cannot be generalised since random sampling was not employed. However, although purposive sampling may not be representative or generalisable, the aim of the current study was rather to acquire in-depth information from a sample that is in a position to provide the relevant information needed (Cohen *et al.*, 2007). In addition, only a small selection of participants was involved in the original HEAIDS interviews which may limit the generalised ability of the current study further. However, seeing as the goal of qualitative research is not to generalise, it is thus not necessary to interview a large number of participants (Lichtman, 2006). I did not seek generalisability, but rather transferability in an attempt to provide rich descriptions and detail which aligns with my selected meta-theory, being constructivism (see section 3.2.1). Nonetheless, the current study therefore may not represent a full spectrum of experiences voiced by Afrikaans students.

A limitation I was faced with relates to the type of data analysis (i.e. inductive thematic analysis of transcriptions) utilised. Interpretation was limited to the examination of recorded and transcribed communication. Contextual information such as non-verbal communication and reflective interpretation of data were thus neglected (Babbie, 2005; Cohen *et al.*, 2007; Corti & Thompson, 2004). Data collection errors could not be controlled and the analysis was constrained by the original objective of the HEAIDS project (Mouton, 2001). The flexibility, but also limited interpretative power of thematic analysis, may also be regarded as a limitation (Braun & Clarke, 2006). I constantly had to refer to my research questions, aims and existing theoretical framework in order to ensure that the analysis remained focused. Frequent discussions with supervisors aided this process. Moreover, I incorporated a stakeholder check in order to prevent any misunderstandings or misinterpretations which could have occurred in the data analysis process.

An additional limitation relates to student focus during the HEAIDS interviews. Since the HIV/AIDS TEPP was part of EDU 364 students did, on occasion, discuss other units of the module in addition to the HIV/AIDS TEPP. I acknowledge that students addressing the complete EDU 364 module and not only the HIV/AIDS TEPP may be a limitation of the data analysis and the use of secondary data since data collection could not be controlled (Mouton, 2001).

The responses in the current study were based on self-reporting. As such students participating in the original HEAIDS interviews may have been affected by social desirability bias and provided a response which they viewed as socially acceptable (Randall & Fernandes, 1991). Furthermore, it is difficult to demonstrate the long-term influence of the HIV/AIDS TEPP on a student's professional and personal knowledge levels, skills and/or attitudes. Follow-up studies are necessary to address this limitation.

Finally, as a researcher conducting a qualitative study, the risk of researcher bias was a challenge as the current study relied primarily on my personal constructions and interpretations of interview transcriptions. I was therefore cognisant of the fact that my role was fundamental in representing the perceived responses and experiences of students (Lichtman, 2006). My interpretations could not be separated from my own background, history, contexts and prior understandings (Creswell, 2009). On the other hand the possibility of the study being approached from a subjective point of view embraces the essence of qualitative research which is to gain quality, rich in-depth understanding of the unique life world and experiences of participants (Nieuwenhuis, 2007a). Nevertheless, I addressed aforementioned challenges by continuously reflecting in my research journal and discussing my thoughts, feelings and actions with my supervisors throughout the research process in order to stay mindful of my personal values, assumptions and biases (Creswell, 2009; Starks & Trinidad, 2007).

5.7 RECOMMENDATIONS

The current study reveals students' experiences of the HIV/AIDS TEPP. The following sections present recommendations for future research, practice and training within the field of teacher training and education in general.

5.7.1 RECOMMENDATIONS FOR FURTHER RESEARCH

Based on the findings discussed in Chapter 4, as well as the theoretical assumptions from which this study was approached, I recommend possible areas of further investigation which may provide deeper insight into matters that have not been explored in the current study:

- Explore the lack of personal acknowledgment of HIV/AIDS as possible reason for HIV/AIDS education resistance.
- There are a limited number of studies on the possible enhancement of self-efficacy for teachers due to specific HIV/AIDS interventions (Webb & Gripper, 2010). Although findings of the current study suggest that students' self-efficacy regarding HIV/AIDS plausibly increased due to the HIV/AIDS TEPP, the current study did not measure self-efficacy specifically. Further research with regard to the enhancement of teacher self-efficacy through HIV/AIDS education is recommended.
- Investigate whether students' confidence levels could be enhanced if students were personally engaged, through effective HIV/AIDS education, motivating them to become actively involved in HIV/AIDS education and community efforts.
- Examine factors which may motivate teachers to integrate HIV/AIDS-related content effectively into their subject matter.
- Follow-up studies can be carried out to establish the possible long-term effectiveness of the HIV/AIDS TEPP.
- Involve students in the design, implementation and evaluation of HIV/AIDS programmes.

