PERCEPTIONS OF THE ACCELERATED CHRISTIAN EDUCATION PROGRAMME AS PREPARATION FOR TERTIARY EDUCATION

by

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Declaration

I declare that “Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education” is my own work and that all the sources that I have used or quoted have been indicated and acknowledged by means of complete references.

This thesis contains no material that has been accepted for a Degree or Diploma by the University or any other institution.

Jacqueline Baumgardt
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ABSTRACT

This study seeks to explore aspects of the educational practice of the Accelerated Christian Education (ACE) programme.

The philosophy (the Christian underpinnings) and pedagogy (mastery learning) of the ACE programme as contemporary educational practice is examined against a background of educational reform movements such as outcomes-based education.

In addition, the thesis examines the issue of what it takes for a student to succeed in tertiary education, investigates the stated claims of the ACE programme in this regard, and then scrutinises these claims, in an empirical study, that includes ACE graduates, their parents and university admissions officers.

Finally recommendations are made to those who use the programme in schools regarding any perceived strengths and/or weaknesses in the programme itself, or in the management and implementation of the programme, with a view to enhancing the educational experience of high school students preparing to enter the realm of tertiary education.

KEY TERMS

Philosophy of education; Christian education; Accelerated Christian Education; outcomes-based education; education reform movements; curriculum models; parental choice in schooling; college preparedness; characteristics for success in tertiary education; admission to degree studies.
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List of Abbreviations

ACE: Accelerated Christian Education
ACESoT: Accelerated Christian Education School of Tomorrow
ACT: American College Test – designed to measure a student’s academic ability to
perform college work.
CFAM: Culture Fair Abilities and Motivation Test
CFT: Christians for Truth
DoE: Department of Education
ELRC: Education Labour Relations Council
FET: Further Education and Training
G12CEC: Grade 12 College Entrance Certificate – issued by ACE
GET: General Education and Training
KJV: King James Version of the Holy Bible
LTSM’s: Learning and Teaching Support Materials
NCS: National Curriculum Statement
NSC: National Senior Certificate
NIV: New International Version of the Holy Bible
NQF: National Curriculum Framework
OBE: Outcomes-Based Education
OBEST: Outcomes-Based Education Standards Test
PACE: Packet of Accelerated Christian Education – a unit of curriculum
RNCS: Revised National Curriculum Statement
SA: South Africa
SAQA: South African Qualifications Authority
SAT: Scholastic Aptitude Test
SAUVCA: South African Universities Vice-Chancellors Association
SAUVCA-CTP: South African Universities Vice-Chancellors Association – Committee of Technikon Principals
TIMSS: Trends in International Mathematics and Science Study
TIMSS-R: Trends in International Mathematics and Science Study Repeat
UCAS: Universities and Colleges Admissions Service, United Kingdom
USA: United States of America

**Important Note:**

Because the ACE Programme was devised and written in the United States of America, the discussion occasionally reverts to the use and spelling of US English, where it is deemed necessary to do so.
CHAPTER 1: INTRODUCTION

1.1 BACKGROUND

The Accelerated Christian Education (ACE) programme is an educational programme that has been used throughout the world in non-government/independent schools and home school programmes since the 1970s. Graduates of the programme have demonstrated successful post-school education and employment outcomes subsequent to that educational experience. This study seeks to explore aspects of the educational practice, as perceived by participants of the programme.

The ACE programme is the term used to refer to an educational programme that includes the ACE curriculum as its principal, or core curriculum. The ACE programme is one which espouses Christian principles and a Biblical world view and caters for the educational needs of children from pre-school to Grade 12.

The distributor of this programme in South Africa is Accelerated Christian Education Ministries, Africa and Scandinavia, based in Durban. The curriculum materials are largely imported from the United States, although these materials are selected in terms of their alignment to the requirements of the Department of National Education curriculum requirements. A major realignment of the materials was undertaken during 2002 to take account of the Revised National Curriculum Statements promulgated for the General Education and Training Phase (GET – Grades R – 9); and in 2005 to take account of the new requirements of the National Curriculum Statement for Further Education and Training. (This work is ongoing as implementation will only take place from 2006 – 2008.)

According to the Accelerated Christian Education Ministries (Africa and Scandinavia) website (ACE 2006), there are currently 500 independent schools (most of them in South Africa) and approximately 1 000 home schools using the ACE programme. The programme caters for learners from pre-school to Grade 12. The schools using the ACE
programme are all independent or home schools (as defined in the South African Schools Act, 1996).

The determination of success in education is variously assessed according to philosophical and / or policy expectations. Such expectations have been and continue to be debated at length as evidenced in historical and contemporary literature (Castle 1961; Dewey 1906; Keeves & Marjoribanks 1999; Symes & Preston 1997; Hettich 1998; Carter Bishop & Kravits 1998; Jenkins & Lanning 2002; Orr & Bragg 2001; Elliot 2005). The South African National Curriculum Statement, the national curriculum policy document, identifies the South African government’s recommendations for education outcomes. This policy document defines educational expectations such that students, when they leave school, should be prepared to take their place in society, in lifelong learning pursuant to further education and employment.

The ACE curriculum, though written and published in the United States, has been developed for an international clientele. Each regional distributor, e.g., ACE Ministries (Africa and Scandinavia), has authority and responsibility to develop national curriculum pertinent to the regional needs of its clients, within the context of economic viability. Currently, the Grade 12 curriculum is aligned to the National Senior Certificate syllabus, even though graduates from ACE do not write the National Senior Certificate examinations. The qualification for which they study is the School of Tomorrow Grade 12 College Entrance certificate, a qualification registered on the National Qualifications Framework at the NQF4 level (SAQA ID 17209: SAQA website). In order to gain university entrance, students are required to write the Scholastic Aptitude Test (SAT) of the College Board of America, which was approved by the South African Matriculation Board as an external benchmark of academic potential. Such students gain access to tertiary institutions via alternative entry routes such as the Senate’s Discretionary Route as laid down in the Universities Act No. 61 of 1955 (now replaced by the Higher Education Act, No. 101 of 1997).
This acceptance was granted by the Matriculation Board in 2001 after many years of lobbying. Once the hurdle of the Matriculation Board was overcome, much negotiation was undertaken with the various tertiary institutions, especially universities, for acceptance of such students. Appendix 1 provides a list of the tertiary institutions that currently accept ACE graduates (ACE 2006). To date some 240 students have entered and are studying at these institutions in a wide range of disciplines.

The ACE programme’s methodology is principally associated with programmed instruction, an approach that does not have broad based acceptance in classrooms (Yount 2001: 103). The founders of the programme declare the method to be ‘traditional rather than conventional’ (ACE 2001a: 18). The method indicates elements of the ‘objective’ or ‘behaviourist’ curriculum model (Tyler 1949, cited in Brady & Kennedy 1999: 97), a model which was practised in conventional classrooms during the 1970s. However, contemporary trends in flexible delivery and open-learning education indicate a resurgence of interest in, and employment of the learning approach, particularly with the advent of e-learning (Tiene & Ingram 2001; Anderson & Fretzin 2004; Torgerson et al. 2004; McLaughlin 2004; Koukel 2005).

Recent reference to the ACE programme in scholarly literature is sparse (Kelley 2005), and support is rare. Nevertheless, graduates of the programme have successfully completed tertiary studies and / or gained employment. It is also acknowledged that some students leave the programme to complete their senior secondary studies with other education providers. While strengths and weaknesses of the programme are assumed, graduates of the programme have apportioned disadvantage to the difficulties they have encountered gaining recognition of their educational achievement. Indeed, for many years tertiary institutions remained unfamiliar with the ACE Grade 12 College Entrance Certificate as the National Senior Certificate was predominantly presented by other school students.

However, the “ACE School of Tomorrow’s own self-paced examination certified as the ACE School of Tomorrow College Entrance Certificate (previously called Grade 12
Graduation Certificate) does not have the same recognition as an endorsed or unendorsed senior certificate for purposes of admission to first degree studies at a public South African university” (SAUVCA 2004). The perception that ACE graduates have no official status after completing a non-conventional education programme, understandably elicits questions about the effectiveness of the programme to prepare students for tertiary education. While the literature indicates that various studies have examined the ACE programme practice (Beeke 1992; Burley 1986; Butler 1995; Hunter 1982, 1985, 1994; King 1990) and some of the curriculum units (Fleming & Hunt 1987; Speck & Prideaux 1989) (largely based on the experience in Australia), there is a paucity of formal research making enquiry of ACE graduates (Carins 2002), to ascertain their perceptions of the programme, its strengths and weaknesses.

This study has been prompted by my professional interest and experience. I, the participant researcher, am the research and quality assurance officer for Accelerated Christian Education Ministries (Africa and Scandinavia) with one of my primary responsibilities being the accreditation of the qualification. During my years of employment with ACE (November 1998 – present), I have also served as the examinations officer (ACE offered Grade 12 examinations for a period of 6 years from 1998 – 2002), and as the graduations officer responsible for the processing of the Grade 12 College Entrance Certificates. My personal experience has included using the ACE programme as the core curriculum for my own children – one at an ACE school and one on the home education programme. Observations made during these years revealed not only variations in the procedural management of the programme in homes and schools, but also the post-school experience of graduates, indicated by their successful education and employment outcomes.

A study that explores graduates’ perceptions of the programme’s attributes, both positive and negative, could make a positive contribution to the management of the programme in schools.
1.2 DISCUSSION OF THE PROBLEM

The departure point of ACE can be summarized as follows:

“The curriculum is built on a theistic philosophic foundation. Students learn to see life from God’s point of view. Their personal relationship with God and their personal responsibilities to family, church, and community are of primary concern” (ACE 2005). Coupled with this, though, is a focus on academic excellence based on the philosophy of mastery learning (ACE 2001a: 3) which posits that given time, and good instruction, almost all students will be able to 'master' what they are asked to learn (Entwistle 1994: 293). Mastery learning is founded in behaviouristic approaches (ACE 2005) rather than constructivist approaches to education, such as outcomes-based education (Fiske & Ladd 2005: 174).

The pedagogic approach used in the academic programme is “individualised learning” not in its content, but in that every student progresses through the programme at his/her own pace; this learning is facilitated by an educator who deals with each student’s individual problem as it arises.

The ACE programme is, therefore, an alternative system to the prescribed public schools system, in many ways, as summarized below:

- its philosophy is Christian; the public school philosophy is humanistic;
- its methodology is mastery learning – essentially behaviouristic; the public school system is outcomes-based education – essentially constructivist;
- its exit qualification is the School of Tomorrow Grade 12 College Entrance certificate; learners at public schools write the National Senior Certificate examinations.

In my experience with Accelerated Christian Education, it has become very clear to me that the alternative nature of the ACE programme has been problematic. For example,
many parents send their children to an ACE school until the end of Grade 9, and then transfer them to public schools to complete their matriculation examinations. Their stated reason is the problem of getting their children into university because they have to go via the Senate’s Discretionary route. This has been confirmed in several casual conversations with a number of school principals who are required to submit an annual statistical return (see Appendix 2) to the ACE office in Durban. One of the questions asked on this return is about changes in numbers of pupils in the school and the reasons for this – at the senior secondary (FET) level, the reason often given is parental concern over the validity of the Grade 12 College Entrance Certificate. Although many tertiary institutions in South Africa are accepting ACE graduates, (see Appendix 1) this acceptance is sometimes limited to certain faculties, or students are expected to meet additional requirements such as entering an access programme before being taken into an undergraduate degree.

The alternative nature of the ACE programme gives rise to the following research question:

“How do ACE graduates, their parents and university admissions officers currently view the ACE programme in terms of its ability to produce students who are capable of successfully completing undergraduate studies?”

Linked to the research question, the following questions come to mind:

- How does the ACE system, curriculum and methodology differ from OBE? (See Section 2.4.)
- How do graduates from the ACE system view their schooling, particularly the FET years (Grades 10 -12)? (See Section 5.3.)
- What are the perceptions of parents of learners in this regard? (See Section 5.3.)
- What are the perceptions of admissions officers at the tertiary institutions about ACE graduates? (See Section 5.4.3.3)

1 Permission was not granted to use the ACE Schools Database: samples of comments cannot therefore be provided.
• What are the perceived strengths and weaknesses of the system in preparing learners for studies at tertiary institutions? (See Sections 2.2.4; and 5.4.)
• How are such graduates actually performing? (See Section 5.5.)
• How can the management and implementation of the programme be improved to address any perceived weaknesses and enhance the experience of the participants in the programme? (See Chapter 6.)

1.3 THE AIM OF THE STUDY

The aim of this research study is to explore perceptions of the ACE educational experience when viewed as preparation for tertiary education from a threefold perspective which is attentive to the research question.

The exploratory nature of this study has the potential to extend the understanding of a programmed learning experience while disclosing the perceived strengths and weaknesses of the ACE programme. It also has the potential to improve the management of the programme and thereby improve the preparation of ACE graduates for higher education.

1.4 PARADIGMATIC PERSPECTIVE

Educational research inquiry as a form of social scientific inquiry is broadly defined within paradigmatic research positions incorporating the positivist, the interpretive and the critical (Carr & Kemmis 1986: 45; Lagemann 2000: 71). The interpretive model is distinctively human and social and it suggests that educational actions are the result of definite choices and as such, matters of education are the direct result of active decision-making based upon what is a preferred value or more broadly what represents the dominant cultural value at a particular time (Cranton 2006: 1).

My investigation will use the interpretive qualitative methodology in order to determine the gap between the interpretation of the ACE educational experience and the actual
experience, by examining the perceptions of the ACE programme from the perspective of ACE graduates, their parents and university admissions officers. In allowing programme participants to participate in the study, they will have the opportunity to make a contribution to the world of research while they inform stakeholders of the reality of their experience.

Qualitative research will allow me to attempt to understand “people in terms of their own definition of the world” (Mouton 2001: 194). In using a qualitative approach, I will attempt to understand the ACE graduates’ educational experience from the subjective, insider perspective of the individuals involved.

The task of interpretive social science is to tell of an experience and give meaning to its place and practice, for if it is not identified adequately, questions may be asked of its public place or legitimacy. Carr and Kemmis (1986: 149, 201, 203-205) are aware of this danger and an important part of their argument is that action research must be founded upon ‘the meanings and interpretations of practitioners’. As a review of literature reveals, the ACE programme could be considered to have questionable place in contemporary education while there is the neglected area, the perspective of actual programme participants. The research approach is directed to overcoming this dearth, by employing interpretive qualitative enquiry to capture the perceptions of a representative sample of ACE graduates, their parents and university admissions officers. An imperative of research is to have reliable participants who are able to adequately present information to the study. ACE graduates are likely to be reliable participants, because of their experience with and participation in the programme and with their subsequent experiences at university; their parents are likely to be reliable participants because they have been exposed to some of the issues surrounding acceptance of their children into tertiary programmes; as stakeholders in the process, they have a voice that needs to be heard. University admission officers will have a more objective viewpoint, since they are not directly involved with the ACE programme, but can comment on acceptance issues as well as on the performance of ACE graduates within their institutions. The participation of all three groups will be
voluntary. Furthermore, by volunteering, the participant would have indicated a
willingness to inform the study.

Research theorists identify qualitative enquiry as being suitable to exploratory study. Process evaluations rely on qualitative data: “detailed, thick description; inquiry in depth; direct quotations capturing people’s personal perspectives and experience” (Patton 1990: 40) to inform the study, and the findings permit others “to make more intelligent decisions about the programme” (ibid.: 95). The qualitative approach emphasizes the importance of understanding the context in which events and outcomes occur as well as being particularly useful if you are not sure what to expect (Harding et al. 2005: 7). There is a “widespread acceptance amongst the research community of the value of qualitative data to understand and assess social impact, … where self-reported evidence from participants provides a valid testimony to the immediate, and sometimes more long-term, impact on their lives” (Ruiz 2004: 4). This is the intent of the enquiry.

1.5 DEFINITION OF CONCEPTS

1.5.1 The ACE Programme as a Contemporary Educational Practice

Programmed learning, also referred to as programmed instruction, the ACE curriculum’s methodology, is not considered a regular or conventional educational approach in contemporary schooling. Description of the curriculum format, delivery mode and management procedures will be presented in Chapter 2 to depict the ACE educational experience. A brief overview of theoretical literature will associate the educational practice with the research question. In this study, “ACE programme” refers to the educational programme that uses the ACE curriculum as its principal or core curriculum.
1.5.2 Perceptions

In this study the concept “perception” means “viewpoint” or “opinion”. Perceptions are interpretations of reality that are gained through experience of that reality. Ihde (1999: 216) states that “perceptions are the ways in which reality can be present for humans”.

The literature reveals that the perceptions of South African public education are generally negative, from various quarters: government, newspapers, teachers, parents and students. The literature also reveals that some perceptions of the ACE programme are negative (Fleming & Hunt 1987; Elkins 1992; Kelley 2005).

The White Paper on FET Education (SA Ministry of Education, 1998) states the following:

- “The performance of schools and colleges in the FET band is generally poor. Programmes and curricula are in many cases overly academic, theoretical and out of touch with the needs of learners and the labour market (Para 3.4).
- High failure and repetition rates place a heavy burden on our limited financial resources and on our teachers and physical infrastructure. A culture of learning, teaching and service requires urgent development after years of conflict and struggle. Large tracts of the education and training system do not provide meaningful access to social and economic opportunities. Professional commitment and morale amongst many educators, administrators and managers are poor (Para 3.5).
- Many schools have inadequate facilities and staff, and suffer problems of poor quality, inefficiency and ineffectiveness” (Para. 3.10).

Seven years later, negative perceptions remain. In its analysis of teacher shortages in South Africa, in 2005, the Department of Education states: “The ELRC report indicates that African students are generally not choosing teaching as a profession. This is because of the perceived status of educators and learners’ observations of teaching while they were at school coupled with an increasing availability of other career options to choose
Baloyi (2004: 21 – 25 and 27) cites several instances of problems in schools: lack of basic facilities and teaching materials, working conditions, irregular attendance by both learners and educators, disruptions of the academic programme through class boycotts and industrial action, inadequate preparation by teachers, anti-social behaviour, and lack of security. He goes on to say (ibid.: 27) that “the government’s negative view of educators’ performances is shared by parents”. As a result of such perceptions “many black parents are sending their children to independent and private schools”.

However, perceptions of private or independent education in South Africa are also negative, from a different perspective (i.e. a political one): private education tends to be regarded as “white, affluent and exclusive” (Hofmeyr & Lee 2004: 187). This is corroborated by Lewin and Sayed (2005: 130) who concluded in their research that, “Elite high-cost non-government schools attract aspirant families who value high academic standards, social exclusivity and broad curricula and who perceive many public schools as failing to meet their needs.” The religious issue is another debate. Lewin and Sayed (ibid.: 131) go on to state that “faith-based schools offer an alternative to secular public schools. However, there are concerns from secularists, and debates within faith communities, that some forms of differentiated demand for faith-based schooling may carry risks related to social stratification, cultural autarchy and social conflict.”

Hofmeyr and Lee (op. cit.) also emphasise, however, that, contrary to this perception of elitism, “the sector is now mainly religious and community-based, serves a predominantly black clientele, and typically charges low school fees.” The same study reveals that a comparison of pass rates in public and independent schools shows that the total matriculation pass rate and the total pass with endorsement rate in low- to average-fee independent schools was higher than in public schools. The pass rates were even higher for high-fee independent schools. This finding clearly underscores a quality choice on the part of parents. This finding, however, applies to independent schools that
write the Grade 12 examinations – ACE Graduates do not write these examinations; and the perception is that this then makes the ACE programme inferior, as evidenced by the extra requirements that ACE graduates are required to meet in order to enter tertiary institutions (SAUVCA 2004 – see Appendix 3).

1.5.3 Tertiary Education

Tertiary education is formal, non-compulsory education that follows secondary education. Tertiary education refers, in most settings to non-compulsory education provided via a specialist institution, usually labelled as a college, technikon or university. Tertiary education may be delivered virtually or at a distance. It is not always clear, though, what tertiary education includes. Harvey (2004) asks “Is it only that which results in a formal qualification or might it include leisure classes?”

Campbell and Roznayai’s definition (2002: 133) emphasises certification and continuation from successful secondary education: “Tertiary education: Any education entered after successful completion of secondary education, which may include vocational post-secondary education (leading to a certificate) and higher education (leading to a degree), even though the designation is often used synonymously with higher education.”

For purposes of this dissertation, tertiary education is addressed in terms of “higher education, leading to a degree”.

1.5.4 Preparation for Tertiary Education

Preparation for tertiary education means the development of knowledge, skills and attitudes that will allow learners to deal with the challenges, demands, and opportunities of the college experience. This is an issue that has been explored by many researchers over the years (Hettich 1998; Carter, Bishop & Kravits 1998; Jenkins & Lanning 2002; Orr & Bragg 2001; Elliot 2005). It is necessary to examine this issue given the deep
concern about the ability of South African matriculants to succeed in higher education. The “fall in the retention rate in higher education” has been highlighted in the National Plan for Higher Education as a matter for in-depth research (Cosser 2002).

Reports from Northwest University, (du Plessis 1996) UNISA, (Bredenkamp 2005), Mkhabela (2004 in City Press), and Student Village (2005), among others, all indicate that the failure rate at South African tertiary institutions is a matter of concern. Student Village (ibid.) quotes Education Minister, Naledi Pandor, as saying that “… tertiary education institutions need to re-look at the readmission of students to their institutions. She says students who keep failing should not be allowed to continue their studies indefinitely. Some of her reasons for saying this are: In 2000, 120 0002 students enrolled in the country’s public higher education institutions. At the end of that year, 36 000 (or 30%) had dropped out. A further 24 000 dropped out between their second and third years. Of the remaining 50%, less than half graduated within the intended three years’ duration. Of these “drop-outs”, the vast majority were black students.” Jansen and Taylor (2003: 22) quote the following statistics from the National Plan for Higher Education in South Africa, a Department of Education document, published in 2001: “Higher education … is characterized by major inefficiencies … The average graduation rate at the institutional level was between 6 percent (low end) and 24 percent (high end) in 1998, further distinguished at 17 percent for universities and 10 percent for technikons. In actual student numbers, this means that in 1998 only 89 000 students graduated out of a total enrollment of 608 000 students. Dropout rates – defined as students who do not re-register even though they have incomplete requirements for graduation – are very high. About 20 per cent of all under- and post-graduates drop out of higher education each year with the average for first-year students standing at 25 percent (i.e. the system loses about 120 000 students who do not complete their studies).” In 2006, the concerns still remain: evidence for this is the fact that the Human Sciences Research Council has (in 2006) launched a research project, entitled: “Addressing the High Failure Rate of Black South African Students in Higher Education” (HSRC 2006).

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2 Since these are the *ipsissima verbae* from the quoted source, I have not altered the quoted statistics, although it is likely that these figures are incorrect. See Jansen and Taylor (2003: 22)
Foxcroft and Stumpf (2005: 13) point out “… the fact that on entry to higher education institutions, large numbers of learners are not sufficiently ready (i.e., do not have the required academic, cognitive and personal competencies) to cope with higher education studies.” Lolwana (2005: 69) lays these problems at the door of inequities in the education system and highlights the lack of “quality teaching” as one of the main contributing factors. In the light of this concern, an investigation into the performance of ACE graduates is pertinent.

1.6 RESEARCH DESIGN AND METHODOLOGY

1.6.1 Ethical Measures

The relationship I have with both ACE Ministries and the programme participants demands critical ethical consideration. It is essential that the participants feel protected from coercion and that ACE Ministries itself feels protected from potential breaches of confidentiality. In designing the research instruments, e.g. the questionnaire and the interview, it is imperative that there should be transparency of intent. Participation was based on voluntary participation, with an invitation to participate being extended in writing. Consent was requested from each participant, but they were also advised that they were free to withdraw at any time even if they granted such consent. The questionnaires and interviews were numerically coded to protect the anonymity of the participant, and the safe-keeping, confidentiality and preservation of this anonymity is my responsibility.

Permission was sought from ACE Ministries to access information from its database, as well as authorisation to contact participants, schools and tertiary institutions, and an undertaking given by me that the information derived from the ACE Ministries resources would be utilised for the purposes of this research study.
1.6.2 Trustworthiness

Considerations of trustworthiness are paramount in any research. Establishing trustworthiness ensures the quality of the findings and increases the confidence of the reader that the findings are worthy of attention. A critical group of strategies used to enhance trustworthiness is triangulation, which involves using multiple sources and perspectives to reduce the chance of systematic bias. There are four main types of triangulation – source, methods, researcher and theories (Law et al. 1998: 8). Two triangulation strategies were adopted in this study, namely source, whereby data is collected from different sources such as different people and resources; and methods, whereby different data collection strategies are used such as questionnaires, individual interviews, and archival studies.

1.6.3 Method

A qualitative approach was used in this study. Qualitative research uses a naturalistic approach that seeks to understand phenomena in context-specific settings, such as "real world setting [where] the researcher does not attempt to manipulate the phenomenon of interest" (Patton 2001: 39). Qualitative research, broadly defined, means "any kind of research that produces findings not arrived at by means of statistical procedures or other means of quantification" (Strauss & Corbin 1990: 17) and instead, the kind of research that produces findings arrived from real-world settings where the "phenomena of interest unfold naturally" (op. cit.).

Unlike experiments and surveys, in which the elements of the research design – hypothesis formation, measurement and sampling – are specified prior to data collection, design elements in qualitative research are worked out during the course of study. Rubin and Rubin (1995: 42–43) explain this as follows: “You cannot plan the entire design for a qualitative project in advance, because the design changes as you learn from the interviewing. But you can begin with a rough and tentative design, talk with potential interviewees, sort out initial ideas, refocus the research, and decide with whom else to
talk and about what.” Edson (1988: 45) states that “We undertake qualitative inquiry not so much from our recognition that we do not know all the answers to our problems but rather from an appreciation of the fact that we do not know all the questions.” Against this background, the research design of this study is presented in fairly broad terms at this point.

The most popular qualitative research methods are interviews, observation, and (archival) document studies. I used interviews and archival studies. In addition, I used “open-ended questionnaires” (Harding et al. 2005: 3). Although questionnaires are usually associated with quantitative research, they can be used for qualitative research if focus groups are not possible (ibid.). Whereas a quantitative questionnaire will feature closed-response questions and multiple choice questions to enable statistical analysis, a qualitative approach mandates the use of open questions that allow respondents to fill in their own responses (Ashby & Loughnane 2003: 2). The data collection techniques that were used in this study were:

- Questionnaires sent to graduates, parents and university admissions officers to elicit information about their experiences of the ACE programme.
- Documentation such as unsolicited testimonies from ACE graduates, parents and principals, that were gathered by ACE (Africa and Scandinavia) over the period 2002 - 2005; the information obtained was collected and integrated with the data obtained from the questionnaires, in an attempt to add any other nuances that might reside in these resources.
- Interviews were held with a number of students and parents who submitted the questionnaire. These interviews were “topical interviews” as defined by Rubin and Rubin (1995: 195) which are “focused on subjects that the interviewer has chosen, involve … active questioning and rapid exchanges, and are … concerned with matters of fact ….”
- The data from all the available resources that were utilized during the research process, was integrated and collated, to conclude the data collection stage.
1.6.4 Data Analysis

Analysis involves “lifting an element out of the whole to inspect it more closely” (Ely et al. 1997: 161). The total collection of data was subject to cross content analysis, linked by the questionnaires, interview questions and the archival documents in the light of what is revealed by the literature study.

The questionnaires were used as an initial, thematic probe to collect brief descriptions of the secondary and tertiary education experiences of graduates from the triangular perspectives of ACE graduates, their parents and university admissions officers, and then analysed to detect the perceived strengths and weaknesses of the ACE programme.

Interviews were analysed using the approach of Rubin and Rubin (1995: 226 - 227) who describe the approach as follows: "Data analysis begins while the interview is still underway. This preliminary analysis tells you how to redesign your questions to focus in on central themes as you continue interviewing. After the interviewing is complete, you begin a more detailed and fine-grained analysis of what your conversational partners told you. In this formal analysis, you discover additional themes and concepts and build toward an overall explanation. … The goal is to integrate the themes and concepts into a theory that offers an accurate, detailed, yet subtle interpretation of your research arena. The analysis is complete when you feel that you can share with others what your interpretation means for policy-making, for theory, and for understanding the social and political world.”

1.7 RESEARCH PROGRAMME

The Research Programme was conducted as follows:
Stage 1 started in 2005 with a submission of a research proposal and an exploration of the scholarly literature, as well as consultation with colleagues and professionals in order to shape the research question.

Stage 2 involved an in-depth reading of a wide range of the academic and anecdotal literature available on the various topics;

Stage 3 involved the posting of a research questionnaire to all known ACE graduates who had applied for tertiary studies, allowing for a return date of three weeks and locating the remaining resources such as the unsolicited testimonials, statistical returns from schools, and the ACE database.

Stage 4 involved an analysis and evaluation of the data, with the findings, conclusions and recommendations reported in Chapters 5 and 6.

The writing up of the study was continual. It began when I formulated the research proposal, and concluded with the acceptance of the dissertation. The dissertation consists of 6 chapters:

- Chapter 1 is used to give a general orientation to the study, discusses the background of Accelerated Christian Education, the issues surrounding acceptance and perceptions of the programme, and places the research question in context with the ACE programme. The research methodology is briefly outlined and an explanation given for the use of qualitative enquiry.

- Chapters 2 and 3 comprise a review of the scholarly literature in order to provide an expanded understanding of the concepts outlined briefly in Chapter 1. The chapters examine issues and ideas that will assist the exploration of perceptions of the ACE programme as preparation for tertiary education from a threefold perspective (graduates, parents and university admissions officers). The review includes empirical and theoretical papers that consider the themes of this dissertation. It is acknowledged that recent works should form the basis of the literature review, and to the extent that this is possible, this has been done. There is, however, a paucity of recent comment on the ACE programme which has necessitated reference to works published more than five years ago.
• Chapter 4 describes the employed methodology. The purpose of this chapter is to examine perceptions of the ACE educational experience, with particular reference to the programme’s effectiveness in preparing students for tertiary education. The investigation uses the qualitative approach appropriate to process evaluation, and methods and procedures are discussed in detail.

• Chapter 5 reports and discusses the findings.

• Chapter 6 presents the implications of the study in the light of the research question.

1.8 CONCLUSION

This chapter has described the background to this study and placed the research questions in context with the ACE programme. It appears from initial explorations that the philosophy, the pedagogical approach and the exit assessment for the ACE programme give rise to questions about its efficacy in preparing students for higher learning. These issues are further explored in subsequent chapters using a qualitative approach. The reasons for using qualitative enquiry have been presented, and the research programme has been outlined.
CHAPTER 2: LITERATURE REVIEW: PHILOSOPHY AND PEDAGOGY

The review of literature examines issues and ideas that will assist the exploration of perceptions of the Accelerated Christian Education (ACE) educational experience in the senior secondary years, as preparation for tertiary education.

The literature review has focused on the following:

• Learning theories and pedagogy
• Philosophies of education: Christian education, Outcomes-Based education
• A comparative analysis of curricular approaches

2.1 LEARNING THEORIES AND PEDAGOGY

The following learning theories were examined, namely the behaviourist approach and the constructivist approach, and the ACE programme was analysed to identify any matching features, with the purpose of positioning it within the broad spectrum of educational thought. From these predominant theories, two models of education have emerged, the “acquisition model of learning”, and the “participation model of learning” (Collis & Moonen 2001: 24).

2.1.1 The Behaviourist Model

Behaviourism is a conception of psychology, first systematically stated by John B Watson in 1913, which holds its subject matter to be “the objectively observable actions of organisms that responded to conditions (stimuli) set by the outer environment and inner biological processes” (Encyclopaedia Britannica 1963 Vol. 3: 398). Objectivists believe that knowledge has a separate real existence outside of the human mind and that learning happens when this knowledge is transmitted to the learner by means of directed instruction. This is a traditional teacher-centred approach in which teachers serve as the centre for “epistemological authority” (CBASSE 2000: 227). Under this paradigm,
students are treated as "empty vessels" (Skinner’s “empty box” view of learners – Yount 2001: 103) and learning is viewed as an additive process with new information simply being piled on top of existing knowledge. Programmed instruction, instructional objectives and mastery learning are three methodologies that are based on the tenets of behaviourism. It is important to consider all three of these methodologies since they are features of the ACE programme.

2.1.1.1 Programmed Instruction Model

This model posits that a learning programme begins with a desired competency (also a feature of OBE). Instruction is then designed to present information in a sequential series of small steps or frames, each requiring a response from the learner. If correct, the learner is rewarded (positive reinforcement) and given the next step. If incorrect, the learner is retaught the information before advancing. When learners have successfully negotiated all steps in the programme, they possess the competency.

The main contributor to this model of learning was B. F. Skinner, who was considered the father of “operant conditioning” – the pedagogy developed out of this was Programmed Instruction. Skinner believed that, since students learned at different levels, they could not be taught at one level of instruction. Programmed instruction could be used individually by students, and each student could progress at her/his own pace. Stimulus and response could create a learning "chain" to teach higher-level skills, by arranging appropriate “contingencies of reinforcement” (Skinner 1958: 2). During the 1950's and early 1960's these types of "drill and practice" programmes were widely used throughout the public school systems world-wide.

Programmed instruction maximizes learner reinforcement (reward) and also the amount of interaction between learner and information. Programmed instruction methods are found in textbooks, computer programmes, as well as some types of Christian school curricula, most notably Accelerated Christian Education (Yount 2001: 103). The ACE Procedures Manual (ACE 2001a: 105) confirms this – “The pupil must be controlled and
motivated to the point where he assimilates, uses or experiences the material” and “the pupil’s learning must be rewarded.” A system of “tangible and intangible rewards such as praise, stars, privileges,” (ibid.) is emphasized in the ACE programme.

2.1.1.2 Instructional Objectives Model

This is a widely-used model developed by the prominent educator, Benjamin Bloom (1956) and colleagues in the 1950s. It categorises the cognitive, affective and conative domains and includes a systematic list of thinking skills, in categories and sub-categories such as knowledge, comprehension, application, analysis, synthesis, and evaluation, commonly known as “Bloom’s taxonomy”. The last three are considered higher-order thinking skills.

This model posits that specific observable behaviours need to be performed by the learner. The use of behavioural objectives set opportunities for learning. Thereafter materials, machines, or methods can be chosen, in order to help students to reach these objectives. Bloom developed a procedure for writing complete and precise objectives that stated the terminal behaviour desired, the criterion (standard) by which the behaviour should be evaluated, and the conditions under which the behaviour would be displayed. The curriculum modules (PACEs – Packets of Accelerated Christian Education) used in the ACE curriculum are structured around instructional objectives (see Appendix 4).

2.1.1.3 Mastery Learning Model

John B Carroll inaugurated a fundamental change in thinking about the characteristics of instruction in 1963 when he argued for the idea that student aptitudes are reflective of an individual’s learning rate. In this new paradigm, Carroll (1963: 723-733) suggested that instruction should focus more on the time required for different students to learn the same material. This was in contrast to the classic model in which all students are given the same amount of time to learn and the focus is on differences in ability.
He called this learning rate, LR, the degree of learning, which is demonstrated in the formula: $LR = f\left(\frac{\text{time spent learning}}{\text{time needed to learn}}\right)$. This describes that the learning rate is a function of the time a learner has available to learn to the time he actually needs to learn a given situation of instruction. Carroll's theory was based on the idea that all learners can have the potential or aptitude to learn any instruction given, but take different amounts of time to do so. Students are not then seen as good or bad learners, but as fast or slow learners.

In 1989, Carroll further developed his model and identified four factors that affected the learning rate of a student, namely: opportunity to learn, the quality of instructional events, the ability to understand instruction, and the perseverance of the student. The first two are controlled by the teacher; last two are controlled by the student. (Carroll 1989 as cited in Reeves n.d.: 1)

However, it was Bloom, in 1968, who fully developed the concepts now known as Mastery Learning. This approach is espoused by ACE (ACE 2001a Vol. I: 211). In the 1960’s, Benjamin Bloom was involved in research on individual differences as applied to learning. Impressed with Carroll’s ideas, he took them further by concluding that if aptitude could predict a learner's learning rate, then it should be able to set the degree of learning expected of a student to some level of mastery performance. The instructional variables, such as the opportunity to learn and the quality of the instruction, would be under an instructor’s control. Thus, the instructor should be able to ensure that each learner can attain the specified objective. The educator’s mission, Bloom believed, was to arrange the environmental conditions to help realize whatever aptitudes individuals possessed (Eisner 2004: 1). Bloom concluded that given sufficient time and quality instruction, nearly all students could learn (Hwang & Wang 2004: 292).

The theories of Mastery Learning resulted in a radical shift in responsibility for teachers; namely that the blame for a student's failure rests with the instruction, not a lack of ability on the part of the student (Callahan, Clark, & Kellough 1998: 15). In this type of
learning environment, the challenge becomes providing enough time and employing instructional strategies so that all students can achieve the same level of learning.

As a matter of curriculum development, mastery learning does not focus on content, but on the process of mastering it (On Purpose Associates 2001). Kazu et al. (2005: 3) state that “curriculum materials can be designed by in-house instructional designers, or via a team approach using various professionals in a given setting e.g. a school. Alternatively, instructional materials can be obtained via prepared materials from an outside commercial source. However the instructional materials are developed or obtained, the teachers must evaluate the materials they plan to use to ensure that they match the instructional objectives set up for a given course of instruction.” An example of this would be the approach adopted by ACE (S.A.) where the curriculum materials produced in the USA are reviewed for relevance to the requirements of the South African curriculum and adapted if necessary. For example, if a PACE deals with money, weights, national history or geography, this PACE is usually replaced by a South African version.

Of the positive outcomes of mastery learning, independent learning and high self-esteem are prominent results (Nave 1990: 3). Independent learning occurs during mastery learning because students are encouraged to move on to greater tasks as they achieve lesser tasks. Therefore, mastery learning lends itself to students building high self-esteem because they gain a sense of accomplishment when tasks are completed correctly.

The mastery learning theory finds application in the ACE programme that allows for an individualised approach where students determine their own goals on a daily basis (i.e. how much they will individually learn in that day) in order to reach their medium-term and eventually their long-term goals. Students then progress at different rates through the programme, but all eventually arrive at the same point of “mastery”. In addition, this has a Biblical basis – knowledge and skills must be taught in the proper order, that is, "line upon line; precept upon precept" (Isaiah 28:10, KJV).
Beyond using the principles of mastery learning to teach students, many teachers have discovered the value of teaching students to understand and identify the components of the instructional process (also called metacognition or learning about learning). Metacognition also includes self-regulation – the ability to orchestrate one's learning: to plan, monitor success, and correct errors when appropriate – all necessary for effective intentional learning (CBASSE 1999: 85). In this way, students can give educators more accurate feedback as to where they are missing the mark with them. By means of a PACE, called the “Student Orientation” PACE, learners coming into an ACE school are trained in the instructional process adopted by ACE. They thus gain an understanding of the concept of self-instruction as well as how the programme is managed.

The behaviourist learning theory supports the use of self-instructional, sequenced, small unit texts, modelled in ACE PACEs, and programme management structures that incorporate time, environment, reinforcement and controlled behaviour precepts – these being key principles of the ACE system. Some studies reveal that this approach is problematic. Speck and Prideaux (1993: 283), concluded that this was an approach that excluded other kinds of learning methods, and that there was a perceived lack of group learning activities, that group learning skills were not “valued” and children using the ACE materials would lack social and verbal skills. An empirical study undertaken by Butler (1995: 7) concluded that “programmed instruction materials did not have broad-based acceptance in the classroom” because there was a lack of student-centred learning and critical-thinking skills. Speck and Prideaux (1993: 293 & 283) also concluded that a programmed learning approach does not cater for individual learning styles or critical-thinking needs. They considered that ACE students would have “conceptual and cognitive disadvantage (ibid.: 293) and that ACE graduates would not have “appropriate knowledge, values and skills for participation in …. society.”

To quote Johnson (1987: 521), however, in rebuttal to such assertions: “Can they fairly intimate that there is no scholarship or critical thinking?” Johnson, the incumbent vice president for development, Accelerated Christian Education (USA), at that time, claimed that “the most astute and prestigious evaluations of our curriculum pale into
insignificance when the light of ACE accomplishments is shone onto the issue….
Hundreds of ACE graduates have been accepted into colleges and universities.” Some
twenty years later (2006), this is also evident in South Africa where some 240 ACE
graduates have been accepted into tertiary institutions since 2002 (ACE Graduations
Department database). The lack of empirical research pertaining to ACE graduates is
again revealed when contemporary substantiation is required and therefore precludes a
more in-depth review.

The correlation between OBE and mastery learning (with its behavioural philosophical
foundations) is a matter of debate. Researchers differ on whether OBE is a behaviourist,
mastery-based philosophy. Fakier and Waghid (2004: 3) in their critique of outcomes-
based education, state that OBE is grounded in the mastery learning approach:

King and Evans (in Capper 1993: 2) trace the roots of OBE back to that part of
the USA education system which has developed over a period of thirty years
(1970s – 1990s) and which includes the work of Tyler and Bloom. OBE assumes
that all students have the capacity to learn and succeed whether gifted, disabled or
in-between. Schools, therefore, control the conditions that determine whether or
not learners are successful. Furthermore, Spady (1994: 123) claims that illiteracy
and failure are neither inevitable nor acceptable. The vehicle that makes this
success a reality in the OBE approach is located in mastery learning (my
emphasis). Mastery learning, according to Torshen (in Naicker 1999: 48)
drawing on the work of Carroll and Bloom, is the name that is given to a model
being used to structure a curriculum. According to him, the mastery process
operates on the proposition that almost every student can learn the basic skills
and knowledge that is the core of the school curriculum when the instruction is of
good quality and appropriate for him (her) and when he (she) spends adequate
time in learning (Torshen in Naicker 1999: 48). The assumption here is that ...
the ability (intelligence) does not set a cap on the amount that a student can learn,

3 It is interesting to note that Elkins (1992: 23) maintains that the ACE “programme … attempts to
eliminate failure from the student’s experience.” (See also para 3.3.16)
but rather on the time needed to master the material (Carroll in Capper & Jamison 1993: 3).

According to Baloyi (2001: 171), however, “In OBE, the emphasis is not on learners’ mastery of prescribed subject matter, (my emphasis) but on programmes of experience and growth. Formal instruction by the teacher is replaced with informal group activity sessions. Separate subject teaching is replaced with holistic projects that link up with life in the learner’s community.” The differences in opinion regarding OBE as “mastery learning” need further research.

2.1.2 Cognitive Theories

Because concerns about the behavioural methodology have been raised, the place of cognition in learning theory and practice has relevance to this study. The cognitive theory of learning, demonstrated when “the teacher selects tasks … and elicits student’s reasoning in relation to these tasks” (Brady 1995, cited in Brady & Kennedy 1999: 119) the “critical pedagogy” of Gore (2001: 4), reflects the child development theories of Piaget (1977) and Bruner (1956). This theory finds expression in The Manifesto on Values, Education and Democracy, in which the development of critical-thinking skills is stated as a core goal of education (DoE 2001: 9).

2.1.2.1 The Constructivist Model

The concept of constructivism has roots in classical antiquity, going back to Socrates' dialogues with his followers, in which he asked directed questions that led his students to realize for themselves the weaknesses in their thinking. The Socratic dialogue is still an important tool in the way constructivist educators assess their students' learning and plan new learning experiences. The basic tenet of constructivism is that humans construct all knowledge in their minds, so learning happens when a learner constructs both mechanisms for learning and her/his unique knowledge, coloured by culture, experience and aptitude. In this century, Jean Piaget and John Dewey developed theories of
childhood development and education, which we now call Progressive Education, that led to the evolution of constructivism (Benson 2001: 31).

Piaget (1983: 704) believed that humans learn through the construction of one logical structure after another. He also concluded that the logic of children and their modes of thinking are initially entirely different from those of adults. The implications of this theory and how he applied them have shaped the foundation for constructivist education.

Dewey called for education to be grounded in real experience. Benson (2001: 29) states that Dewey viewed the school as a “miniature community or embryonic society, in effect, a democracy. School is the indispensable laboratory, the testing ground for both the society and the building of a philosophy of education. In the school, both individual and social problems are solved. It is the process of reconstructing the educational experience.”

Because of the many interpretations of how students learn, finding one definition of constructivism is quite difficult. Essentially constructivists attempt to account for and remedy perceived deficiencies in behaviourist and information-processing theories and help students make learning meaningful. They hold that individuals construct their own understandings of the world. Students use tools to help them understand their experiences and those tools may be cultural, economic, physical tools, or mental tools. Among the educators, philosophers, psychologists, and sociologists who have added new perspectives to constructivist learning theory and practice are Lev Vygotsky (1978), Jerome Bruner (1966), and David Ausubel (1978).

Vygotsky (1978: 86) introduced the social aspect of learning into constructivism. He defined the "zone of proximal learning," according to which students solve problems beyond their actual developmental level (but within their level of potential development) under adult guidance or in collaboration with more capable peers. Bruner (1996: 49) initiated curriculum change based on the notion that learning is an active, social process in which students construct new ideas or concepts based on their current knowledge.
According to Ausubel (1963: 22), meaningful learning occurs when the learner is able to “relate substantive (as opposed to verbatim) aspects of new concepts, information, or situations to relevant components of existing cognitive structure in various ways that make possible the incorporation of derivative, elaborative, correlative, supportive, qualifying, or representational relationships”. Ausubel distinguished between factors related to the material and factors related to the learner in specifying whether learning is potentially meaningful. For learning to be potentially meaningful, the new material must be related in a nonarbitrary way to concepts previously learned, which is a characteristic primarily of the material itself, and the new material must be compatible with the existing cognitive structure of an individual learner, which Ausubel (ibid.: 26) defined as “an individual’s organization, stability, and clarity of knowledge in a particular subject matter field at any given time”. According to Ausubel, if learning is meaningful, it is more likely to be achieved more quickly, to be transferred to new situations, and to be retained over time.