5.7.2 RECOMMENDATIONS FOR PRACTICE

It seems evident that:

- Educational institutions may consider formulating HIV/AIDS frameworks to assist teachers to deal effectively with HIV/AIDS challenges.
- Key stakeholders (parents, teachers, communities, ministries and organisations) can be engaged in HIV/AIDS efforts to develop effective responses to HIV/AIDS. Positive strength-based strategies may be employed in this regard.
- Teachers' awareness of their responsibility as role models for learners in their classroom can be enhanced, encouraging teachers to establish positive relationships with their learners.

- Teachers need continuous support and mentoring through, for example support networks and continuous professional development, to enhance skills and knowledge relating to HIV/AIDS challenges.

5.7.3 RECOMMENDATIONS FOR TRAINING

The findings of the current study could be beneficial to future teacher training programmes as well as HIV/AIDS education programmes. The following is recommended for training purposes:

- The incorporation of a range of teaching and learning methodologies (e.g. debates), as well as real-life experiences (e.g. presentation by HIV-infected individual) and modelling strategies (e.g. DVD) within an HIV/AIDS programme are essential.
- HIV/AIDS programmes could be adapted for specific teaching phases (e.g. foundation, senior or FET phase) in order to meet the needs of teachers as well as learners effectively. In order to provide teachers with specialised knowledge and activities for their specific audience, appropriate and sufficient resource materials may be developed for each teaching phase.
- More practical examples and clear guidelines on how to apply theoretical knowledge need to be incorporated into HIV/AIDS programmes and materials to equip teachers too effectively and ethically, teach, approach or deal with learners infected with or affected by HIV/AIDS.
- HIV/AIDS programmes can be presented in the first year, over an extended period, in the early stages of teacher training.
- It is recommended that a practical component, as well as appropriate site visits (compulsory or elective) be added to HIV/AIDS teacher training programmes to enhance theoretical knowledge and skills through enactive and vicarious processes.
- During HIV/AIDS programmes additional information can be provided regarding HIV/AIDS community projects or institutions for voluntary involvement and support by students.
- HIV/AIDS programmes for teacher training may possibly be combined with basic counselling skills for teachers (e.g. listening skills) to equip teachers to provide effective psychosocial support for learners and communities.
- Teacher training can include value clarification modules to enable teachers to address personal values, beliefs, assumptions and attitudes regarding HIV/AIDS.

5.8 CONCLUDING REMARKS

In 2008, I acquired the role as intern for the HEAIDS project at the University of Pretoria. I did so with two main reasons in mind, firstly, for the experience of working on a nationwide project implemented in numerous universities in South Africa. I viewed the internship as an incredible opportunity to extend my knowledge in the field of HIV/AIDS, teacher training and curriculum development. As a result, I gained valuable information and research skills which I might not otherwise have acquired. The second reason related to the opportunity to utilise the data, obtained in the HEAIDS project, for my MEd mini-dissertation (the current study).

For the purpose of the current study, I explored and described how students had experienced the HIV/AIDS TEPP, implemented at the University of Pretoria. My intention was to identify themes concerning students' experiences to inform future teacher training in HIV/AIDS education. Two main themes emerged following thematic analysis of interview transcriptions namely *Student experiences regarding curriculum issues in the piloting of the HEAIDS HIV/AIDS TEPP* and *Student professional and personal experiences regarding HIV/AIDS*. The study investigated positive and negative experiences voiced by students participating in the HIV/AIDS TEPP as well as student experiences concerning HIV/AIDS curriculum development. As a result, the current study may add to the existing body of knowledge relating to HIV/AIDS and education as well as potentially contributing to HIV/AIDS curriculum development especially in the area of teacher training.

At the end of the current study, I can look back and reflect on a journey of uphill battles, but also life-enriching experiences. As I grappled with the research process, my knowledge base and expertise concerning the topic of inquiry were enhanced. Moreover, I have grown as a researcher and scholar through my involvement in the original HEAIDS project as well as my own research endeavour (i.e. the current study) undertaken.

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Addenda

ADDENDUM A:

Thematic analysis and interpretation

- A1 Margin notes as initial sorting process (extract)
- A2 Generating initial codes
- A3 Searching for themes
- A4 Reviewing themes
- A5 Thematic analysis table
- A6 Analysis results (verbatim responses)
- A7 Inclusion and exclusion criteria

ADDENDUM B:

HEAIDS interview schedules

ADDENDUM C:

Extracts from research journal

ADDENDUM D:

English-Afrikaans verbatim translations

ADDENDUM E:

Additional information regarding EDU 364

ADDENDUM F:

Ethical clearance certificate from the research Ethics Committee
of the University of Pretoria

See compact disc

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