Each theorist prescribes certain duties for the student. Bruner's students, for example, would be encouraged to be inquisitive, to develop hypotheses and then experiment. Ausubel's students would be directed to recognise differentiated and integrated structures in course content using such methods as content outlines, transition or linking sentences, direct summaries of content, metaphors, analogies, concrete examples, models and advance organizers (Burge 1993: 15).

Constructivism, according to Cunningham (1992: 36), can be considered “a powerful factor influencing what is learned.” This learning theory, therefore, has serious implications for education – the main one being the determination of whose values and perceptions should influence the interpretation of what should be learned. The examination of selected Christian programme textbooks, including some ACE PACEs, which, as we have seen indicate a fundamentalist Christian theology, reveal a conflict in
this determination. Long (1996: 153) reported on the themelic school system in Australia, a collective of schools which subscribed to “conservative, Protestant theological traditions”. He identified “fundamentalism”, the espoused philosophy of the ACE programme with the “literal (inerrant) exposition of all the affirmations of the Bible and the militant exposure of all non-Biblical affirmations and attitudes” (ibid.: 163). He recognized that theological and educational differences are not necessarily exposed or obvious (the unintended curriculum: (Ward 2001: 120)) and that denominational persuasion and dogma intensity will vary in educational practices. Long concluded that the paucity of research defining the relationship between theological tradition, the state and the pedagogy prohibits the understanding, and the informing of Christian education pedagogy.

2.2 PHILOSOPHIES OF EDUCATION

Two philosophies are discussed in this section, namely Christian education and outcomes-based education. Christian education is the philosophy espoused by Accelerated Christian Education, while outcomes-based education is perceived to be diametrically opposed to this, being based on humanistic philosophy. It is deemed necessary to examine the major departure points of these two philosophical approaches in order better to understand some of the issues surrounding the acceptance of Accelerated Christian Education as a foundation for tertiary education.

2.2.1 Christian Education

Benson (2004: 27) quotes the work of Lawrence Cremin of Columbia University who defines education as “the deliberate, systematic and sustained effort to transmit or evoke, or acquire knowledge, attitudes, values, skills, or sensibilities, as well as any learning that results from that effort, direct or indirect, intended or unintended.” Taking this definition one step further, Pazmiño (1987: 87) defines Christian education as the “deliberate,
systematic, and sustained divine and human effort to share or appropriate the knowledge, values, skills, attitudes, sensitivities, and behaviours that comprise or are consistent with the Christian faith. It fosters the change, renewal, and reformation of persons, groups and structures by the power of the Holy Spirit to conform to the revealed will of God as expressed in the Old and New Testaments and preeminently in the person of Jesus Christ, as well as any outcomes of that effort.”

This view is also espoused Wilson (1991: 59) who writes: “Education is a completely religious endeavour. It is impossible to impart knowledge to students without building on religious presuppositions. Education is built on the foundation of the instructor’s worldview (and the worldview of those who developed the curriculum). It is a myth that education can be non-religious – that is, that education can go on in a vacuum that deliberately excludes the basic questions about life. It is not possible to separate religious values from education. This is because all the fundamental questions of education require religious answers,” though not necessarily in terms of Christian beliefs.

Values are defined, for the purposes of this dissertation, as beliefs, codes or standards that persist through life and provide a constant motivation toward action (Flynn 1993; Hill 1998; Justins & Sanber 2002). In other words, values are not simply sentiments or inclinations. They find active expression in those behaviours, activities and lifestyles regarded as worthwhile and important.

Christian education is, therefore, grounded in Biblically-based teaching, i.e. the teaching of the Bible is regarded as the starting point for all education. The proponents of Christian education (for example, those who established Accelerated Christian Education) regard the Bible as “truth” on which all knowledge, experience, values and behaviour are founded. Benson (2004: 27) discusses the philosophical foundations of this viewpoint – questions such as the nature of reality, origins and structure of the universe (metaphysics); the sources of knowledge and how people learn that knowledge, and how the quest for knowledge is experienced and observed (epistemology and empiricism); and which values are good and right and how these values influence
behaviour (axiology). For Christian educators, the formulation of all three adjudications – metaphysical, epistemological and axiological – rests firmly on the Bible.

The question as to who determines “the knowledge, attitudes, values, skills, and sensibilities” is a key issue. The most fundamental questions would concern, for example, the origins of life – hence the debate between the creationists and the evolutionists. Another question would relate to citizenship – how we relate to one another within a given societal context; or questions relating to law, marriage, and human rights. The answers to such questions always depend on one’s beliefs and values – which are essentially religious, irrespective of what one believes.

Before the 19th century, in the Western World, school education was essentially Christian (Encyclopaedia Britiannica, Education, History of). Even in South Africa, many schools were established “subsequent to the arrival of Christian missionaries” (Du Toit 2004: 2). During the 19th century, however, two major events occurred which changed the face of education in a major way. Both events happened in 1859: Charles Darwin published “The Origin of the Species”, his “theory of evolution”, the impact of which is felt in almost every educational discipline; and John Dewey, regarded as “the most influential educator in North America in the 20th century” was born (Benson 2004: 29). These two events changed much of the subsequent thinking about education and influenced the development of modern educational philosophies. They also brought non-Christian philosophies to the forefront of educational thinking. Their ideas are briefly discussed below.

2.2.1.1 Challenges to Christian education – Darwin

Darwin’s theory of macro-evolution denies the creationist perspective and can be seen to have influenced scientific thought to the extent that “people have made an absolute out of evolution. Out of it, the fabric of a new religion has been woven” (Wolterstorff 2002: 45). Wolterstorff (ibid.) goes on to say, “To make a religion out of evolution is, of course, to act in conflict with the Christian faith.” However, evolutionary thought is
woven into modern curricula, such as the South African National Curriculum Statement; for example in the Human and Social Sciences Learning Area statement for Grade 7, the following is included as part of the knowledge focus: “Human evolution: early hominid discoveries in South Africa and East Africa” (DoE 2002). This approach is problematic to creationists. In fact, the exclusion of the Christian approach to such issues in the draft Revised National Curriculum Statement (RNCS) in 2001, gave rise to vociferous resistance from the Christian community in South Africa (www.cft.org.za, n.d.). After lobbying and protests from many in the Christian community, in the final version of the RNCS, it was conceded that there are alternative worldviews that should be given consideration (DoE, 2004: 43).

2.2.1.2 Challenges to Christian education – Dewey

Dewey is known as “the father of progressive education” (Yount 2001: 107). Benson (2004: 29) states that “Dewey was a “naturalist” and that “democracy, experimentalism, and instrumentalism are … some of the major concepts and designations by which Dewey’s educational philosophy is known”. He rejected “supernaturalism” and rested “humanity’s purpose and possibility of survival upon people’s relationship to nature” (Gangel & Benson 1983: 294). In 1933, Dewey co-authored and signed the Humanist Manifesto, which was the Americanized version of the Communist Manifesto penned by Karl Marx. The Humanist Manifesto redesigned religion, calling for a one-world “religion” which was not to be chained to “old beliefs” but to be influenced by scientific and economic change. One of the precepts contained in this Manifesto is: “Humanism asserts that the nature of the universe depicted by modern science makes unacceptable any supernatural or cosmic guarantees of human values” (The Bible’s Way to Victory: 1993). Indeed, experimentalists view the Christian metaphysical base as nonverifiable because it cannot be exclusively tested in human experience, since it is a matter of faith.

According to Passow (1982), “John Dewey's influence on educational thought and practice was felt on six continents and brought about in three ways: (1) Dewey's visits to foreign countries; (2) translations of Dewey's books into languages; and (3) the thousands
of foreign students who studied Dewey's philosophy and returned to their countries to become leaders in education.” Lintner (n.d.) concurs: “Dewey's influence in the promotion of progressive education cannot be confined to the American shores. Indeed, it is during the 1920s that Dewey moves from an American education to truly one of international stature.” Thus “the Progressive Movement made a lasting impact on education worldwide. It challenged traditional practices in education and conceptualized the student as an individual with special interests and needs. Without question, the child-centred curriculum emerged as a result of the Progressive Movement. It was within the tradition of Progressivism, too, that the vision of schools as sites for transforming society was maintained, laying a significant theoretical foundation for the work of critical pedagogues and radical education theorists (like Paulo Freire and others) during the last decades of the 20th century” (Schugurensky & Aguirre 2002).

High-sounding as these ideals may seem, the pragmatic approach, espoused by Dewey, is a philosophy based on evolution. It rejects the idea of a spiritual being and creationism, believing that the universe, with man as part of it, is in a process of evolving, having no beginning or end. McKinney et al. (1993: 96 as cited in The Bible’s Way to Victory, 1993) puts it this way: “Man's authority is his experience. There is no ultimate or absolute truth. Truth is always tentative, can only be derived from human experience, and can be modified or rejected by future experiences.” All knowledge to an experimentalist must be “considered temporary and conditional. Indeed, the word ‘truth’ is an equivocal term that is hazardous to use in experimental theory …” (Van Cleve & Young 1976: 147). To a Christian, however, truth is absolute – it is a fundamental characteristic of statements from Jesus (John 1: 17). The apostle Paul, writing to the Romans (Romans 1:25) indicates that truth is the message that humanity represses and has exchanged for a lie due to their unwillingness and failure to worship their Creator God.

Education that is based on and permeated by constructs of evolution, relativism and humanism cannot be entertained by Christian believers. Hence the development of programmes like Accelerated Christian Education.
2.2.2 The ACE Programme as an Example of Christian Education

2.2.2.1 The South African setting

The Accelerated Christian Education programme is used in many parts of the world (USA, Australia, United Kingdom, various South American countries, the Philippines and Singapore to name but a few). The ACE website (www.aceministries.com 2006c) indicates that “Accelerated Christian Education is dedicated to providing Biblically based, individualized educational materials and services to promote character development and educational reform around the globe. Accelerated Christian Education's worldwide team of professional educators currently serves over 7 000 schools, one government contract, and thousands of home educators in 135 countries.” It is therefore pertinent to this study that the use of the programme in the context of South Africa should be examined in order to understand some of the challenges and conflicts that exist between the ACE system and the traditional public education system.

The freedom to choose a student’s educational environment is part of democratic society. The South African authorities have supported this freedom by funding both public and independent schools to varying degrees (DoE 1999). Many ACE schools receive some form of subsidy from the relevant provincial department of education. This does not extend to home schools. Schools offering the programme are expected to espouse Christian beliefs and a Biblical worldview in terms of the ACE Purchase Agreement that schools sign when starting an ACE school, although schools are not owned or managed by ACE Ministries. However, the freedom to choose is limited in that all schools are expected to subscribe to the national curriculum in terms of the Education Laws Amendment Act 2002, Section 6A (SA Government Printers, 1996).
2.2.2.2 The curriculum model

The reasons for choosing a non-government educational programme are many and varied, and research, gleaned from statistical returns to ACE Ministries (SA), reveals that Christian beliefs influence adherence to Biblically-focused programmes (Ray 2002: 7). The ACE programme is based on the ACE programmed-learning curriculum, which was inspired by fundamentalist Christian beliefs reflecting the philosophical influence of the founding director, Dr Donald Howard. Programmed-learning integrates both learning and teaching components and the ACE programme’s principal delivery mode is linked with a ‘behaviourist’ or ‘objectives’ learning approach as defined by Skinner (1968: 64).

While some theorists seemingly reject the method, Brady and Kennedy (1999: 119-120) point out that a variety of learning approaches can be part of any programme.

... a great variety of methods may be used within these models. ... independent learning, for instance, may involve programmed instruction, experiential learning and project work, and questioning may be used to elicit recalling, comparing, classifying, interpreting, generalizing, predicting, analyzing and so on, which may be seen as methods in their own right.

These methods are inherent in the ACE programme but practice fulfillment is dependent on the programme provider.

As previously mentioned, consideration of curriculum needs and education objectives has contributed to academic debate throughout the ages. King (1990: 2), in a Western Australian review of the ACE programme, identified ‘five conceptual dimensions’ which assist in identifying the objectives of the ACE Programme: ‘Christian education philosophy, individually prescribed education, self-instructional learning mode, continuous progress concept for student advancement, and catering for individual and group needs’, as described in the ACE Procedures Manuals (2001a). Specific
objectives are identified and introduced at the beginning of each curriculum unit, or PACE, the content of which is outlined in the Curriculum Scope and Sequence of the regional provider (ACE 2001a Vol. 1: 237-370 and ACE 2006b: 1-37).

2.2.2.3 ACE programme structure and management

The ACE core curriculum has been developed as self-instructional material, composed of 144 PACEs offering thirteen levels of curriculum, from Pre-school to senior secondary level, Grade 12. Each PACE contains material equal to approximately three week’s study time, with twelve consecutive PACEs in a subject constituting a grade. As Maslen (1982: 257, cited Welch 1996: 91) reports, the curriculum is broken down into a dozen ‘bite-sized achievable learning objectives’. In the General Education and Training (GET) phase, the core, principal curriculum includes the subjects of Mathematics, English, Afrikaans (currently the only additional language for which LTSM’s are provided by ACE, South Africa, although schools may choose to teach the other official languages); Social Studies, Science, Word Building (Spelling) and Etymology (Word study), and Literature. At the Further Education and Training (FET) level, additional subject options include Biblical Studies, Computer Applications Technology, Accounting, Business Economics, and Technical Drawing as well as a substantial number of elective courses. (See Academic Projection: Appendix 6).

Fleming and Hunt, (cited in Butler 1995: 9) despite their generally unfavourable report on the content of the ACE curriculum, commented, however, that:

For the most part PACEs are well written, present information clearly and are organized around explicit objectives. The use of examples, practice exercises, systematic reviews and cumulative exercises illustrate the incorporation of commonly accepted, sound principles of pedagogy.

The ACE curriculum is designed for ‘mastery by all students’ (ACE 2001a Vol.1: 3), not just exposure. It is a multi-track curriculum designed to meet every student at the level of his/her ability. The student is required to master each objective sequentially.
before proceeding to new material: ‘confidence is built as the child gains a firm understanding of foundational skills’ (ibid.).

The curriculum was developed for an international clientele. Since the curriculum is written in small units, it lends itself, however, to the inclusion of national content in locally-developed PACEs. ACE Ministries (South Africa and Scandinavia), the national distributor of the materials, develops national curriculum within the economic means of the company. The current focus is on writing materials for the FET band (implemented for Grade 10 in 2006).

Curriculum enhancement is an essential component of the programme. Curriculum enhancements are provided in elective courses relevant to a student’s ability and / or learning needs and interests. Most school programmes, and a number of home programmes include preparing students for the annual student convention which provides a broad range of educational activities. Student convention has a unique place in the ACE programme. The All Africa Student Convention is held annually, providing opportunity for students to compete in more than 130 events in academics, music, art and craft, platform arts, photography, athletic and field events. Successful competitors are able to compete in the International Student Convention, held each year in the United States of America.

A senior secondary student’s programme is focused on the attainment of a Grade 12 qualification. The academic needs and vocational expectations of each student are considered with graduation determined by achievement, not chronology (ACE 2001a Vol. 1: 34). Course options are selected relevant to compulsory and elective subject requirements including ACE curriculum, school or other accredited courses. The attainment of a Grade 12 College Entrance Certificate is a pre-requisite for continuing studies at tertiary level. If students wish to study at a university, an additional requirement is the Scholastic Aptitude Test (SAT) with a score of 1050 points (subminimum of 500 on each of the two components of the test) (SAUVCA 2004). A
review of the graduate database of ACE, shows that the majority of students applying for tertiary studies, write the English and Mathematics test components.

Other certificates issued by ACE are the Grade 12 General Certificate, attainment of which is considered adequate for other vocational training and employment situations; and the Vocational Certificate (for academically challenged students – NQF1 level). Credit is given for non-ACE courses when the course and achievement level is deemed suitable for a Grade 12 level (ACE 2006a: 3).

The ACE programme is a structured programme for all grade levels – Grade R to Grade 12 – within the context of a Biblical world view. Administration procedures and management practices, including adherence to the ‘learning centre’ or classroom plans, which even detail ‘office’ or desk design, are all outlined in the School of Tomorrow Procedures Manual (ACE 2001a Vol. 1: 138-139). The completion of the Supervisor’s Training Course is expected of all programme supervisors, who are deemed the principal educators. This training provides educators with an orientation to the pedagogic approach of the ACE programme.

2.2.3 The Pedagogy of ACE

2.2.3.1 The Five Laws of Learning

As the “philosophy of teaching” is oriented to the “philosophy of learning,” the objective of the ACE programme is to produce the best academic results by implementing the best techniques and procedures for the individual learner. After decades of development and evaluation, the pedagogical approach of ACE can be summed up in the following “Five Laws of Learning”, related to basic Biblical principles, and illustrated by the donkey and the cart (ACE 2001a Vol. I: 49-50).

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5 An ‘office’ is a student desk, separated from other desks by means of partitioning. ACE classroom seating arrangements are usually circular as opposed to traditional classroom rows across the room.
I. How heavy is the load? (assigning the level)
II. How long is the stick? (setting the goal)
III. How effective are the controls? (providing the motivation and control)
IV. How hungry is the donkey? (determining the measurement)
V. How big is the carrot? (ascribing the rewards)

2.2.3.1.1 Assigning the level (ACE 2001a Vol. 1: 53 ff)

The pupil must be placed on a level of curriculum where he can best perform. Level acknowledges that all students are different. So we, being many . . . Having gifts differing according to the grace that is given to us . . . . (Romans 12:5-6)

Subject specific diagnostic tests are given to students at enrollment. The tests measure a student’s knowledge and skills of a particular subject (mathematics, English, etc.) in order to determine where a student should start on the programme. This is in line with the individualized approach as not every student will start at the same point in the programme except if they come in to the school in Grades R or 1. Diagnosing and comparing a student’s academic status and potential are beneficial to both the parents, who want the best education for their child, and the educators, who will consult with and advise the parents and then carry out the educational plan.

2.2.3.1.2 Setting appropriate goals (ACE 2001a Vol. I: 79 ff)

The pupil must set reasonable and appropriate goals which he can be expected to achieve in a reasonable and prescribed period of time. Goals reflect good judgment. For which of you . . . sitteth not down first, and counteth the cost . . . . (Luke 14:18)

- Identifying the Goals

The second Law of Learning requires the staff to provide students with clear instructions and consistent controls and to help the students set and meet their goals.
Goal setting and goal checking are the keys to academic and personal achievement (ACE 2001a Vol.1: 79, 83). Students are encouraged to attempt challenging tasks that require them to set priorities, to struggle, to concentrate, to seek alternatives, to budget time, to have goals. It is stated that these tasks build confidence and maturity as students experience accomplishment through effort, determination, and right choices.

- Determining Reasonable Goals

Students must set reasonable goals that can be achieved in a prescribed period of time.

Most students set daily goals in four to seven core subjects at a time. The student should finish a PACE within three weeks. The workload should balance between what the student believes are his easier and more difficult subjects. Since the school year consists of approximately 36 school weeks, students must average two tests per week to maintain adequate academic progress.

Goal setting needs to take into account a range of activities outside of pure academics:

- Participating in opening exercises
- Attending devotions (25-minute class on Biblical principles)
- Reading specific literature selections included with English PACEs
- Taking tests
- Physical exercise
- Breaks/lunch
- Participating in privilege status benefits
- Developing reading skills (Readmaster)
- Developing computer keyboard skills (Typemaster)
- Working on computer projects
During the week, an average student also engages in other activities that need to be considered when setting goals:

- Attending chapel
- Participating in field trips
- Giving oral reports (for privilege and/or to fulfill a literature requirement)
- Working on Student Convention projects (age 13 and above)
- Attending group classes (languages, art and culture, technology, project work).

2.2.3.1.3 Motivation and Control (ACE 2001a Vol. I: 103 ff)

- Inspiring Achievement

The pupil must receive motivation through encouragement and support and achieve control through guidance and discipline in order to assimilate, use, and experience the educational material (ACE 2001a Vol. I: 103). Motivation is that inner desire prompted by the concerned supervisor/teacher, while control acknowledges the necessity for discipline, guidance, and responsible leadership.

A student who believes that others, especially his parents and teachers, believe in him – his worth, his capability, his efforts, and his ability to achieve – will be motivated in his work and play.

The supervisor/teacher utilizes motivation to inspire achievement. The supervisor/teacher’s consistency, love, encouragement, support, and interest build the student’s self-image and confidence and inspire him to greater success.

The strength of the ACE basic curriculum is that it encourages a child to learn independently. A successful supervisor/teacher becomes adept at assisting pupils as they dig out answers, learn how to learn, and mature toward less dependence on staff. When he answers his own question, he builds self-confidence in independent learning.
Discipline and Control (ACE 2001a Vol. I: 115 ff.)

The Biblical guidelines for discipline (all quoted from the King James Version) are as follows:

- Chasten thy son while there is hope, and let not thy soul spare for his crying – Proverbs 19:18.
- Train up a child in the way he should go: and when he is old, he will not depart from it – Proverbs 22:6.
- The rod and reproof give wisdom: but a child left to himself bringeth his mother to shame – Proverbs 29:15.
- Correct thy son, and he shall give thee rest; yea, he shall give delight unto thy soul – Proverbs 29:17.

Discipline is what is done FOR a student, not what is done TO him. It is a preventative action, requiring consistency in love and discipline. By nature, a child rebels against control that suppresses his carnal desires, which can lead to a life of heartache and negative consequences if not corrected. But with discipline and control, he can experience productive achievement.

The use of positive incentive is helpful in motivating and controlling students. One positive incentive is the use of merits, which when earned lead to the allocation of rewards – such as extra break time, half-days off school, or a relaxation of learning centre procedures for a period of time.

Demerits are given for transgressions of the rules, and penalties, such as detention are incurred beyond a certain level. Training children to take responsibility for their actions
means teaching them that they are accountable for committing misdeeds or for omitting required actions.6

2.2.3.1.4 Measuring Achievement (ACE 2001a Vol. I: 91 ff.)

Measuring achievement or assessment, as it is generally known, is critical to student success. The pupil’s learning must have appropriate measurement applied to the results. Measurement of results relates to accountability.

Measurement involves both long- and short-term assessment. ACE provides these services through criterion-referenced tests and norm-referenced tests. The two types of testing measure students’ academic achievement on immediate, subject-specific tasks, (the PACE Tests), and how they rank (or are measured) contrasted to many others in a broad field of students having similar variables (age, range, level, etc.).

Subject tests (the PACE Tests) measure the quantity and quality of the student’s understanding, skill, and progress in specific subjects against the absolute standard of 100 percent of comprehension. Standardized tests reveal whether a student is progressing as expected when measured against a broad population.

- Academic Tests

The ACE curriculum facilitates learning by combining quality academics and built-in controls to enable every student to attain the highest possible level of scholastic achievement. These controls include the Checkup, the Self Test, and the PACE Test. The Checkup is the student’s measurement of his learning of small segments of the PACE. The Self Test is his evaluation of his understanding of the entire PACE. The PACE Test is the supervisor/teacher’s measurement of what the student has learned.

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6 Note: Corporal Correction was one of the penalties that was recommended in earlier years, in terms of the Biblical command in Proverbs 29:15. However, this has been outlawed in South Africa (SA Schools Act 1996, Section 10) and may no longer be used.
• **Checkups**

A Checkup is equivalent to a unit test and may be completed either in the Learning Centre or at home. Although it is not required, students should be encouraged first to complete all Checkups without referring to the PACE text. The student should answer as many questions as he can, then unanswered questions may be researched and answered. The Checkup is used by the student as a tool to evaluate his learning – that is, whether he grasped or missed the objectives of that section.

• **Self Tests**

Each PACE ends with a Self Test that measures comprehension of the PACE material. When the student has completed and scored all the activities, the supervisor/teacher, checks the PACE carefully (especially Checkups).

The student scores his own Self Test; 90 percent is the minimum passing score. If he did not do well, he should note his areas of weakness and refer to those sections in the PACE. A student who scores 70 percent or under is required to review the preceding work and retake the Self Test.

• **PACE Tests**

Each test (paper or computer) is a measurement device, not a teaching tool. If a student scores above 80 percent, he advances to the next PACE. A PACE Test score below 80 percent demonstrates inadequate learning or insufficient mastery of skills. The student who scores below 80 percent is not ready to proceed.

If the student fails a PACE test, the test results are discussed with the student to determine why he failed and the work must be repeated.
• **Standardized Tests**

Standardized tests are given to all students at the end of every phase (Grades 3, 6 and 9). They are supportive and instructive as to where students are in relation to the national norm. This is especially important at the end of the year because it shows progress made.

Standardized tests serve two primary functions:

- helping schools objectively assess the students’ academic potential and progress from year to year with quantifiable test data based on generally accepted models of student academic development and
- providing schools, government entities, and other interested parties with data on academic performance whereby comparison can be made on various levels including comparisons between schools, school districts, provinces, and even nations. (e.g. TIMSS and TIMSS-R).

ACE recommends that all schools participate in standardized testing each year according to a specified academic schedule. Prior to 2004, schools did the California Achievement Tests and the Test of Cognitive Skills but these were withdrawn from the South African market in 2004. ACE (USA) switched over to the Stanford Tests and ACE (South Africa) switched over to tests developed for the South African market by Dr Louise Holman, namely

- the OBEST test (done annually) which
  - identifies how child is performing in relation to OBE curriculum;
  - identifies strengths and weaknesses; and
  - identifies knowledge of curriculum content, and
- and the CFAM test (done bi-annually) which
  - replaces group intelligence and ability tests;
• measures abilities and motivation factors which directly contribute
towards classroom learning and effective writing of tests and
examinations;
• identifies areas of high potential;
• identifies factors that create obstacles to academic achievement; and
• identifies abilities needing extra work or remedial attention.

2.2.3.1.5 Rewards (ACE 2001a Vol. I: 105 ff)

The pupil’s learning must receive recognition and reward for its value, effort, and
significance. Reward is the proper recognition for the student’s effort. Most
achievement in life has built-in rewards, and the Bible teaches that all actions, good or
bad, earn consequential rewards consistent with their nature. (For what things a man
shall sow, those also shall he reap. For he that soweth in his flesh of the flesh also shall
reap corruption. But he that soweth in the spirit of the spirit shall reap life everlasting.
Galatians 6:8, KJV). Although academic achievement is its own reward, it must be
reinforced with enthusiasm, inspiration, and a system of intangible rewards, such as
praise and encouragement, and tangible rewards, such as stars, congratulations slips,
privileges, field trips, and trophies.

2.2.3.2 A consideration of related pedagogical approaches

It is apparent from the overview of the pedagogy of the ACE curriculum that it uses the
“methods as the key” approach as opposed to the “teacher is the key” approach. These
approaches are described below.

The first view, the "methods are the key" view, is based on the premise that methods and
materials of instruction are more important than the teacher's competency or his
professional qualifications. There are two specific forms of this view: the traditional and
the self-instructional forms. Baker (1979: 132 – 133) promotes the traditional form of this
view in his book designed to aid Christian educators in beginning Christian schools. He
develops this form by offering the following suggestions to prospective principals and administrators regarding teachers:

- Teachers should use teaching guides, called "day-by-day teaching curriculums," which provide daily lesson plans for the entire academic year;
- Methods, not the teacher or his professional qualifications, give impetus for academic growth, consistency, and results;
- Teachers should adhere to the day-by-day teaching curriculums for direction in determining student needs and instructional strategies;
- Lesson preparation time is reduced by following the pre-made lesson plans;
- Principals can be confident that teaching and learning have taken place when teachers follow these pre-made lessons.

Still other educators within the Christian school movement promote the self-instructional form of the "methods are the key" view, which is based on the self-instructional approach (the approach that ACE uses) to teaching and learning. Proponents of this form subscribe to at least the following points:

- The teacher is a supervisor, or monitor.
- The self-instructional materials contain all essential subject matter knowledge.
- Students initiate and direct learning by reading self-instructional booklets and completing tests contained in those booklets (Allison 1982).

Tehranian (1997) writes “ACE, for instance, provides all the information, materials, and equipment necessary to set up a school quickly and inexpensively. No one teaches in ACE schools, rather students teach themselves. Little is open to question, all answers lie within the text.” Quoting Rose (1993), Tehranian continues: “The consequences of this pedagogy are remarkable. ACE graduates have scored higher than 65 percent of a nationally representative sample of other students, and their Stanford Achievement Test scores appear to be one year and seven months ahead of the national norm. The
graduates are considered by the military to be superior workers – disciplined, obedient
with respect for authority.”

In criticizing the "methods are the key" view, Herbster (1988: 2) states that it is "a
philosophy [that] exists [in the Christian school movement] that says if you have the
proper textbooks, it doesn't matter who teaches the materials from those textbooks. Any
warm body will do. The emphasis has been put on books instead of on the Christlike
model, the teacher". The inherent danger in practising this view is that the teacher
becomes subservient to the materials and methods, with the results that the professional
qualifications of the teacher are deemed unimportant and recognized as unnecessary
(Tyson-Bernstein 1988). Kelley (2005: 24) also uses this as a point of criticism of the
ACE programme.

The second major view regarding the role of the teacher in instruction is "the teacher is
the key" view (Herbster 1988). This belief is based on the assumption that the teacher is
the most important variable in the teaching and learning process. In this view, the teacher
actively organizes and directs the instructional process for optimum learning results.
Administrators provide the instructional leadership and supervision of teachers so that
they can better influence learning. Furthermore, the content of instruction and the
effectiveness of teaching are largely dependent on a well-qualified teacher who is
competent in subject-matter knowledge, teaching methods, and educational philosophy
(ibid.).

Davis (1994: 5) discusses the major ideas involved in this view of the role of the teacher:

- Teaching requires design and purpose;
- A teacher is required who has "knowledge of the learning step.... [who] needs
educational tools that will enable him to perform his teaching task with skill ... [and
who] needs to develop insight into the student's special ways of responding and
thinking;
The teacher must be heavily involved in the learning process ... [by interacting] with the student by asking leading questions that develop thinking patterns;

The teacher uses "stimulating dialogue, direct(s) hands-on experiences, [guides] independent student work, and [provides] immediate, meaningful evaluation;

The teacher should use "a good teacher's manual [which] provides the teacher with guidance to perform his task well ... [by providing] a sequence of skills, lesson objectives, stimulating learning activities, and suggested questions and dialogue to direct the student's thinking process ...".

The concept that the teacher is the key to the learning process and that materials and methods of instruction are subservient to that teacher was identified in 27 independent research studies (Bond & Dykstra 1967). The results of these studies were pooled to determine the relationship between certain factors, such as pupil, teacher, class and school characteristics with student reading achievement, and to determine the superiority of various reading approaches and methods. From this study, Bond and Dykstra (ibid.) concluded that successful instruction is not entirely dependent upon any single best method of teaching. On the contrary, they determined that several methods can be utilized to produce successful achievement, but that the professional qualifications of teachers provide a better foundation for improved instruction than do instructional methods and materials.

This would appear to be a weakness in the ACE system which focuses more on “methods” and “learning centre procedures” using a self-instructional, individualised approach rather than a “teacher-directed” approach.

Kelley (2005: 24) states in her thesis, that “The ACE curriculum allows for uncertified and under-trained teachers in direct contradiction to thirty years of studies which have concluded that even with the shortcomings of current teacher education and licensing, fully prepared and certified teachers are better rated and more successful with students than teachers without this preparation. ACE justifies the hiring of uncertified teachers by stating that ACE curriculum is self-instructional, and therefore, students do not need
certified teachers as they are taught by the PACEs.” This is directly contradictory to the stated policy of ACE (2001a Vol. I: 123) which states that “Each school using ACE needs at least one professionally qualified supervisor/teacher for every 30 to 50 students, assisted by one or two paraprofessional monitor/teacher’s aides. The usual ratio is 1 supervisor/teacher with 1 monitor/teacher’s aide for up to 30 students and 1 supervisor/teacher with 2 monitor/teacher’s aides for 30 to 50 students. Additional staff members should be hired as the school adds a kindergarten, A B Cs first grade, media station, sports programmes, miniclasses, etc. In a school of 30 students or fewer, the monitor/teacher’s aide might also perform secretarial, physical education, or media station responsibilities in addition to Learning Centre assistance.” It is acknowledged, however, that actual practice in the schools might vary from this ideal.

2.2.4 Claims for the Success of the Programme (ACE 2001a Vol. II: 1 ff.)

The following section includes what the founders and developers of Accelerated Christian Education say about the programme. It provides for a good understanding of how the programme works and provides a foundation for comparison with other systems, either traditional or reformed.

2.2.4.1 Individualised instruction

Perhaps the greatest academic feature of the ACE core curriculum is that students may progress through the PACEs at their own rate. Because the curriculum is truly individualised, students learn the best way – individually. They learn essential academics and explore truths about God and His world without being pressurised to keep up with a group. Duminy (1975:29, cited in Ishmail 2004: 302) also affirmed the principle of individualisation, based on the idea that every child should be assisted to develop according to his own capabilities.

Conventional educational programmes take the student through a spiral of material while introducing him to new skills in sequence. Since students are grouped chronologically,
they are lock-stepped and receive the same material at the same time. However, students do not necessarily all have the same level of maturity as others of their chronological age, and their natural learning rates are not lock-stepped with other students. As the group uniformly passes from skill to skill in the spiral, the students’ actual learning is relative and their achievement varies. The result is that the above-average student may master the skill the first time he is exposed to it, the average student may pick up part of it, and the below-average student will often grasp only a minimum amount or fail to understand it entirely. As the spiral continues, some students stay out in front while others are left behind for a season (or for good).

The ACE programme is designed around a format of building skill upon skill. The scope and sequence ignores the concept of grade level and moves with continuous progress beginning with the first skill to be mastered. Depending on their ability and motivation levels, students may move ahead rapidly or take as long as necessary, but each student masters the material. Students are not locked into a group but progress through the skills as they are mastered.

As the student moves upward, level after level, and the spiral comes around again, he is far better prepared to learn because he has mastered the skill on the previous level. He does not advance until he has mastered each concept. He is not lock-stepped with his classmates but is learning individually and completely before advancing.

Because of its excellent track record of positive results, the ACE curriculum is widely used to assist slow learners. Even with these students’ scores averaged in, achievement levels of ACE programmes consistently hit the top of the academic spectrum (ACE 2001a Vol. II: 221). These results demonstrate that building a strong base of mastery in basic skills enables students to move ahead in each subject.

The individual progression approach is supported by writers on OBE. For example, Kramer (1999:104) makes mention of an independent learning strategy which includes techniques such as reports, interviews, written assignments, research, and projects. He
says that although the learner relies on his or her own efforts, the teacher stills plays an important role in directing and assisting the learner. The teacher becomes a resource for learning rather than the manager and source of all information and instruction. The benefit of this approach is that it helps to pinpoint areas of weakness that learners may have and which the teacher needs to assist with. Ishmail (2004: 303) states that independent learning is a good way to allow for differences in learning styles – slower learners can be allowed more time to complete tasks while faster learners can be allowed to move on to new work without having to set the same time limit for the whole class.

2.2.4.2 Self-contained

To ensure learning in this self-contained system, PACEs include activity questions covering the material presented. Students read a portion of text and complete activities. In upper-level PACEs, cognitive (thought) questions stimulate the student’s mind. He is guided into thinking logically and Biblically.

This self-contained system provides reinforcement through questioning, Checkups, Self Test, and final or PACE Test. It has proven to be a sound and effective means of ensuring mastery of academic material.

2.2.4.3 Godly character training (ACE 2001b: 2-6)

Ongoing character training in the ACE programme is provided to the student from several sources.

- From daily examples of Godly living: e.g. the 60 character traits seen in Jesus and portrayed by teachers, parents and other students;
- From the academic programme’s Biblical foundation: PACEs are based on the Word of God. Each PACE stems from a Biblical foundation and teaches students the manner in which to work and live, memorization of scriptures and a daily devotion time in opening exercises focuses students on how Jesus taught us to live.
2.2.4.4 Development of critical-thinking skills (ACE 2001b: 2-7)

The ACE programme includes specific forms of material and format which aid the student as he develops his capacity for critical thinking throughout his school years. He is encouraged in his ability to think creatively and independently within a Biblical framework. The programme is designed to progress students through all six phases in the development of critical-thinking skills: Knowledge, Comprehension, Application, Analysis, Synthesis, and Evaluation (Bloom’s taxonomy).

2.2.4.5 Socialization (ACE 2001b: 2-7)

A common misconception about the ACE programme is that students have little or no opportunity for socialization in the educational setting. In reality, the ACE programme provides ample opportunity for students to socialize, both with other students and staff, and with parents and family at all-school events. A weekly average of three hours per school day is devoted to socialization activities, including devotions, physical education, privilege breaks, group lessons, and field trips. Not only is there time for socialization during the school day, but sports and other activities also provide interaction between schools using the ACE curriculum. In addition, many schools link to the general district and provincial sporting leagues. (Principal, His Church School, Pinetown; Principal: Queensburgh Christian Academy, Queensburgh – personal communications). Excellent opportunities for socializing and enjoying new experiences come at the annual student conventions.

2.2.5 Concluding Remarks

Academic achievement is one of the greatest strengths of Accelerated Christian Education. Graduates from the ACE programme are attending more than 475 colleges and universities globally with outstanding performance. Nevertheless, the programme aims to develop the whole child by developing character, independence, critical-thinking
skills and social skills. This meets with the following critical cross-field outcomes of the National Qualifications Framework (SAQA 2000: 41):

- identify and solve problems and make decisions using critical and creative thinking;
- work effectively with others as members of a team, group, organisation and community;
- organise and manage themselves and their activities responsibly and effectively; and
- collect, analyse, organise and critically evaluate information.

The discussion has been a somewhat lengthy one, because it is essential to our understanding of the alternative nature of the Accelerated Christian Education programme in terms of modern educational philosophy and practice, such as OBE. The ACE system is based on fundamental Christian principles – evolution and relativism are constructs that fundamental Christianity rejects in favour of creationism and absolute truth, yet evolution and relativism are integral facets of modern curricula. Hence, there is a conflict between what the educational authorities say should be taught and what Christians teach or want to teach.

The issue that needs to be addressed is that there is a perception that a Christian ethos and OBE cannot be aligned. This is probably because OBE has its roots in a humanistic approach to education – and, in this, it is in conflict with Christian principles. The question that arises is whether this conflict is irreconcilable. Further research on this issue is needed, but this is not the focus of this thesis. Nevertheless, the question as to whether this is a barrier to preparation for and success in tertiary studies requires investigation.
2.3 OUTCOMES-BASED EDUCATION (OBE)

2.3.1 OBE as a Philosophy

The beginnings of OBE can be traced back to the 1948 meeting in Boston of the American Psychological Association Convention. At this meeting, a group of behavioural scientists decided to embark on a project of classifying the goals or outcomes of the education process since, as they said, “educational objectives provide the basis for building curricula and tests and represent the starting point for much of our educational research.” (Schugurensky n.d.) The result of the scientists’ deliberations has become known as Bloom's Taxonomy of Educational Objectives, a behavioural classification of outcomes produced by a new curriculum that does away with traditional subject matter and teaching methods. Soudien and Baxen (1997: 4) state that “outcomes-based education has its roots in earlier work on educational objectives …, competency-based education …, mastery learning …; Killen (n.d.) adds, “criterion-referenced assessment” to the list and goes on to say that OBE “has synthesised and extended all these ideas”.

Supporters of OBE see it as “… a means of meeting the needs of all students regardless of their environment, ethnicity, economic status or disabling condition” (Capper & Jamison 1993: 2). There are many educationists, however, who object to OBE, (Fritz 1994; Holt 1994; Schafly 1994; Berlach 2004; Donnelly et al. 2005), not necessarily on philosophical grounds, but on the basis of its being experimental and unproven. In addition, there are also many Christians who object to it on philosophical grounds: for example, its humanistic approach, state-imposed curriculum, or relativistic values (McCafferty & Hammond 2001; Cates n.d.; Christians for Truth 1997). Schafly (1994) sums up the objections as follows: “Unfortunately, that's what Outcome-Based Education is – a process for government telling our children how to live, what to say, what to think, what to know, and what not to know. What the children say, think and know must conform to the liberal, politically-correct ideology, attitudes and behaviour. What they do not know will be everything else. And because they won't know the basics of reading,
writing and arithmetic, they won't be able to find out. OBE is converting the three R's to the three D's: Deliberately Dumbed Down.”

2.3.2 OBE – a South African Perspective

Outcomes-based education is the chosen philosophy of education in South Africa. The problem is that a high percentage of OBE “outcomes concern values, attitudes, opinions and relationships rather than objective information. A large number of OBE’s goals are affective (concerned with emotions and feelings) rather than academic (concerned with knowledge and cognitive skills). Instead of absolutes, students determine what “they” consider values (acceptable) to them. There are no absolutes.” (Cates n.d.). The evangelical movement "Christians for Truth" (1997) explains on its website, that: "Outcomes Based Education has an overwhelming emphasis upon each student's social, ethical and emotional development. Traditional skills are de-emphasised by OBE and, in their place, attention is devoted to attitudes, self-esteem, and other affective … learning behaviours. All children will have to demonstrate correct attitudes to a wide variety of issues.” The question that begs answering is “what is correct?” The educational ethos of South Africa is one that regards the “values that give meaning to each individual’s personal spiritual and intellectual journeys as being crucial to human development.” (DoE 2001: 9 – 10). This is an essentially “religious” statement, in the light of the definitions of education given earlier. In its Manifesto on Values, Education and Democracy (ibid.) the department of National Education states the following about education and values:

Values and morality give meaning to our individual and social relationships. They are the common currencies that help make life more meaningful than might otherwise have been. An education system does not exist to simply serve a market, important as that may be for economic growth and material prosperity. Its primary purpose must be to enrich the individual and, by extension, the broader society.
The Overview of the South African National Curriculum Statement for Grades 10 – 12, states that the kind of learner that is envisaged, is “one who will be imbued with the values and act in the interests of a society based on respect for democracy, equality, human dignity and social justice as promoted in the Constitution” (DoE 2005: 26). The learner emerging from schooling, namely at the end of the Further Education and Training band (i.e. Grade 12) must also demonstrate achievement of the Critical and Developmental Outcomes listed in the NCS. In addition, such learners must have access to, and succeed in, lifelong education and training of good quality; demonstrate an ability to think logically and analytically, as well as holistically and laterally; and be able to transfer skills from familiar to unfamiliar situations (DoE 2005).

By way of comparison, Proverbs 22:6 (NIV) admonishes us to "train up a child in the way he should go and when he is old he will not depart from it.” Christian values are summed up in the Proverbs 1: 2- 4 (NIV) – “wisdom and discipline … understanding words of insight … acquiring a disciplined and prudent life, doing what is right and just and fair … prudence … knowledge and discretion.” Christian education aims at inculcating these values into young people: the ACE programme is used as a tool for doing this. Again, a question that arises is “Are these values incorrect because they are Christian values?” Furthermore, does the inculcation of these values mean that children receive an inferior education, or an education that does not prepare them for citizenship, further study or participation in the economic life of the community and country within which they live? While these philosophical issues are not the focus of this dissertation, these considerations underpin decisions about education that are made by educators, politicians and parents.

2.3.2.1 OBE as a methodology

I have already examined OBE as a theory (or philosophy) of education. However, the systemic structure, classroom practice and pedagogical approach also need some explanation.
The DoE (1997: 6, cited in Ishmail 2004: 15) and Pretorius (1998: viii-ix) believe that behaviourist-driven, content-based curricula have a number of inherent problems, namely:

- A rigidly structured curriculum process which is inflexible and prescriptive;
- An emphasis on academic education to the neglect of skills;
- Norm-referenced assessment leading to competitiveness;
- School education and requirements for careers do not tally;
- A teacher-centred approach; and
- Instructor-led with rote learning from the pupil.

Given this, they see the solution as the implementation of an OBE approach to education. This brings us to a consideration of the methodology of OBE, which has been perceived as a viable education system since the late 20th century. OBE, like most concepts in education, has been interpreted in many different ways, but the three basic approaches are that it is “a theory of education, a systemic structure for education, or classroom practice” (Killen, R: n.d.).

The most detailed explanation of the theory of OBE is given in Spady (1994), who is regarded by many as the world authority on OBE. In Spady’s words: "Outcomes-Based Education means clearly focusing and organizing everything in an educational system around what is essential for all students to be able to do successfully at the end of their learning experiences. This means starting with a clear picture of what is important for students to be able to do, then organizing the curriculum, instruction, and assessment to make sure this learning ultimately happens" (Spady 1994: 1). This approach presupposes that someone (e.g. an education department) can determine what things are "essential for all students to be able to do", and that it is possible to achieve these things through the appropriate organisation of the education system and classroom practices that are then developed accordingly.
OBE can therefore be defined as an approach to planning, delivering and evaluating instruction that requires administrators, teachers and students to focus their attention and efforts on the desired results of education – results that are expressed in terms of outcomes for individual student learning. Within this broad philosophy, there are two common approaches to OBE, namely an approach that focuses on student mastery of traditional subject-related academic outcomes (usually with a strong focus on subject-specific content) and some cross-discipline outcomes (such as the ability to solve problems or to work co-operatively); or an approach that emphasises long-term, cross-curricular outcomes that are related directly to students’ future life roles (such as being a productive worker or a responsible citizen or a parent) (Closson 2002).

The two approaches, discussed briefly above, correspond to what Spady and Marshall (1991: 68) call traditional/transitional OBE and transformational OBE. Spady clearly favours the transformational approach to OBE in which outcomes are "high-quality, culminating demonstrations of significant learning in context" (Spady 1994: 18). For Spady, however, learning is not significant unless the outcomes reflect the complexities of real life and give prominence to the life-roles that learners will face after they have finished their formal education. He does not appear to include the possibility that the approaches are not necessarily mutually exclusive.

The transformational approach to OBE forms the foundation for the implementation of curriculum in South Africa in that it strives to enable all learners to reach their maximum learning potential. It does this by setting the outcomes to be achieved at the end of the process and encourages a learner-centred and activity-based approach to education.

Both approaches are evident in the ACE system. Mastery of the knowledge content and skills presented in the programme is required, but knowledge is not the sum total of what is present in the ACE educational system. For example, character development, based on 60 Christian character traits (ACE 2001a Vol. I: 59 – 63) is fundamental to a student’s development. Character traits (which could also be called values) such as obedience, honesty, respect, creativity, decisiveness, diligence, prudence, to name but a few, are not
only taught in a theoretical way, but are expected as part of the behaviour of learners in an ACE school. Study skills are also integral to the programme: for example, goal-setting (long-term, medium-term, and short-term), and accountability for achievement of those goals are defining characteristics of the ACE system (ibid: 79-82).

2.3.2.2 The pedagogy of OBE

OBE teaching methodologies include the following (Ishmail 2004: 192 – 196):

- Teachers’ use of a variety of teaching methods such as learning checks, metacognitive reflection exercises, graphic data organizers (e.g. mindmaps), learner-designed tests, and extended practice opportunities. Kramer (1999:100-103) also recommends a variety of teaching and learning strategies. He refers to direct instruction which includes team teaching, guided worksheets, among other techniques, as well as indirect instruction, such as oral presentation, group projects, and research articles.

- Teachers provide for the individual needs of learners: by providing realistic, real-world situations requiring judgment and innovation, authentic contexts, active, hands-on learning, rehearsal, feedback and an opportunity to refine work after initial assessment. Farrant (1988: 142) recommends small group learning in large classes to overcome the problem of large classes where it is difficult to meet individual needs, and a move away from the traditional “whole class teaching” method.

- Teachers provide multiple opportunities for learners to succeed by using continuous, formative assessment which is developmental in nature.

- Teachers employ teaching methods with social learning goals which teach democratic principles, e.g. group discussions. Kramer (1999: 104) cites different co-operative teaching strategies, such as group projects, team-games, jigsaw learning together, buzz groups, research articles, debates, investigations, surveys, interviews and debates.
2.3.2.3 Assessment in OBE

The general approach to assessment according to Kramer (1999: 39), is a formative, continuous approach that makes teaching, learning and assessment part of the same process, as opposed to the “teach, test, teach, test” summative assessment model of a traditional system.

According to the National Protocol on Assessment for Schools (Grades R – 12) (DoE 2005: 5-6) assessment is a process of collecting, synthesising and interpreting information to assist teachers, parents and other stakeholders in making decisions about the progress of learners. The assessment framework of the National Curriculum Statement (NCS) for Grades R – 12 (schools) is based on the principles of outcomes-based education, which comprises two main elements:

- Informal assessment is the daily monitoring of learners’ progress. This is done through observations, discussions, learner-teacher conferences, and informal classroom interactions. Informal assessment is “formative”. Feedback to the learner is an essential part of the process.
- Formal assessment includes projects, oral presentations, demonstrations, performances, tests, examinations, and practical demonstrations, and provides teachers with a systematic way of evaluating how well learners are progressing in a grade and in a particular Learning Programme, Learning Area or Subject.

Schools are required to draw up an annual school assessment plan in each grade before the school year begins. The assessment plan is made available to learners and parents at the start of the year.

2.3.2.4 OBE programme structure

The traditional term “subjects” is rephrased in the RNCS as “learning areas”. These are the domains through which learners in the General Education and Training (GET) phase
experience a balanced curriculum. They also serve as a sound basis for developing learning programmes to be implemented at schools (Janse van Rensburg 1998: 30).

In the GET phase, the following eight learning areas are identified (DoE 2002: 4), namely:

- Language, Literacy and Communication;
- Human and Social Sciences;
- Technology;
- Mathematical Literacy, Mathematics and Mathematical Sciences;
- Natural Sciences;
- Arts and Culture;
- Economic and Management Sciences; and
- Life Orientation.

A series of Teachers’ Guides has been developed to assist educators with the implementation and teaching of these “learning areas” as opposed to the traditional subjects. This is supported by the development of Learner and Teacher Support Materials (LTSMs) by publishers whose publications are then reviewed by the Department of Education and added to an approved list for purchase, if found suitable.

At the FET level, (SA Department of National Education, 2005: 11), the NCS Grades 10-12 (General) departs from the GET terminology of “learning areas” and uses the twelve Organising Fields of the National Qualifications Framework (NQF) for organising purposes and registration on the NQF. These Organising Fields are linked to various disciplines and occupational fields in the world of work and are therefore designed to provide a framework for organising qualifications in a coherent and co-ordinated manner.

Learners are required to take seven subjects within these organising fields for Grade 12, including:

7 The traditional term for this is “textbooks”. 
Two official languages
Mathematics or Mathematical Literacy
Life Orientation
Three elective subjects according to interests or career needs.

This is a departure from the old Matriculation system, with its six subject combinational structure, based on a differentiation of Higher, Standard and Lower Grades, depending on whether a student wanted to go to university or not. Certain combinations of subjects, grade levels and percentages would result in a student receiving a Senior Certificate with an endorsement of matriculation exemption or without endorsement. Those who achieve an exemption are permitted to apply for undergraduate studies.

In 2008, the new Senior Certificate examinations will be written, based on the new structure. There will be no grade differentiation (Lolwana 2005: 72). Instead, an achievement rating will be awarded based on the percentage received in the examination (from 7 – 1), 7 being the highest rating and 1 being the lowest. This will replace the A – G grades that were recorded on the Senior Certificate previously (DoE 2005: 14).

2.3.2.5 OBE programme management

Programme management departs from the old top-down, autocratic, bureaucratic, centrally-controlled strategies of the past, and a more flexible, less hierarchical structure with greater stakeholder participation has been instituted, despite the fact that experience has shown that such a system of assessment is labour- and administratively-intensive (Combrink 2003: 54), considerably increasing the workload of the teacher, and the implementation of complex school management strategies.
2.3.3 Concluding Remarks

This Utopian picture of what OBE “should look like” is somewhat tarnished by a list of factors that create barriers to effective OBE classroom practice (Ishmail 2004: 282 – 291), namely:

- High-learner teacher ratios
- Low morale of teachers
- Ill-discipline of learners
- Teaching multi-cultural classrooms
- High absenteeism rate of teachers and learners
- Poor management of schools
- The inability of teachers to deal with learners who demonstrate barriers to learning
- Poor socio-economic circumstances and non-involvement of parents in homework activities
- Insufficient qualified teachers
- Schools do not make provision for the enskilling of teachers.

2.4 CURRICULUM COMPARISONS

The foregoing discussion of the OBE approach is necessarily brief but it provides a platform for comparison with the ACE approach. It is, however, necessary also to consider that, internationally, OBE has been the subject of considerable criticism (Donnelly 2002; Donnelly et al.: 2005); in some cases outright rejection, particularly in the United States where it has been abandoned in favour of a “standards approach” (Goals 2000); and non-adoption, particularly in Far Eastern countries, such as Japan and Korea.

The concept of curriculum has been the topic of much research over the years, but for purposes of this thesis, the focus will be on the intended curriculum. The definition of curriculum used in the TIMSS research (Mathematical Sciences Education Board and
Committee on Science Education K-12, National Research Council 1996: 3), defines the intended curriculum as the educational system's aims and goals while the implemented curriculum is the actual strategies, practices, and activities found in classrooms; and the attained curriculum refers to student learning.

It is possible to identify three distinct approaches to developing the intended curriculum (Donnelly 2002: 14). The approach to curriculum adopted by those countries associated with TIMSS and TIMSS-R, generally speaking, can be categorized as embracing either a syllabus, an outcomes-based or, in the USA, what is termed a standards approach. As might be expected, how the intended curriculum is defined and enacted has an impact on how successful schools are in achieving high standards for their students.8

Unlike outcomes-based education, a syllabus approach is one where curricula relates to year levels and is expressed in terms of content to be taught, students experience summative assessment and there is often streaming based on a differentiated curriculum (Donnelly 2005: 6). The following table outlines some of the important differences between these three curriculum models. The model has been adapted to include a comparison of the ACE programme with the three curriculum models.

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8 It is interesting to note that those countries that consistently perform at the highest level in international tests, such as Singapore, Japan, the Republic of Korea, Hong Kong, the Netherlands and the Czech Republic, adopt a syllabus approach to curriculum development (Donnelly 2002)
Table 1: Comparison of 3 curriculum approaches (adapted from Donnelly et al, 2005: 6-7) with the ACE approach

<table>
<thead>
<tr>
<th>1: Curriculum Construction</th>
<th></th>
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<tbody>
<tr>
<td>Syllabus – Details what students should be taught/expected to learn at the start of the year</td>
<td>OBE – Focuses on what students should achieve or be able to do by the end of the process</td>
</tr>
<tr>
<td>ACE – A syllabus approach is generally used. A work schedule (called the South African PACE Sequence – see extract in Appendix 5) is centrally drafted under the direction of the ACE Educators’ Board, for all ACE schools, detailing the PACEs per subject that should ideally be covered in any one year. The work schedule has been aligned to the RNCS in terms of a Learning Programme, which matches the content in the PACES with the learning outcomes and assessment standards. The alignment is done per phase (i.e. Foundation, Intermediate or Senior Phase) as opposed to per Grade level.</td>
<td></td>
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<table>
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<tr>
<th>2: Grades/Levels</th>
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</thead>
<tbody>
<tr>
<td>Syllabus – Relates to specific year levels</td>
<td>OBE – Addresses levels which incorporate a number of year levels</td>
</tr>
<tr>
<td>ACE – A syllabus approach is used but the individualised learning approach leads to learners achieving “milestones” at different times.</td>
<td></td>
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</tbody>
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<table>
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<tr>
<th>3: Time</th>
<th></th>
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<tbody>
<tr>
<td>Syllabus – Mandated number of hours</td>
<td>OBE – Number of hours not stipulated</td>
</tr>
</tbody>
</table>
ACE – An OBE/Standards approach is used. The individualised approach demands goal setting by students who then take responsibility for reaching those goals on a daily basis. The number of hours per subject is not stipulated but there is an expectation that learners will complete a year’s curriculum within the time prescribed in the school year.

It should be noted that the OBE description, used by Donnelly in this analysis, does not match the practice in South Africa, where the number of hours per subject is stipulated in the RNCS Overview document. (SA Department of National Education, 2002: 67)

4: Differentiation

| Syllabus – Differentiated curriculum where students are streamed according to interests and ability | OBE – Common curriculum with mixed ability teaching | Standards – Common curriculum |

ACE: A standards approach is used. All students follow the same core curriculum, although they work through it at different rates. All students write the same tests and are expected to achieve a set minimum percentage for mastery to be demonstrated. Differentiation occurs from Grade 10 – 12 (the FET phase) where students select their major subjects.

5: Knowledge Base

| Syllabus – Based on established disciplines/categories of knowledge | OBE – Multidisciplinary approach and emphasis on attitudes, dispositions and feelings | Standards – Based on established disciplines/categories of knowledge |

ACE – A combined syllabus, OBE approach is used. While the curriculum is based on established disciplines and categories of knowledge, attitudes and values also form an integral component of the programme.

6: Curriculum Descriptors

| Syllabus – Curriculum descriptors specific, easily understood, concise and measurable | OBE – Curriculum descriptors vague, hard to measure and overly generalised | Standards – Curriculum descriptors specific, easily understood, concise and measurable |
ACE does not prescribe a curriculum framework but adopts, and adapts to, the national requirements. However, PACEs are written with specific, easily understood, concise and measurable objectives to be reached by the end of the PACE. The OBE descriptors (learning outcomes and assessment standards) have been used as a guideline, with learning and teaching materials (LTSM’s) being designed on the basis of the knowledge focus of the RNCS learning area statements.

Subject matter experts and a team of curriculum materials developers research and write the PACEs accordingly.

### 7: Assessment

| Syllabus – Summative assessment with high risk tests, standardized testing and external, centrally controlled examinations, and consequences for failure, expectation that essential knowledge, understanding and skills are mastered at each year level | OBE – Developmental approach to learning; focus on criteria based, formative assessment based on levels/bands that incorporate 2 to 3 year levels | Standards – Expectation that essential knowledge, understanding and skills are mastered at each year level, summative assessment with some US states expecting students to repeat a year if standards not met. |

ACE – A standards/OBE approach is adopted. A mixture of summative and formative (or continuous) assessment requiring that essential knowledge, understanding and skills are mastered before progress to the next level is permitted. This is both at a micro- and a macro-level. In other words, during the working of a PACE, there are generally three sections of work, each followed by a “check-up”, which provides an opportunity for learners’ self-assessment. In addition, a learner may request academic assistance from the supervisor to help him/her with understanding of challenging concepts or work that the learner does not understand.
At the end of each PACE, there is a self-test on which students must achieve 90% before being allowed to write the PACE test – the summative assessment element on which a minimum score of 80% must be achieved. If not, then the learner must repeat the work.

The opportunity for failure is thus minimized, but the consequences of failure are great. A set of 12 PACEs per subject is planned per Grade level, but the programme is flexible to allow for more able learners to “accelerate” through the programme, doing more than 12, and for less-able learners to progress at their own rate, sometimes taking longer than a year to complete the 12 PACEs.

At the same time, however, learners are encouraged to maintain “academic balance” i.e. not to race ahead in some subjects where they perform better but to focus their efforts on those subjects which are more challenging as well. In this way, the majority of students generally progress according to the planned schedule of work.

This also has implications for year-end reporting and there is no defined progression from one grade to another as in a traditional system.

### 8: Teaching Methods

<table>
<thead>
<tr>
<th>Syllabus – Greater use of direct instruction and explicit teaching</th>
<th>OBE – Constructivist approach to learning</th>
<th>Standards – Greater focus on direct instruction and explicit teaching</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACE – An individualised, learner-directed approach to learning is used. However, direct instruction and explicit teaching is provided in the PACEs. In addition, as previously mentioned, the individualised approach lends itself to explicit teaching and direct instruction of each learner on the concepts with which that learner requires help.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### 9: Learner/Teacher Centredness

<table>
<thead>
<tr>
<th>Syllabus – Emphasis on teacher-directed, whole class teaching</th>
<th>OBE – Teacher as a facilitator with a student-centred approach to teaching and learning</th>
<th>Standards – Emphasis on teacher-directed, whole class teaching</th>
</tr>
</thead>
</table>
The ACE practice can generally be compared to the OBE approach.

The teacher in an ACE learning centre is called a supervisor. The supervisor acts as a facilitator of learning, dealing with each individual student’s academic queries as they arise. This means that learners who understand a concept can progress through work on their own, while learners who need academic assistance can get it at the exact point of their need, and then progress again on their own.

Thus the norm is that there is no whole class learning, but teachers may elect to do this if there is a specific identifiable problem with a group of learners. Therefore, not all learning is individualised. Group lessons, using a teacher-directed, whole class approach, are used for teaching subjects like additional languages, art and culture, life orientation, and technology where necessary and because of the nature of the subject. For example, the learning of an additional language requires that a student hears and speaks that language; or art and culture involves collaboration between learners e.g. when putting on a play. Educators may also decide, for example, to teach a group of students a particular mathematical concept where specific challenges are observed or where a group of students may all be reaching a similar point in their work schedule and the educator deems that a group lesson would be beneficial. (Personal communication: Principal of His Church School, Pinetown.)

### 10: Subject Choices

<table>
<thead>
<tr>
<th>Syllabus – Common curriculum, or within distinct and separate curricular pathways, based on a core plus electives where a pathways approach is employed</th>
<th>OBE – Common curriculum</th>
<th>Standards – Core/elective curriculum</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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<td></td>
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</tbody>
</table>

Jacqui Baumgardt, 2006
ACE – A combined syllabus and OBE approach is followed. Up to Grade 9, all learners follow a common curriculum (which is currently aligned to the Revised National Curriculum Standards). In Grade 10, learners complete an “academic projection” (see Appendix 6 for an example) in which they choose their “major subjects” and electives. Career guidance is provided by the school, and learners choose their subjects according to whether they plan to go on to higher education or into the world of work after the completion of Grade 12.

<table>
<thead>
<tr>
<th>Syllabus – Discrete areas of study and topics</th>
<th>OBE – Particular topics (such as literature or geometry) often dispersed across strands</th>
<th>Standards – Discrete topics</th>
</tr>
</thead>
</table>

ACE – A syllabus/standards approach is mainly used, but a cross-curricular approach is used where applicable. (See Extract from Learning Programme – Appendix 7)

### 2.5 CONCLUSION

This chapter has examined a range of key concepts in understanding educational models, such as philosophies of education (behaviourist and constructivist); how these philosophies underpin the pedagogical and methodological approaches to education; assessment models; programme structure and management. The approaches of ACE and OBE have been described with both positive and negative claims in the available literature. An understanding the issues of philosophy and pedagogy underpins the research that forms the basis of Chapter 5 of this dissertation.

The ACE programme has been shown to be based on a Biblical, creationist philosophy of education, using a behaviouristic instructional methodology requiring mastery learning. This is in opposition to the humanistic and progressive philosophy that forms the foundation of outcomes-based education. The literature study revealed, however, that

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9 A diagrammatic representation of the methodology used in the Accelerated Christian Education Programme is provided in Appendix 4
there are a number of similarities between the ACE programme and OBE. These two models of education have then been compared with other curriculum models.

Personal and anecdotal experience indicate that the management and implementation of the educational programme is variable, and subservient to the procedural practices and resources of the school as educational provider. Understanding that the effective management and implementation of the programme (as outlined in Section 2.2.3 and 2.2.4) is a key to the success of the learners in the system is an important consideration. The dearth of empirical research, in respect to this study, necessitates enquiry of ACE programme participants. Researching the question, “How do ACE graduates, their parents and university admissions officers currently view the ACE programme in terms of its ability to produce students who are capable of successfully completing undergraduate studies?” will provide some of the answers.
CHAPTER 3: LITERATURE REVIEW: CHOICE IN EDUCATION, COLLEGE PREPAREDNESS AND UNIVERSITY ENTRANCE

This chapter will examine three pertinent issues to the research: choices in education, college preparedness and university entrance. All three of these issues need consideration because of the alternative nature of the ACE system – as opposed to public education, parents choose an ACE school because of the Christian values and ethos of the schools; there have been “doubts” cast over the ability of the ACE programme to prepare students adequately for tertiary education, and ACE students must currently enter South African tertiary institutions via alternative entry routes.

3.1 CHOICES IN EDUCATION

3.1.1 The Legislative Environment

According to the United Nations’ Convention on the Right of the Child, parents and legal guardians are responsible for “the upbringing and development of the child” with the “best interest of the child … their basic concern”. Therefore it is provided that “State Parties shall render appropriate assistance to parents and legal guardians in the performance of their child-rearing responsibilities and shall ensure the development of institutions, facilities and services for the care of children” (United Nations 1989, Article 18.2).

Having the freedom to choose schools other than those that are state-operated is recognized in the Universal Declaration of Human Rights (1948), which states, “Parents have a prior right to choose the kind of education that shall be given to their children” (Article 26. 3). This right is reasserted in the International Covenant on Economic, Social and Cultural Rights (United Nations 1966), which affirms,

*The States Parties to the present Covenant undertake to have respect for the liberty of parents and, when applicable, legal guardians to choose for their...*
children schools, other than those established by the public authorities, which conform to such minimum educational standards as may be laid down or approved by the State and to ensure the religious and moral education of their children in conformity with their own convictions (Sect. 13. 3).

In line with the principles espoused in these United Nations documents, the South African Schools Act (No. 84 of 1996) makes provision for three types of schools:

- public schools – a school contemplated in Chapter 3 of the Act
- independent schools or private schools – a school registered or deemed to be registered in terms of section 46 of the Act and
- home schools – although not defined, in terms of Section 51 (1), a parent may apply to the Head of Department for the registration of a learner to receive education at the learner's home.

However, the approval of independent and home schools is provisional – the Act states that the education provided by independent and home schools should not be “inferior” to that provided in public schools (Section 47 of the Act). Independent and home schools are required to register with the relevant Provincial Department of Education which is then given the responsibility for monitoring the quality of educational provision in those schools. In addition, schools are expected to comply with the provisions of the National Curriculum Statement – foreign curricula do not enjoy the approval of the authorities. Lewin and Sayed (2005: 34) call this the “governance approach” as opposed to a “market regulation” or “rejectionist” approach. Lewin and Sayed (2005: xxi) note that “the regulatory system in South Africa is extensively legislated and often enforced, especially as it relates to subsidies. It places a significant overhead on providers, especially small schools, to respond to all its requirements.”

According to Baloyi (2005: 222) during the post-apartheid era, the state has “overstepped its boundaries and attempted to exercise excessive control on independent schools, i.e. private and home schools”, via policies such as the National Policy on Religion in
Education (2003), which requires schools (including independent schools) not to impose specific religious beliefs on learners, and the Education Laws Amendment Act (No. 50 of 2002) which involve “the imposition of the state’s curriculum and the state’s process of assessment on independent schools, which, of course, includes home schools.” (ibid.: 182)

Gorard, (n.d. cited in Brigham et al. 2003: 6), believes that, since the state does not intervene in the home life of children (except in the case of neglect or abuse), it should behave the same with regard to education. If this is the case, then curriculum, with regard to both content and methodology, should also be a choice.

In spite of the restrictions mentioned above, the independent schools movement has seen phenomenal growth in South Africa. In 2003, the sector is more than four times the size of what it was in 1990 and much more diverse with a wide range of different religions, philosophies and educational approaches (Hofmeyr & Lee 2003: 1). This is corroborated by Lewin and Sayed (2005: xix) who reported that the independent schools sector in South Africa is “relatively small but varied, with between 1200 and 2000 providers … has shown rapid growth from a small base since 1990. … New school registrations peaked in 2000, since when growth appears to have slowed. … About 6% of independent schools in the sample enrol more than 500 students and a further 41% more than 200. The remainder are small schools, 17% of which have less than 50 students.”

Part of the diversity mentioned by Hofmeyr and Lee, is the Accelerated Christian Education school movement which was started in reaction to secular education in the USA. ACE schools are mainly church-based Christian schools (ACE Database). The first school of this nature started in the 1970’s and a study undertaken by Van der Walt and Postma (1987: 4) indicated that, 15 years later, there were more than 17 000 Protestant Christian private schools in the USA. The number of pupils involved was 2,01 million. In South Africa, where the first ACE school was established in 1984, there are over 300 independent schools and 1 000 home schools using this system, (approximately 20 000 students in all) (ACE database), the latter form showing a small but growing trend (Tait 1995: 20).
All schools using the Accelerated Christian Education programme are independent schools. These schools are monitored both by the relevant provincial departments of education (with which all schools must register in order to operate legally) as well as Accelerated Christian Education Ministries Head Office through a network of Regional Representatives in all 9 provinces. A Quality Management System (called Silver Status Guidelines) is in place by which such schools are monitored for compliance with the requirements of the South African Schools Act and the education departments as well as the requirements of Accelerated Christian Education Ministries, itself. It must, however, be mentioned that schools choosing to offer the ACE curriculum are not owned or controlled by ACE, and as such have the right to self-governance. The ministry of Accelerated Christian Education provides “Learning and Teaching Support Materials (LTSMs), in-service training, conventions and regional seminars, government liaison, university access, a regional quality assurance agency and a host of augmented services.” (ACE website 2006).

The conclusion that must be drawn from this is that, if schools are registered by the authorities, the issue of compliance would have been considered by the authorities and that they would deem the education delivered in such schools as “not inferior” and that it would lead to the “kind of learner envisaged” in the National Curriculum Statement (2005: 17). The research to be undertaken in this study will examine this issue.

3.1.2 Concluding Remarks

A consideration of choices in education has shown that these choices are “limited” and “provisional” on independent and home schools offering an education that is not “inferior” to that provided in public schools. It has also been shown that independent schools are chosen by parents because of a perception that they offer a better education than public schools which are fraught with many problems, social, economic and political (Baloyi 2005: 23 – 24).
The research will focus on the choices made by parents for their children’s schooling, whether those choices have been justified by experience (both from the perspective of the students and the parents).

3.2 COLLEGE PREPAREDNESS

In 2001, Yeld (cited in SAUVCA, October 2001, *The Challenges of Access and Admissions*) drew the rather bleak conclusion that, “… entering cohorts reveal serious gaps and deficiencies in their knowledge and skill repertoires, and can be regarded as underprepared, on the whole, for regular-admission tertiary-level study.” The situation does not seem to have changed much since then – according to Smith, (2006), in a seminar at Walter Sisulu University, “post-apartheid South Africa has seen large numbers of formerly educationally disadvantaged students enrolling for post-high-school education. This widening of access has led to lower throughput and graduation rates as students enter a system for which they are largely unprepared.” Teng-Zeng (2005) states that the “DoE has raised serious concerns over the graduation rates, which it says is costing the national government a great deal in terms of resources because of the poor academic performance of students. For instance, statistics available at the DoE indicate that 30% of 120 000 first-year-students who registered at tertiary institutions in the 2000 academic year throughout South Africa had dropped out by the end of that year. A further 11% dropped out by the end of the second year, followed by 9% in the third year, which meant that by the end of 2002, 50% of those students who had enrolled in 2000 had dropped out.” These trends have cost the DoE some R4,5 billion in student aid. This problem is not unique to South Africa – it appears to be a phenomenon that has raised its head in many countries (USA, UK, Australia) in the late 20th Century as will be seen from the issues discussed below.

The extent to which school graduates are prepared to deal with the challenges, demands, and opportunities of the college experience, is an issue that has been explored by many researchers over the years (Hettich 1998; Carter, Bishop & Kravits 1998; Jenkins & Lanning 2002; Orr & Bragg 2001; Elliot 2005). The literature review focuses more
generally on the requirements for success at tertiary level for all students, and does not focus only on studies of ACE graduates. Nevertheless, this is relevant to the present study in view of the fact that ACE students in these countries have been the subject of such research (Elkins 1992; Kelley 2005). In addition, the literature review provides a platform for analysing the support the ACE programme claims to provide to students for such preparation. It is hoped that some generalizations might be made from the literature and that the current research study will then add some insight into the level of preparedness of ACE graduates in South Africa.

3.2.1 Defining College Preparedness

College preparedness may be defined as the following: “the acquisition of the necessary information, skills, and attitudes essential for learning and succeeding in college” (Hettich 1998: xi). The necessary information, skills, and attitudes will be further defined throughout the literature review to present the essential characteristics researchers have found vital to college success.

3.2.1.1 Intelligence or academic ability

While it is acknowledged that there is ongoing debate about what constitutes intelligence, one definition that seems appropriate to this thesis is that “intelligence is a very general mental capability that, among other things, involves the ability to reason, plan, solve problems, think abstractly, comprehend complex ideas, learn quickly and learn from experience. It is not merely book learning, a narrow academic skill, or test-taking smarts. Rather, it reflects a broader and deeper capability for comprehending our surroundings – ‘catching on’, ‘making sense’ of things, or ‘figuring out’ what to do.” (Gottfredson 1997: 1). Bennet et al. (2004: 8) describe this as “intellective competence” which reflects the “integration of academic content with mental processes such as reasoning and critical thinking applied within an ever-changing but highly relevant social context, which results in the mental activity that is necessary to make sense of experiences and to solve problems.”
It is a generally acknowledged fact that academic ability is a key to academic success – in the A-Z of Careers (2003/2004), in analyzing the entrance requirements across a broad range of tertiary institutions, one of the general requirements for entry is listed as “above average academic ability”.

However, Smith (2006) states that “while academic skills are necessary for academic success, they are not sufficient. Motivation, attitudes, one’s general approach to commitments and assignments, as well as interpersonal skills and personal integrity all play crucial roles in success both as a student and in one’s subsequent career.”

3.2.1.2 What else is required?

Perhaps the most comprehensive review of criteria for success in higher education, is Hettich’s 1998 book *Learning Skills for College*. According to Hettich (1998), many students enter colleges ill-prepared by their previous educational experiences and lacking vital skills and strategies necessary for college success. Within a student's experience, there are two distinct curricula that exist (Appleby 2001; Hettich 1998: 51-52). The obvious one – the overt curriculum – consists of the classes listed on the student's transcript and the knowledge the student acquires in these classes (i.e., specific facts, concepts, and theories). The less obvious – but more important curriculum – is the covert curriculum, which is composed of the skills and characteristics the student develops as a result of successfully completing the overt curriculum. These are often called "lifelong learning skills" (DoE 2002: 15) because they refer not to the specific information that students acquire during their formal education (i.e., the contents of their education), but to how successfully they can continue to acquire information after their formal education has ended (i.e., the processes they developed as they acquired the contents of their education). Thus, the overt curriculum stresses the knowledge a person has achieved in the past, whereas the covert curriculum emphasizes the abilities and characteristics that will enable individuals to continue to acquire new knowledge and attain new skills in the future, both on the job and in their personal lives.
Boulard, (citing Bowen 2004) maintains that "preparedness is shaped through the persistent, cumulative development of cognitive skills… that include not only such ‘non-cognitive’ qualities as motivations and expectations, but also a practical knowledge about the college admissions process.”

In a survey of high school and college students, designed to measure students' perceptions of their academic readiness, Mandelson (2001) found that the survey data indicated that students at both the secondary and post-secondary level recognize the importance of the "traditional" skills of reading, writing and note taking; however, these students were less convinced of the importance of acquiring proficiency in analytical skills, computer technology and speaking.

Du Plessis (1996) cites The Learning and Study Strategies Inventory (LASSI) developed by Claire Weinstein and David Palmer as a “useful tool in academic support and students' learning development.” It is insightful to note the focal points of this inventory. “It consists of ten scales (77 items), and each scale provides information on an important variable which influences learning. The scales are

- attitude (interest and desire to work on academic tasks),
- motivation (self-discipline, desire to work hard, taking responsibility),
- time management (organised, systemised and productive use of time),
- anxiety (nervousness and tension facing tests),
- concentration (ability to focus attention on academic work as well as activities related to studying),
- information processing (strategies of organisation, elaboration, reasoning and comprehension),
- selecting main ideas (ability to decide what to underline in order to concentrate on key points and to interrelate ideas),
- study aids (making diagrams, underlining the text, reading summaries, titles and words in italics),
• self testing (checking the comprehension level reached, formulating questions before, during and after classes) and
• test strategies (knowing the different test types, the necessary preparation for each and various strategies to study and remember the material)".

In summary, Foxcroft and Stumpf (2005: 12) list the core competencies (as found in the indicated sources) for higher education entry as follows:

<table>
<thead>
<tr>
<th>Table 2: Core Competencies for Entry into Tertiary Education</th>
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<tbody>
<tr>
<td>---</td>
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<tr>
<td>• Reading literacy</td>
</tr>
<tr>
<td>• Mathematical literacy</td>
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<tr>
<td>• Scientific literacy</td>
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<tr>
<td>• Cross-curricular problem-solving</td>
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The following review takes a deeper look at the various characteristics mentioned in these sources and uses the descriptions of these characteristics as a basis for analysis of the official claims of the ACE programme. The empirical research will determine whether these stated aims actually translate into reality for those who are involved with the programme, either directly or indirectly.

3.3 THE CHARACTERISTICS OF COLLEGE PREPAREDNESS

3.3.1 Academic Preparation

Academic preparation is the most significant predictor of college success. Adelman (1999, cited in Martinez & Klopott 2006) determined that college completion is most likely when students take high-intensity and high-quality coursework during high school. He suggested that high-quality coursework should prepare students with the information and skills that higher education institutions would expect of them prior to entrance.

We have already seen in Chapter 2 (2.4.6) that the ACE programme uses a combination of a syllabus, outcomes-based and standards-based approach. The syllabus and standards based approach incorporates an emphasis on content related to specific academic disciplines or fields and the research indicates that those countries that consistently perform at the highest level in international tests, … adopt a syllabus approach to curriculum development” (Donnelly et al. 2005: 9). Thus, one can conclude that a defined body of knowledge is an essential part of academic preparation. The ACE “core curriculum includes seven basic academic disciplines which fulfill essential educational needs: Mathematics, English, Literature and Creative Writing, social studies, science, Word Building and Bible Reading” (ACE 2001a Vol. II: 1-2).

According to ACE, (ibid.: 3-7) “conventional educational programs take the student through a spiral of material while introducing him to new skills in sequence. Since students are grouped chronologically, they are lock-stepped and receive the same material
at the same time. However, students do not necessarily all have the same level of maturity as others of their chronological age, and their natural learning rates are not lock-stepped with other students. As the group uniformly passes from skill to skill in the spiral, the students’ actual learning is relative and their achievement varies. The result is that the above-average student may master the skill the first time he is exposed to it, the average student may pick up part of it, and the below-average student will often grasp only a minimum amount or fail to understand it entirely. As the spiral continues, some students stay out in front while others are left behind for a season (or for good).”

The ACE curriculum is also designed on the basis of a “curriculum spiral” (ibid.: 3) which builds “skill upon skill.” However, “the scope and sequence ignores the concept of grade level and moves with continuous progress beginning with the first skill to be mastered. Depending on their ability and motivation levels, students may move ahead rapidly or take as long as necessary, but each student masters the material. Students are not locked into a group but progress (individually) through the skills as they are mastered. As the student moves upward, level after level, and the spiral comes around again, he is far better prepared to learn because he has mastered the skill on the previous level. He does not advance until he has mastered each concept. He is not lock-stepped with his classmates but is learning individually and completely before advancing” (ibid.: 6).

3.3.2 Career Guidance and Counselling

Linked to this is the need for proper career guidance as a major contributor to success in entering college. Guidance would include advice about career choices, courses available, standards required at tertiary level, and how one can prepare adequately even while at school for tertiary studies. Examples would be subject choices at the FET level, and the standards required for entry into particular fields of study, e.g. Mathematics, Physical Science and/or Biology on Higher Grade are prerequisites for entry into the field of Health Sciences (UCT Undergraduate Prospectus 2007: 38, UKZN Undergraduate Prospectus, 2007: 75).
Orr and Bragg (2001: 111) state that a barrier to transition to tertiary level is a lack of agreement about standards and “insufficient communication about these standards between high schools and community colleges”. As they put it, many students take an incoherent “hodgepodge of courses” that are useful neither for employment nor tertiary education. Bragg (2002: 678) cites “misalignment between high school courses and college-level courses” as a major barrier to transition from secondary to tertiary education.

The lack of guidance at school as to the courses available was highlighted by Pargetter et al. (1998) who concluded that “a significant information gap between universities, secondary teachers and secondary students concerning course structures and academic expectations, leading to inaccurate expectations of vocational and career outcomes identified with particular courses and subjects, or to inaccurate assessment of flexibility in course selection.” Another symptom of poor counseling is that some students are encouraged to go to higher education institutions without being apprised of what will be expected of them. Orr and Bragg (2000: 111) point out that “even students who are poorly prepared for college are being encouraged to go, without being given opportunities to explore other training and preparatory options or learn about what will be required of them … and their likely completion rates”. Orr and Bragg go on to say that one of the chief barriers to transition to community colleges is that “high schools and community colleges provide limited guidance services to assist students in making decisions about their futures after high school.” Light (2001: 81) claims that "good advising may be the single most underestimated characteristic of a successful college experience".

In addressing the dearth of information and career counselling available in the majority of South African schools and broader society, an initiative has been introduced by Higher Education South Africa (HESA), namely, the National Information Service for HE, (NiSHE). It has a two-pronged strategy: to provide information and guidance on the role and requirements of HE in South Africa to learners at schools, teachers, parents, FET
Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education.
Chapter 3

colleges and prospective HE students; and to link HE programme and qualification pathways to future career directions and possibilities. (HESA website, 2005). This project was due for implementation in 2006, so comment cannot be made on its efficacy or outcomes. Nevertheless, the fact that such an initiative has been deemed necessary is an indication that the lack of career guidance and counselling is a matter of concern in higher education.

ACE students plan for their tertiary education programme during their Grade 9 year. They discuss their plans with their supervisor, who then draws up an academic projection\(^\text{10}\) (Appendix 6) for them. Parents must sign the projection to indicate that they agree with it. Career guidance is one of the aspects that is considered in the empirical research undertaken for this thesis.

3.3.3 Goal Setting and Time Management

An important characteristic for college success is being able to set goals and manage time. Carter, Bishop and Kravits (1998: 326) have this to say about goals: “Goals enable you to put values into practice,” and again (1998: 324) “The pursuit of personal and professional goals gives your life meaning.” Hettich (1998: 34) defines goals as the results or milestones that a motivated person strives to reach, and goal setting as the process of identifying specific milestones and the means of reaching them. In order for a student to set goals and determine ways of accomplishing them, the student must be able to prioritize and manage time efficiently.

In a study conducted by Elliot (2005: 36), it was found that students who successfully completed college courses “realised how crucial it was to set their goal(s) even from the initial stage of the study. Setting a goal was important for various reasons. Goal-setting helped to check personal values (i.e. what the student really wanted to achieve for himself

\(^{10}\) Academic Projection – A year-by-year and course-by-course outline of what a high school student must complete to earn an ACE certificate.
or herself). Likewise, apart from giving the student a sense of direction, it also served as a motivator until the goal was accomplished.”

An allied finding (ibid.: 36) was that self-discipline was a key issue. “As appreciated by the students themselves, disciplining oneself required constant serious attention to all aspects of learning. … Being responsible for one’s learning was closely related to practising self-discipline. By taking responsibility for their own studies, students basically acknowledged ownership of the outcome of their performance. They also seemed to comprehend that although lecturers helped them to understand the concepts and to prepare for the exams, that should be balanced or even exceeded by students’ personal learning and preparation.”

Goal-setting is an integral part of the ACE programme. This is referred to as “the second law of learning,” namely that “the pupil must set reasonable and appropriate goals which he can be expected to achieve in a reasonable and prescribed period of time” (ACE 2001a Vol. II: 88). Both short-range (daily) goals and long-range (annual) goals are determined. (ibid.: 79, 81). Goals that are not completed during the normal school day must be completed for homework. There is an accountability built into the system as goals are checked on a daily basis by a teacher aide in the learning centre (ibid.: 83) and penalties are incurred for non-completion.

### 3.3.4 Listening Skills

College students must also have effective listening skills in order to learn. (Hettich 1998: 166). Active listening can have a significant impact on a student receiving a passing or failing grade. An engaged listener will be able to understand lecture material, take accurate notes, participate in class discussions, and communicate with his or her peers (Sherfield, Montgomery, & Moody 2002: 149).

According to Shkolnik (2005: 8), “listening involves a more sophisticated mental process than just hearing. It demands energy and discipline. Listening is:
Taking information from speakers while remaining non-judgemental and empathetic;

Acknowledging the speakers in a way that invites the communication to continue;

Providing limited but encouraging input to the talker’s response; carrying the person’s idea a step forward.”

Shkolnik (ibid.: 11) continues by saying that “Many facts and ideas are delivered to us through speeches, lectures, oral reports, or presentations. Such oral sources are subject to critical considerations. Developed listening skills allow an audience to apply critical thinking to facts and opinions delivered to them by a presenter.” And again (ibid.: 13) “Listening is a skill essential for professional development and success. The movement toward professional success begins in school with the learning of concepts and behaviour aimed at achieving goals. Students spend most of their school time taking in information by listening. Improving this process often means better grades and often better chances at good jobs when school is completed.”

Listening skills are not specifically taught in the ACE programme, although plenty of opportunities for listening are provided, for example in attendance at chapel, (ACE 2001a Vol. II: 76) group lessons and lectures (ibid. Vol. I: 76).

3.3.5 Ability to Take Notes

Another characteristic students need to possess prior to entering college, is the ability to take notes in class (Hettich 1998: 184). Hettich states that notes compensate for deficiencies in memory and force students to focus all of their attention on the lecture. According to Sherfield et al. (2002: 171), taking notes is part of the active listening process and having good notes simplifies the studying process, as notes provide a record of course content. A college student’s ability to take useful accurate notes greatly improves his or her chances at academic success. Clason and Beck (2002: 8) mention that various note-taking styles may be needed, depending on the subject matter, the nature of the class, and the lecture style of the instructor.
ACE students are expected to maintain “insight notebooks” mainly for chapel and devotions, and individual awards are presented at the end of the academic year to students who have most frequently demonstrated consistency in maintaining their notebooks (ACE 2001a Vol. II: 170, 191). English and Literature and Creative Writing PACEs provide exercises for drafting summaries of reading material, and outlines for written work that then need to be expanded into essays. Senior students are also expected to “learn to take notes; use an Insight Notebook at weekly chapel and daily devotion classes; and take at least one lecture-style course that requires exams (current affairs, state history, home economics, mechanical drawing, etc.).” (ibid.)

In the Grades 10 – 12 years, ACE learners are expected to work through a study skills manual as part of their Life Orientation programme. (ACE 2006b: 34). This manual contains instructions and exercises on note-taking, among other things.

### 3.3.6 Reading Skills

College students must also be able to read effectively, i.e. with comprehension. Carter, Bishop and Kravits (2002: 120), emphasize the necessity of students to be able to truly comprehend reading materials in the following statement: “True comprehension goes beyond just knowing facts and figures – a student can parrot back a pile of economics statistics on a test, for example, without understanding what they mean.” True comprehension comes with the ability to personalize the information, which makes the written information truly meaningful to the student. Hettich (1998: 213) also discusses the need of students to be interactive with their texts, and also states that in order to be able to read effectively, students must possess a significant prior knowledge base, the so-called “embedded knowledge” (SAQA 2005: 17) required in qualifications registered on the South African National Qualifications Framework. This prior knowledge base will increase the speed with which students are able to comprehend reading materials.
ACE learners are skilled readers – indeed, they need to be, given that the ACE programme is reading-intensive. They are taught to read in the pre-school year using the phonics method. A computerized reading programme “Readmaster” (ACE 2001a Vol. II: iv) is used from Grade 1 – Grade 12 to increase comprehension and reading speed. To earn the College Entrance Certificate (with honours), a reading speed of 600 words per minute is required (ACE 2006a: 16).

3.3.7 Critical-Thinking Skills

Students must also be able to think critically to perform well in college.

For many people the word “critical” has a negative connotation associated with faultfinding. The word, however, has a much broader meaning. Critical comes from the Greek word kritikos, meaning “to distinguish the good from the bad; to discern or perceive; to separate; to understand.” To be critical, therefore, means “to look carefully at something, to discover its parts and its substances, and then to evaluate – positively or negatively” (Shkolnik 2005: 3).

Definitions of critical thinking emphasise the ability to ask questions about evidence presented with a view to enhancing understanding:

- “Critical thinking is a process, the goal of which is to make reasonable decisions about what to believe and what to do” (Ennis 1993: xvii);
- “Systematic evaluation of arguments based on explicit rational criteria…the habit of questioning the quality of the reasoning for a belief or contention…ix. Listening and reading critically – that is, reacting with systematic evaluation to what you have heard and read – requires a set of skills and attitudes. These skills and attitudes are built around a series of critical questions. Thinking carefully is always an unfinished project, a story looking for an ending that will never arrive. Critical questions provide a structure for critical thinking that supports a continual, ongoing search for better opinions, decisions, or judgements. Consequently, critical thinking … refers to
the following: 1. Awareness of a set of interrelated critical questions, 2. Ability to ask and answer critical questions at appropriate times, and 3. Desire to actively use the critical questions” (Browne & Keeley 1997: 2);

- “Our beliefs influence our emotions and our actions. So it is important that they accurately reflect the real world. This is the purpose of critical thinking – to help answer the question of whether or not to adopt a belief. Critical thinking is concerned with the justification and validation of our beliefs, not their origin. So the critical thinker is interested in whether the evidence presented for a claim is true and accurate. She is also interested in the adequacy of the evidence and even in the fairness of the argument” (Kiersky & Caste 1995: 12);

- “An active, purposeful, organized cognitive process we use to carefully examine our thinking and the thinking of others, in order to clarify and improve our understanding” (Chaffee 2004: 48);

- “The intellectually disciplined process of actively and skillfully conceptualizing, applying, analyzing, synthesizing, and/or evaluating information gathered from, or generated by, observation, experience, reflection, reasoning, or communication, as a guide to belief and action. In its exemplary form, it is based on universal intellectual values that transcend subject matter divisions: clarity, accuracy, precision, consistency, relevance, sound evidence, good reasons, depth, breadth, and fairness” (Scriven & Paul 2004: 1);

- “Thinking that is purposeful, reasoned, and goal directed – the kind of thinking involved in solving problems, formulating inferences, calculating likelihoods, and making decisions” (Sherfield et al. 2002: 94);

- “When students are able to think critically, they are able to do more than simply reproduce knowledge of others, but rather to generate their own thoughts and opinions – thinking creatively” (Carter et al. 1996: 144-145).

The Dearing Report (1997: 8) found that “about half the academics surveyed believe that the main aim of assessment should be to measure ‘the ability to think’ and a third that it should measure ‘depth of knowledge and understanding’. …. This rises to 90 per cent when the measurement of ‘problem solving’ ability is added to the list of main aims.”
However, there appears to be a lack of these skills in students entering tertiary studies. Reed (1998: 13), states that “the National Education Goals Panel (USA) identified the need for a substantial increase in “the proportion of college graduates who demonstrate an advanced ability to think critically, communicate effectively, and solve problems (National Education Goals Panel 1991: 62).” This is an envisaged goal of the NCS which “seeks to create a lifelong learner who is confident and independent, literate, numerate and multi-skilled, compassionate, with a respect for the environment and the ability to participate in society as a critical and active citizen” (DoE: 2002: 8).

Accelerated Christian Education (Accelerator, 3rd Quarter, 2005: 11) states that “the ACE programme includes specific forms of material and format which aid the student as he develops his capacity for critical thinking throughout his school years. He is encouraged in his ability to think creatively and independently within a Biblical framework. The programme is designed to progress students through all six phases in the development of critical thinking skills: Knowledge, Comprehension, Application, Analysis, Synthesis, and Evaluation.” Examples cited in the article (ibid.) include knowledge (memorization of verses, math facts, vocabulary, historical names and dates); comprehension skills (math exercises, fill-in-the blank- questions, and objective answer questions); application skills (word problems, puzzles, science projects and essay questions); analytical skills (the use of mazes, examination of prose and poetry and geometric proofs); synthesis (research projects, outlining, higher math and science concepts and lab reports). Examples of evaluation items are not supplied in the article.

**3.3.8 Test-Taking Skills**

A further essential characteristic for students is the development and possession of test-taking skills. Bennet *et al.* (2004: 23) state that “a powerful way to promote long-term retention and transfer is to allow students to practise retrieving previously taught material from long-term memory. Opportunities to practise can occur either during review for tests or in actual testing sessions. … Doing so repeatedly, in varied contexts, strengthens
students’ ability to access these knowledge bases and solidifies their ability to recall previously learned material from long-term memory, thus promoting transfer across contexts. … repeated testing helps in the recall of information. Test questions also offer an opportunity for ‘practice at retrieval’ and deepen students’ knowledge of the material being tested. Ideally, tests should be cumulative; test items should probe for understanding of the material.”

The Dearing Report (1997: 8) highlights the need for preparation for the specific type of test, and emphasizes the need for problem solving in many types of tests. Considering the great number of tests students will face in tertiary education, as well as the variety of assessments, it is necessary for students to be familiar with these and develop strategies for the different types of questions, such as “projects and dissertations, written examinations, essays, and oral presentations as well as multiple choice tests and work-based assignments”.

According to the ACE Procedures Manual (2001a Vol. I: 91 – 94), “measurement involves both long- and short-term assessment. ACE provides these services through criterion-referenced tests and norm-referenced tests. … The two types of testing, respectively, reveal how a student compares with (is measured against) himself on immediate, subject-specific tasks – the PACE Tests – and how he ranks (or is measured) contrasted to many others in a broad field of students having similar variables (age, range, level, etc.). … Subject tests (the PACE Tests) measure the quantity and quality of the student’s understanding, skill, and progress in specific subjects against the absolute standard of 100 percent of comprehension. Standardized tests reveal whether a student is progressing as expected when measured against a broad population.” The subject tests range from knowledge tests (with multiple choice, fill-in spaces, matching and true/false questions) to application tests with case studies, quantitative exercises, essays, oral presentations and reports. In addition, in some cases, students are required to complete projects and assignments before grades or marks are allocated. The system does not use quarterly, semester or year-end tests as in a traditional system. Marks are accumulated
and averaged over a series of 12 PACEs (equivalent to 1 year’s work for an average student).

### 3.3.9 Study Skills

Study skills are also important. In a study undertaken by The Potchefstroom University for Christian Higher Education (now NorthWest University), du Plessis (2002) concluded that “on the macrolevel of studying the student must be aware of his or her own cognitive processes and products. A good learner is a person who accepts responsibility for his/her learning and who monitors his/her own progress. He or she is therefore a metalearner. Metacognition is an awareness of thought processes and skills involved in learning and the personal control of the knowledge of learning. Planning, monitoring and regulating strategies are typical metacognitive strategies.”

Burge (1993: 5) identifies study skills as “learning strategies” and defines these as “the executive actions taken by students to collect, encode and retrieve information so that it becomes personally meaningful knowledge”. She then cites various authors (e.g. Tessmer & Jonassen 1988: 34), who define learning strategies as “the information processing methods that people use to control their learning which can involve processes of attending/perceiving, encoding and retrieval ... the way one uses one's head when learning.” Wittrock (1992: 702 in Burge, 1993) stresses the relationship aspects of learning: “... student use of cognitive procedures for generating relations across bodies of information and between new information and memory.” Weinstein (1988: 291) maintains that learning strategies are any behaviours or thoughts that facilitate encoding in such a way that knowledge integration and retrieval are enhanced. More specifically, these thoughts and behaviours constitute organized plans of action designed to achieve a goal ... Examples ... include actively rehearsing, summarizing, paraphrasing, imaging, elaborating, and outlining”.

Students need to be taught these skills. We have seen that the cycle of goal-setting, responsibility and accountability are characteristics of the ACE programme. (See 3.3.3).
In the senior years of schooling, the skills of summarizing, paraphrasing, and outlining are taught in the English PACEs. (ACE 2001a Vol. II: 272, 273, 276).

3.3.10 Speaking Skills

Research also indicates that speaking is at least as important as writing. The Committee on Science, Engineering, and Public Policy (COSEPP) (1997: 54) in its research on mentoring science and engineering students, states that “students must be able to present ideas and results to other scientists and engineers, as well as to the lay public and specialists in other fields.” Newmann and Wehlage (1995: 8) conclude that academic achievement can be judged satisfactory only if students are required to "express the results of [their] disciplined inquiry in written, symbolic, and oral discourse by making things, ... and in performances for audiences".

ACE learners are encouraged to present oral reports (either on a literature book they have read or on a topic of interest) (ACE, 2001a, Vol. 1: 45 – 48). This is an activity provided for by the programme from the earliest years of schooling to the end of Grade 12, but is not necessarily compulsory. Modules in public speaking and preaching are available to interested learners (at the high school level) and they can obtain academic credits for completing the necessary activities. (ACE 2006a: 17)

3.3.11 Social Skills

The tertiary environment is often strange and disconcerting for a student just out of school. Kuo et al. (2004: 4) report that many first year students have difficulties dealing with the new people they encounter. Whether it is their professors or their peers it is important that students possess the appropriate interpersonal skills to deal with others before entering college. Working in groups is an inescapable reality of post-secondary experience and students must be able to work with others in order to succeed (Hettich 1998: 323). Interpersonal skills are needed so that students can function properly in the classroom as they communicate with their teacher and peers. In a study on organizational
behaviour, the Commission on Behavioral and Social Sciences and Education (CBASSE) (1997: 104) states that “interpersonal skills include understanding of interpersonal and group processes; the ability to understand the motives, feelings, and attitudes of people from what they say and do (empathy, social sensitivity); the ability to maintain cooperative relationships with people (tact, diplomacy, conflict resolution skills); and oral communication and persuasive ability.” (See Paragraph 2.2.4.5 for the ACE comparison.)

3.3.12 Writing Skills

Writing effectively is also an essential skill. Elander et al. (2006) discuss the need for university students to write within specific genres and discourses depending on the requirements of each subject. Academic writing is highly conventionalized and it comprises specific genres such as summaries, critiques, and research papers, report/essay writing, examinations and textbook writing (Criollo 2003). The methods of assessment most frequently mentioned by academic staff in higher education in the Dearing Report (1997: 8) were projects, dissertations, written examinations, essays and oral presentations. A student’s ability to write effectively may thus determine if the student succeeds or fails in higher education.

According to Shkolnik (2005: 5), writing skills require critical thinking. “One part of writing comes from the author’s own knowledge, imagination, or observation. Another part comes from books or other sources. Critical thinking allows an author to navigate through facts, ideas, and opinions gathered from various sources. To sort things out and to see the connections, a writer uses four methods of critical thinking: analysis, interpretation, evaluation, and synthesis.”

The ACE Procedures Manual (2001a Vol. II.: 35 – 45) provides an extensive breakdown of the writing skills that the programme includes: rough drafts, expository and narrative writing, compositions, reports, letters, short story writing, speeches, articles, and research papers. (Refer also to paragraphs 3.3.5, 3.3.8 and 3.3.10.)
3.3.13 Research Skills

Research skills, both in the library and on the Internet, are an additional requirement for college preparedness. Requiring a student to do research teaches him or her investigative skills, logic, critical thinking, and the basic elements of an evidence-based argument. Whitmire (2001: 537) reports that there is a positive relationship between undergraduates’ self-reported critical thinking (e.g., the ability to put ideas together, to think analytically, and to learn independently) and their academic library use, and that students with higher self-reported critical thinking used the library more frequently. Quarton (2003: 1) states, however, that “many college students are either unaware of the resources in university libraries or they do not know how to use them. Because few universities require an assessment of information literacy as a condition of graduation, many students move from course to course with only a marginal understanding about how to use research tools and how to evaluate resources. At graduation, students lacking these information literacy skills are ill-prepared to function in a technological and information-rich environment”.

Opportunities are provided in the ACE programme for the development of research skills. The process starts in Grade 6, where the writing of “research paragraphs” (English PACE 64) is taught. In Grade 11 (English PACEs 131 and 132), the skills of “planning and researching a term paper” and “writing a term paper” are specifically taught.

3.3.14 Quantitative Thinking Skills

The final characteristic needed for success at tertiary level, is the ability to think quantitatively. This means the ability to read graphs and change units to skills as sophisticated as representing real world observations in numerical models. Quantitative literacy, the facility to use and understand quantitative information, is now recognized as an important outcome for undergraduate education. Cheney (1989: 35) states that “to participate rationally in a world where discussions about everything from finance to the environment, from personal health to politics, are increasingly informed by mathematics,
one must understand mathematical methods and concepts, their assumptions and implications.” Thus the ability to work with numbers is crucial to function successfully in today’s society of technology and problem-solving. Mathematics in itself is a discipline of problem-solving, and it develops critical thinking skills in those who study it. The South African Department of National Education concurs and has therefore introduced a subject called “Mathematical Literacy” at the FET level; this subject is compulsory for all students not taking Mathematics.

Quantitative skills have been defined as follows (Stone, Brown, & Phelps 2003: 8):

- Experience and skills with using calculators;
- Broad understanding of mathematics;
- Good command of mathematical notation and syntax;
- Precision and accuracy in work;
- Ability to compute efficiently and accurately;
- Solid foundation in basic addition, subtraction, multiplication and division.

'Quantitative literacy' is defined by Yeld (2005: 56) as “the ability to manage situations or solve problems in a real context, using quantitative (mathematical and statistical) information that may be presented verbally, graphically, in tabular or symbolic form.” She provides the following examples:

- “a familiarity and understanding of the conventions for the representation and arithmetic manipulation (addition, subtraction, multiplication, division and powers) of numbers (fractions, ratios, percentages, etc.) in real contexts and an ability to use these to solve problems;
- the ability to perform simple analysis of data;
- ability to produce and translate between different representations of data;
- ability to apply logical reasoning to information about real contexts (for instance, to determine whether a statement or example fulfils given criteria (or definitions); and
• ability to deal with simple questions involving order (for example, inequalities) and approximations.”

The ACE Mathematics course is not taken by every student\textsuperscript{11}. Many students stop at the end of Grade 9. However, the majority of students going to university take Mathematics up to Grade 12 level as this is required for the SAT1 test – a prerequisite for entry to tertiary institutions with the ACE Grade 12 College Entrance certificate (Matriculation Board Circular 31 of 2003). The average score of past ACE graduates on the SAT1 Mathematics test over the years (in South Africa from 2002 – 2006) has been 70\% (ACE Graduate Database 2006). This provides objective evidence of the fact that ACE graduates have generally developed quantitative skills at an appropriate level.

\textbf{3.3.15 Concluding Remarks}

As can be seen, much of the research focuses on the observed lack of these essential skills for success – to conclude, Tafel and Eberhart (1999: 5) state that for a variety of reasons “too few recent high school graduates are ready for successful experiences in college and/or careers”.

It is clear, from the wealth of research into the issue of college preparedness, that there is a world-wide problem with student preparation for tertiary or post-secondary education from which South Africa is not exempt. A number of South African studies (for example, Yeld 2003) have pointed to the fact that, on entry to higher education institutions, large numbers of learners are not sufficiently ready (i.e., do not have the required academic, cognitive and personal competencies) to cope with higher education studies. It is evident, also, that a range of skills (beyond pure academic ability) is required for students to succeed in post-secondary education. Presumably, the greater the combination of these skills, the greater the chances of success.

\textsuperscript{11} With the changes to the requirements for Grade 12 (in terms of Mathematical Literacy), ACE is in the process of writing PACEs for this subject (2006)
The literature review has also examined the stated claims of ACE with regard to each of these characteristics. What will be addressed in the empirical study is the extent to which the ACE educational philosophy and methodology actually prepares the graduates of the system for tertiary education. Recent research in this regard is almost non-existent: one study was conducted by Elkins (1992), which had as its main an evaluation of the ACE programme as a whole, and not college preparedness, per se. The one conclusion reached by Elkins (1992: 233) (relevant to the current study) was that “the programme does not prepare students to face the realities of life, by attempting to eliminate failure from the student’s experience”. A study conducted by Kelley in 2005 into a comparison of the ACT scores of ACE students and public school students, merely highlights the paucity of recent research – she herself states (Kelley 2005: 43) that her findings of generally lower scores of ACE students “alone do not indicate, however, that ACE does not adequately prepare graduates for college. … to make this assumption would be erroneous as much more research is required in the area to draw any applicable conclusions.” It is hoped that the current research will contribute to an appreciation and understanding of the preparedness of ACE graduates in South Africa for tertiary studies.

3.4 ADMISSION TO HIGHER EDUCATION

3.4.1 Introduction

Admission to tertiary education institutions for ACE students is via the “Senate’s Discretionary Route” since the School of Tomorrow Grade 12 College Entrance Certificate, issued by ACE Ministries, South Africa, is an alternative to the Senior Certificate with Matriculation exemption that affords students from public schools entrance to university. All ACE students who wish to study at a tertiary institution are required to apply to the ACE Graduations Department for a Tertiary Liaison Link to be created (See Appendix 8) which introduces the student to the institution’s admissions officer as an ACE graduate and indicates which programme the student wants to enter. “Liaison with tertiary institutions for enrollment of A.C.E. graduates … forms part of the service provided” (ACE 2006). ACE National Office does not, however, “apply for
admission to any institution for any student; it only establishes a link for an applicant in order to smooth the process of an application.” (ibid.)

According to Briseid and Caillods (2004: 21), “access to higher education is currently undergoing a process of change, allowing and stimulating a greater percentage of the age cohorts to enter and expanding admissions criteria … However, most [African] countries are still rather selective and require all students to hold a successfully completed diploma from general/academic upper secondary. A few countries even use special entry tests in addition to the diploma.”

In the UCAS Handbook (2006: 10) it is stated that “applicants to HE are now likely to come from a diverse range of backgrounds and bring with them a varied range of qualifications. Work-related qualifications, evidence of learning over a longer period of time, greater breadth of learning and changes in the structure of qualifications are all likely to be of increasing importance to HE admissions.”

Against this brief background, the position adopted in South Africa is briefly examined in order to set the context for a discussion of the ACE Grade 12 College Entrance certificate.

3.4.2 University Admission Requirements

The SAUVCA-CTP HE Admissions Project (2003) provides an in-depth insight into university admissions policies and practices across a broad spectrum of countries from every continent. The conclusion that the research team arrived at was that “a unidirectional (“one-size-fits-all”) policy has not worked in the South African context, and that differentiated (“fitness for purpose”) policy should rather be developed, as the natural evolution from meaningful interactions between society, institutions and government” (ibid.: 111).
The report also states (ibid.: 153) that “currently it is estimated that the majority of institutions implement some form of assessment for selection and placement in addition to the school-leaving results of applicants, and considerable expertise has developed within these “alternative admissions” practices. The reasons for additional assessment at entry levels to HE study seem evident: On the one hand, insufficient numbers of learners can be admitted on the strength of their school-leaving results; on the other, the predictive value of Senior Certificate results, especially where such results fall below the top range scores, is increasingly questioned.”

Foxcroft and Stumpf (2005: 19) state that using the NSC as “the only measure to decide on entry to higher education” and the negation of “a parallel system where higher education institutions use additional tests” needs to be “strongly challenged as relying only on performance in the Matric/NSC is neither in the interest of good assessment practices nor of broadening access to higher education. Good assessment practices in selection contexts dictate that a variety of measures should be used to increase the validity of the overall assessment. Furthermore, national and international literature are in agreement that to broaden access it is important to increase both the variety of the admissions criteria used and the alternative routes available to enter programmes.”

The ACE graduate falls into this “alternative admissions” segment. The following quote from SAUVCA Circular U2/2002 is pertinent: “As the only external assessment involved in admission to this school examination is the attainment of a specific score for either the SAT I or the SAT II programme, the Board decided that evidence of meeting such requirements should as a matter of procedure be submitted with the school certificate if admission is sought for entrance via a senate approved selection process in terms of Regulation 31 of the exemption regulations ... Institutions should therefore only consider candidates for admission to Senate approved selection processes (Senate's discretionary admission) if they can submit evidence that they have met both the required SAT scores and the requirements of the G12CEC…”.
The SAT has long been the subject of some debate, particularly in the USA where this is a benchmark test for entry into tertiary institutions. Davis (2000: 28) reports that “Admission standards are normally established by individual institutions, and the American Association of State Colleges and Universities (AASCU) views this as a responsibility that belongs with the institutions and their governing entities … Because the majority of college applicants have graduated from an accredited public or private high school, admission standards have been developed to evaluate certain components related to the high school educational experience. The National Association for College Admission Counseling (1998) reported from their Admission Trends Survey for 1998, that the top four factors influencing admission decisions in 1998 were grades in college preparatory courses, admission test scores (i.e. SAT or ACT), grades in all subjects, and class rank.” She also states that “SAT or ACT scores and portfolios or performance-based assessments provide schools12 with a solid basis for admission” (ibid.: 16).

There is, however some debate about the use of SAT scores as a deciding factor for college entrance in the United States. Jaschik (2006) describes an “admissions revolution” that is taking place in the United States. This revolution, he says, challenges everything from “standardized testing, admissions consultants for students, enrollment consultants for colleges, early decision hysteria and just about every other trend in college admissions”.

One area that he addresses is admissions tests: “Many colleges have been moving away from requiring the SAT – and experiencing significant application and enrollment increases as a result. Even some colleges that still require the SAT or ACT are openly wondering if they add anything to admissions decisions – or add enough to justify the hours spent by students prepping for them or feeling anxiety about them.”

Alan Contreras, Administrator at Oregon Degree Authorization, (in Jaschik 2006) adds his voice to the debate, stating that “higher education has allowed an unhealthy obsession with speed to drive too many of its processes. We use quick methods of evaluating

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12 School means a university or college in this context.
student suitability for schools because they are quick, not because they are good. We do this in reaction to the same obsession with “instant” this and that in society. Higher education should be one part of our world where care, deliberation and genuine interest in the individual, in this case the student, continue to have meaning.”

Jaschik (ibid.) also reports that one professor had this to say: “There are arguments on many sides. I can tell you that what they consider a perfect essay for the revised SAT would barely earn a laughable C in most freshman composition courses at decent four-year colleges. I don’t know what future success that indicates, but I bet there are more important factors, like drive and work ethic and value in knowledge, that these tests don’t explore … there are accurate measures of work ethic, dedication to education, direction and purpose: letters of recommendation, grades, high school coursework, entrance essays that are actually challenging, among others. What exactly is added to a student’s portfolio by a high test score? Very little. Removing this element would force admissions officers to do for undergraduates what they have been doing for advanced graduate students for years – look at things that communicate more than test scores. My concern is not so much with who is sitting in my classroom next fall and whether or not I find them interesting; instead, my concern is with the changing quality of US higher education because students are taught to value a single test more than actual education, mostly because colleges do it for them.”

This having been said, University of Minnesota researchers (in what the authors term the largest analysis of its kind in social science), have found that the widely used SAT test is a valid predictor of success in college. Using the technique of meta-analysis, the researchers summarized previous research on how well the SAT predicts performance in college. Morrison (2002) highlights the following aspects of the report: “… more than 1 700 studies, representing over a million students, … had looked at how well SAT scores predicted first-year grade point average. … People who do better on the test have higher GPA's in their first year in college. … the SAT predicts GPA during later years in college, as well as study habits, persistence and degree attainment.”
In another report by Shea (2004), “… the College Board, …. still insists, together with Educational Testing Service (ETS), that the SAT is the best single predictor of performance in college – better even than high-school grades, although combining the two provides the best results of all. The SAT, moreover, can theoretically identify bright kids in weak schools.”

It appears then that there are differing opinions as to whether the SAT is a valid benchmark test and predictor of success in tertiary education. In the light of this, it seems pertinent to raise the issue of using SAT scores for entrance for ACE graduates in South Africa. This has been questioned by the Educators’ Board of ACE, for a number of reasons:

- The test is American; (ACE Principal’s Circular 17 August 2006);
- The test does not cater for learners whose first language is not English – this places these learners at a disadvantage (ibid.);
- The Matriculation Board requirements are that students must do the SAT I, which is a Reasoning Test, primarily multiple-choice, of three hour’s duration that measures verbal and mathematical reasoning abilities, or the SAT II which consists of Subject Tests, primarily multiple-choice, of one hour's duration per subject, that measure knowledge of particular subjects and the ability to apply that knowledge (SAUVCA Circular U2/2002). However, the SAT II tests are restricted to English and Physical Science or Chemistry (SAUVCA Circular 82/2004 – see Appendix 3) which has the effect of excluding students who major in such subjects as Biology, Social Studies (History and Geography), Business Economics, Accounting, and Technical Drawing at school and who may have dropped Mathematics and Physical Science at the end of Grade 9.

### 3.4.3 What are the Alternatives?

An issue raised by Foxcroft and Stumpf (2005: 20) is the possible need for universities to set their own entrance tests in the future for all candidates. They ask, “If universities are
going to accept a greater role in ensuring that prospective students are adequately prepared for the rigours of higher education study, the next question that arises is, will universities in future then start conducting their own admission tests and disregard the Matric/NSC results all together? Obviously universities would prefer not to have to go down this road. It is much more preferable to link additional admission requirements for higher education study to a nationally conducted test such as the Matric/NSC. Conducting our own version of an ‘SAT’ test surely has to be a last choice for universities. Unfortunately some policy developments and some educational trends may force universities in this direction.” This, they believe, will depend on the ability of the Matric/NSC examination as a predictor of success in tertiary studies. In a rebuttal of their argument, Allais (2005: 27) notes that “UMALUSI shares the general reluctance for entrance testing for higher education, and believes that careful thought should be given to who designs and administers such tests, and for what purpose.”

Nevertheless, there are already plans in place to institute a National Benchmark Tests project, which is a higher education initiative that could provide information over the next few years about the number of learners entering higher education studies who meet or do not meet the minimum benchmarks set for academic and quantitative literacy and mathematics. Foxcroft and Stumpf (2005: 21) conclude that “should it be found that large numbers of learners continue to be insufficiently prepared for higher education studies, the possibility of moving to a set of higher education admissions tests must be strongly considered.” Yeld (2005: 53) describes the National Benchmark Test Project as “an attempt to provide both sectors (schooling and higher education) with important information on the skills and abilities of their exiting (in the case of schools) and entering (in the case of universities) students – information that does not duplicate the essential information delivered by the school-leaving examination, but that provides an important extra dimension” – namely that it will focus on determining adequacy in three critical domains, viz. academic literacy, quantitative literacy, and mathematics and will then provide guidelines to tertiary institutions as to the placement of applicants e.g. degree or diploma studies, extended programmes or preparatory courses.
At this time, however, this arrangement is not yet in place – nevertheless, it does have relevance in our consideration of alternative entrance procedures, to which ACE graduates are subject.

### 3.4.4 Acceptance of ACE Graduates at University

Yeld (2005: 45) in discussing problems with the matriculation system in South Africa, states that, although “the majority of students entering higher education come to it straight from school… given South Africa's history of unequal provision and consequent unequal preparation for higher education study, and given our need in a rapidly changing world to continually reinvent and re-educate ourselves (lifelong learning), we need to ensure that access to higher education does not become so rigid that it:

- makes it virtually impossible for adults to enter higher education, or for people to have a second chance;
- narrowly constricts and constrains the curriculum so that all learners in FET are forced to follow more or less the same curriculum path.”

In the light of this opinion, it is pertinent to examine if there is any flexibility within the existing system and to see how ACE graduates are handled. SAUVCA Circular 3/2003 outlines the approach by some of the tertiary institutions that have accepted ACE graduates:

- **University of Cape Town**: ACESoT applicants are required to sit an AARP test (i.e. a UCT-developed Senate-approved alternative access programme) in English and Mathematics, usually in May or October of the year preceding the year of entry to University. The AARP test scores are considered with the SAT scores and ACESoT Certificate results before a final decision on admission to degree study is made;

- **University of Stellenbosch**: ACESoT applicants are required to sit the University's Access Test (Toegangstoets) and on the basis of results achieved Senate approval is sought for admission to degree study;
• **Rand Afrikaans University:** ACESoT applicants are not handled as a group, but the merits of each individual applicant are considered for Senate-discretionary admission;

• **University of the Free State:** ACESoT applicants holding the Grade 12 College Entrance Certificate have been admitted for degree study with effect from 2002;

• **Northwest University** admits ACESoT students to some faculties directly and in other faculties requires the student to enter via an access programme;

• **UNISA** admits ACE graduates into its “access programmes” and not directly into undergraduate studies (UNISA 2006: 7).

It has not been possible to get exact numbers of ACE graduates studying at these institutions, but it would appear that there is some flexibility within the current system for the acceptance of ACE graduates. It is also apparent that some universities set additional requirements for entrance while others accept the Grade 12 College Entrance Certificate with the SAT results at face value.

### 3.4.5 Concluding Remarks

It is evident that there is a world-wide movement away from using only one measure for assessing a student’s potential to succeed in tertiary level studies and that the issue of widening access, particularly in the context of South Africa, is important. This has generally been mooted because of the inheritance of inadequacies of the “apartheid system”, and aimed at “historically disadvantaged students”. While ACE students do not fall into the category of “historical disadvantage”, they would, however, fall under the “widening access” umbrella because they follow an alternative path to graduation at the Grade 12 level.

The debate over the efficacy of the Senior Certificate examinations to prepare students adequately for tertiary studies and to implement alternative entry tests is also relevant to the current thesis. The SAT has been widely accepted in the United States as a predictor of success in post-secondary education and provides an external benchmark test for ACE graduates in South Africa, as well. The empirical research will investigate how the
various stakeholders feel about these two issues – namely, alternative entrance and the SAT.

3.5 CONCLUSION

This chapter has examined three important issues – choices in education, college preparedness and alternative entrance to university – each one pertinent to our understanding of the nature of the ACE programme. In addition, the alternative nature of the ACE programme has once again been highlighted (also discussed in the literature review in Chapter 2). The alternative nature or “nonstatus quo method” (ACE 2001a Vol. II: 209) of the programme is perceived by outsiders as a weakness. However, “most critics do not understand enough about the ACE programme to give it a fair evaluation, but rather assess it from a conventional point of view. Their presuppositions are, ‘It is not the right way; therefore, it cannot work.’ This prejudgment results in a number of perceived weaknesses …” which are listed as being:

- “Its pedagogy which is learner-centred and individualised as opposed to teacher-directed and based on conformity to the group;
- Its theistic, God-centred, Biblically-based approach which focuses on God’s unique purpose for every individual, the individuality of every person, the priesthood of the believer, and the importance and accountability of every individual on a personal basis toward God. This is in opposition to an age of rational humanism and a secular mentality that underpin most modern educational systems.” (ibid.)

All the issues examined in both literature review chapters will be further interrogated in the empirical study.
CHAPTER 4: RESEARCH METHODOLOGY

4.1 INTRODUCTION

Chapter one forms an important background to the thesis. The aim of this study was to investigate perceptions of the Accelerated Education Programme as preparation for tertiary education.

In chapters two and three, in order to inform the research, an in-depth literature study was conducted on:

- Learning theories and pedagogy;
- Philosophies of education, namely Christian education and Outcomes-Based education;
- A comparative analysis of curricular approaches;
- Choices in education;
- Characteristics required for success at college; and
- The issue of alternative entrance to tertiary institutions in South Africa.

This chapter is devoted to a detailed description of the research design and methodology that was used in the study. Data collection strategies, validity and reliability of the research, sampling techniques, sample size used and data analysis are discussed.

4.2 RESEARCH AIMS

As was stated in chapter one, the aim of the study was to explore perceptions of the ACE educational experience when viewed as preparation for tertiary education from a threefold perspective which is attentive to the research question:
“How do ACE graduates, their parents and university admissions officers currently view the ACE programme in terms of its ability to produce students who are capable of successfully completing undergraduate studies?”

4.3 RESEARCH DESIGN

4.3.1 The Purpose of Qualitative Research

Qualitative research, broadly defined, means "any kind of research that produces findings not arrived at by means of statistical procedures or other means of quantification" (Strauss and Corbin 1990: 17). Where quantitative researchers seek causal determination, prediction, and generalization of findings, qualitative researchers seek instead illumination, understanding, and extrapolation to similar situations. Qualitative analysis, therefore, results in a different type of knowledge than does quantitative inquiry (Hoepfl 1997).

Qualitative research is “directed toward understanding human experiences and perceptions of such experiences as they occur in the natural world, a world in which humans directly or indirectly interact with everything in their environment. In such a schema, humans affect and are affected by their environment.” (Fitzgerald 2001: 200), and (ibid.: 260) “qualitative research is not about coming to a definitive conclusion, it is about trying to understand a phenomenon and to understand it well enough so you have the potential to make certain kinds of predictions with a reasonable level of confidence.” This means that qualitative researchers study things in their natural settings, attempting to make sense of, or interpret phenomena in terms of the meanings people bring to them. According to Law et al. (1998), the choice of qualitative research designs should be congruent with the following:

- The beliefs and worldviews of the researcher; i.e., the qualitative researcher usually expresses an interest in understanding the social world from the point of view of the
participants in it, and emphasizes the context in which events occur and have meaning;

- The nature of the end results desired; i.e., the qualitative research is seeking meaning and understanding, which is best described in narrative form;
- The depth of understanding and description required from participants; i.e., qualitative research usually involves the exploration of a topic or issue in depth, with emphasis on seeking information from the people who are experiencing or are involved in the issue;
- The type of reasoning involved: qualitative research is oriented towards theory construction, and the reasoning behind data analysis is inductive; i.e., the findings emerge from the data.

In qualitative research “investigators are closely associated with the process and the participants in the study” (ibid.: 8). Fitzgerald (2001: 200) calls this the “emic”, insider perspective as opposed to the “etic” outsider perspective. Sowell (op. cit.) goes on to say that because the purpose of the researcher is “to understand social phenomena, researchers usually have opportunities not only to observe but also to converse with the participants within the setting.”

Several writers have identified what they consider to be the prominent characteristics of qualitative, or naturalistic, research (Bogdan & Biklen 1982; Lincoln & Guba 1985; Patton 1990; Eisner 1991). The list that follows represents a synthesis of these authors’ descriptions of qualitative research:

- Qualitative research uses the natural setting as the source of data. The researcher attempts to observe, describe and interpret settings as they are, maintaining what Patton (1990: 55) calls an "empathic neutrality";
- The researcher acts as the "human instrument" of data collection;
- Qualitative researchers predominantly use inductive data analysis;
- Qualitative research reports are descriptive, incorporating expressive language and the "presence of voice in the text" (Eisner 1991: 36);
Qualitative research has an interpretive character, aimed at discovering the meaning of events for the individuals who experience them, and the interpretations of those meanings by the researcher;

Qualitative researchers pay attention to the idiosyncratic as well as the pervasive, seeking the uniqueness of each case;

Qualitative research has an emergent (as opposed to predetermined) design, and researchers focus on this emerging process as well as the outcomes or product of the research;

Qualitative research is judged using special criteria for trustworthiness (these will be discussed in some detail in a later section).

Patton (1990: 59) points out that these are not "absolute characteristics of qualitative inquiry, but rather strategic ideals that provide a direction and a framework for developing specific designs and concrete data collection tactics". These characteristics are considered to be "interconnected" (ibid.: 40) and "mutually reinforcing" (Lincoln & Guba 1985: 39).

According to Matveev (2002), the strengths of the qualitative method include:

- "Obtaining a more realistic feel of the world that cannot be experienced in the numerical data and statistical analysis used in quantitative research;"
- Flexible ways to perform data collection, subsequent analysis, and interpretation of collected information;
- Provide a holistic view of the phenomena under investigation (Bogdan & Taylor 1975; Patton, 1990);
- Ability to interact with the research subjects in their own language and on their own terms (Kirk & Miller, 1986);
- Descriptive capability based on primary and unstructured data";

while the weaknesses of the qualitative method (ibid.) include:
“‘Departing from the original objectives of the research in response to the changing nature of the context’ (Cassell & Symon 1994);

Arriving at different conclusions based on the same information depending on the personal characteristics of the researcher;

Inability to investigate causality between different research phenomena;

Difficulty in explaining the difference in the quality and quantity of information obtained from different respondents and arriving at different, non-consistent conclusions;

Requiring a high level of experience from the researcher to obtain the targeted information from the respondent;

Lacking consistency and reliability because the researcher can employ different probing techniques and the respondent can choose to tell some particular stories and ignore others.”

4.3.2 Validity and Reliability

According to Siegel (n.d.) qualitative researchers do not use the terms validity and reliability. Instead they are concerned about the trustworthiness of their research. Nevertheless, the issue of validity and reliability need to be considered as this is often a criticism of qualitative research (Sowell 2001; Winter 2000; Fitzgerald 2001).

Sowell (2001: 5) states that the validity of research refers to the degree to which outcomes are accurate and grounded in data. For example, did the data collection processes provide accurate data for analysis and was the analysis suited to answering the questions? Valid outcomes result from the selection and application of procedures that produce truthful answers to research questions. Winter (2000), however, maintains that “the exact nature of ‘validity’ is a highly debated topic in both educational and social research since there exists no single or common definition of the term. He then summarises the definitions provided by various authors as follows:
“‘An agreement between two efforts to measure the same thing with different methods’ – Campbell and Fisk (as cited in Hammersley 1987);
‘The measure that an instrument measures what it is supposed to’ – Black and Champion (1976: 232-234);
‘Accuracy’ – Lehner (1979: 130);
'Degree of approximation of 'reality' – Johnston and Pennypacker (1980: 190-191);
'Are we measuring what we think we are?’ – Kerlinger (1964: 430, 444-445); and
‘to the extent that differences in scores yielded…reflect actual differences' – Medley and Mitzel (as cited in Hammersley, 1987: 150).”

Given this range of definitions, it seems appropriate to summarise them further into two strands: whether the means of measurement are accurate; and whether they are actually measuring what they are intended to measure. Cohen et al. (2000: 105) say that a qualitative study may be deemed valid if it addresses the “richness, scope, depth and honesty” of the captured data. The extent to which the researcher has been able to remain objective, as well as the participants who were approached, contributes to the overall validity of the study.

A related issue is that of reliability. Winter (ibid.) sums up the definitions as follows:

“‘An agreement between two efforts to measure the same thing with the same methods' – Campbell and Fisk (as cited in Hammersley 1987)
‘Ability to measure consistently' – Black and Champion (1976: 232-234)
'Reproducibility of the measurements…stability' – Lehner (1979: 130)
'Capacity to yield the same measurement…stability' – Johnston and Pennypacker (1980: 190-191)
'Accuracy or precision of a measuring instrument?’ – Kerlinger (1964: 430, 444-445)
'To the extent that the average difference between two measures obtained in the same classroom is smaller than…in different classrooms' – Medley and Mitzel (as cited in Hammersley, 1987).”
Fitzgerald (2001: 243) is in agreement and states that reliability is about “replicability and consistency – basically will a particular technique give the same result each time?” She goes on, however, to say that, while validity is an issue for all studies, reliability is “often not relevant for qualitative studies”. Nevertheless, in the current research, it is hoped that the outcomes will be dependable and trustworthy (i.e. reliable). In order to ensure this, the technique of triangulation (Fraenkel & Wallen 1990: 380) has been employed and a variety of instruments used to collect the relevant data. Siegel (n.d.) states that triangulation is “the best way to elicit the various and divergent constructions of reality that exist within the context of a study” … i.e. “is to collect information about different events and relationships from different points of view” by “asking different questions, seeking different sources and utilising different methods”.

### 4.3.3 Data Collection

Denzin and Lincoln (1994: 2) describe the qualitative researcher as a *bricoleur*. In describing a *bricoleur*, they quote Lévi-Strauss' definition. "A *bricoleur* is a 'Jack of all trades or a kind of professional do-it-yourself person' (Lévi-Strauss 1966: 17). The *bricoleur* produces a *bricolage*, that is, a pieced-together, close-knit set of practices that provide solutions to a problem in a concrete situation." As a *bricoleur* the researcher is not restricted in the tools he or she can use in the inquiry, but can invent or reconstruct tools to meet the needs of the research question and context in which it occurs. Quantitative researchers do this too, but qualitative researchers have a sense of more freedom to be selective and to modify.

Data collection strategies focus on what the phenomenon means to participants (McMillan & Schumacher 2001: 428). Qualitative research involves the studied use and collection of a variety of empirical materials – case study, personal experience, introspective, life story, interview, observational, historical, interactional, and visual texts – that describe routine and problematic moments and meanings in individual lives. Accordingly, qualitative researchers deploy a wide range of interconnected methods, hoping always to get a better fix on the subject matter at hand (op. cit.).
This choice of method or tools is not arbitrary, however. In both cases, “in the end, people have to justify what they did and why. All researchers have to convince people that what they did was the best thing to do given the research question, the context, and resources available. The researcher must indicate how and why such tools are the best for this particular task, how they assist us in developing a deeper understanding of the focal phenomenon. In other words, the researcher must justify, justify, justify” (Fitzgerald 2001: 201). Sowell (2001: 22) refers to an array of strategies used by researchers to gather mostly verbal data in natural settings; such strategies then provide the researcher with holistic perspectives about the phenomenon under investigation.

McMillan and Schumacher (2001: 407) discuss a range of data collection strategies, which when used in a selective combination, have the effect of enhancing design validity. These strategies are listed and briefly described in the table below.

Table 3: Strategies to enhance design validity (McMillan & Schumacher ibid.: 208)

<table>
<thead>
<tr>
<th>Strategy</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Prolonged and persistent field work</td>
<td>Allows interim data analysis and corroboration to ensure the match between findings and participant reality</td>
</tr>
<tr>
<td>Multi-method strategies</td>
<td>Allow triangulation in data collection and data analysis</td>
</tr>
<tr>
<td>Participant language and verbatim accounts</td>
<td>Obtain literal statements and quotations from documents</td>
</tr>
<tr>
<td>Low-inference descriptors</td>
<td>Record precise, almost literal, and detailed descriptions of people and situations</td>
</tr>
<tr>
<td>Multiple researchers</td>
<td>Agreement on descriptive data collected by a research team</td>
</tr>
<tr>
<td>Mechanically-recorded data</td>
<td>Use of tape recorders, photographs and videotapes</td>
</tr>
<tr>
<td>Participant researcher</td>
<td>Use of participant recorded perceptions in diaries or anecdotal records for corroboration</td>
</tr>
</tbody>
</table>
Member checking | Check informally with participants for accuracy during data collection; frequently done in participant observation studies
---|---
Participant review | Ask each participant to review researcher’s synthesis of all interviews with the person for accuracy of representation; frequently done in interview studies
Negative cases | Actively search for, record, analyse, and report negative cases or discrepant data that are an exception to patterns or modify patterns found in the data

### 4.3.4 Data Collection Approaches

Hooper (2005) discusses three major approaches to data collection, namely primary, secondary and tertiary data collection. Primary sources are observations (participant or non-participant), interviews (either structured or unstructured), and questionnaires (either mailed or collective), while secondary sources are documents, such as government publications, earlier research, or personal records. Tertiary sources consist of information, which is a distillation and collection of primary and secondary sources. Twice removed from the original, they include encyclopaedias, fact books and almanacs, guides and handbooks. Some secondary sources such as indexing and abstracting tools can also be considered tertiary sources.

Highlighted below are the strategies and approaches that were used in the present study:

#### 4.3.4.1 Multi-method strategies

Qualitative research is multi-method in focus, involving an interpretive, naturalistic approach to its subject matter (Fitzgerald 2001: 201). Patton (1990) corroborates this: in investigating human behaviour and attitudes, he says it is most fruitful to use a variety of data collection methods.
The following data collection methods were used:

4.3.4.1.1 Participant language and verbatim accounts

This strategy involves using interviews, transcripts and documents which are then extensively quoted in the researcher’s study to illustrate participants’ meanings (McMillan & Schumacher 2001: 409).

4.3.4.1.2 Interviews

The use of interviews as a data collection method begins with the assumption that the participants’ perspectives are meaningful, knowable, and able to be made explicit, and that their perspectives affect the success of the project. An interview, rather than a paper and pencil survey, is selected when interpersonal contact is important and when opportunities for follow-up of interesting comments are desired (Frechtling & Sharp 1997). An interview schedule is used for conducting the interviews.

An interview schedule is described by Kumar (1999: 109) as a written list of questions, open or closed ended, prepared for use by an interviewer in a person-to-person interaction. McNamara (1999) lists the following requirements for interview questions:

- Wording should be open-ended. Respondents should be able to choose their own terms when answering questions. Kumar (1999) says that open-ended questions are useful for seeking opinions, attitudes and perceptions;
- Questions should be as neutral as possible. Wording that might influence answers, e.g., evocative, judgmental wording, should be avoided;
- Questions should be asked one at a time;
- Questions should be worded clearly. This includes knowing any terms particular to the programme or the respondents’ culture;
- "Why" questions should be asked with caution. This type of question infers a cause-effect relationship that may not truly exist. These questions may also cause
respondents to feel defensive, e.g., that they have to justify their response, which may inhibit their responses to this and future questions.

4.3.4.1.3 Document analysis

An important feature of human environments is the messages that people encode in various forms, such as written documents that include “textbooks, students’ completed homework assignments, tests, computer printouts of school data, newspapers and memoranda” (Gall et al. 1996: 356). Hoepfl (1997) adds “official records, letters, diaries, … and reports, as well as the published data used in a review of literature.”

The rationale for using document analysis in qualitative study is derived from the fact that interviews and questionnaires would not provide a complete picture of the culture under investigation. In addition, document analysis provides background information to some of the behaviours or actions of participants, which might be difficult to understand using interviews and questionnaires (Eisner 1991).

4.3.4.1.4 Mechanically-recorded data

Tape recorders, photographs and videotapes may enhance validity by providing an accurate and relatively complete record (Gall et al. 1996: 410). Whether one relies on written notes or a tape recorder appears to be largely a matter of personal preference. For instance, Patton (1990: 348), says that a tape recorder is "indispensable" while Lincoln and Guba (1985: 241), "do not recommend recording except for unusual reasons." Lincoln and Guba base their recommendation on the intrusiveness of recording devices and the possibility of technical failure. Nevertheless, recordings have the advantage of capturing data more faithfully than hurriedly written notes might, and can make it easier for the researcher to focus on the interview.
4.3.5 Sampling

Sampling is a procedure by which a subset of the whole is selected in order to illustrate, exemplify, or represent that whole (Edgerton & Langness 1974: 128 cited in Fitzgerald, 2001: 402). Sampling is unnecessary in some studies, and can be counterproductive in others. For example, when the object of the study is to understand the meaning of expressive behaviour, as in phenomenological research, or simply to understand how things work, sampling is unnecessary (Bernard 1988: 80). Fitzgerald (2001: 261) states that “very few qualitative studies work with samples, when they do they are often purposeful samples, a group of people chosen for particular reasons. Even in this case sampling may be an inaccurate term. What many people mean when they talk about purposeful sampling in terms of qualitative research is that they selected the people involved for particular reasons, they may or may not represent some larger ‘population.’ There may have been no intention to treat them as a sample in the statistical sense.” Law et al. (1998: 6) concur: “Sampling in qualitative research is purposeful and the process used to select participants should be clearly described. Purposeful sampling selects participants for a specific reason (e.g., age, culture, experience), not randomly.” In the present study, purposeful sampling was undertaken in that the participants were selected because of their experience with and involvement in the ACE programme. To have selected students from any other educational group, say matriculants generally, would have made no sense, as they would, in all likelihood, have no knowledge or experience of the ACE programme. This statement is supported by McMillan and Schumacher (2001: 401) who say that these samples are chosen because they are likely to be knowledgeable and informative about the phenomena the researcher is investigating. They indicate (ibid.: 404) that purposive samples can range from $n = 1$ to $n = 40$ or more. Typically, however, a qualitative sample size seems small when compared with the sample size needed for generalizability to a larger population.

Jensen (2005) warns that the sample proposed must be drawn in a defensible fashion and be substantial (i.e., rich, theoretically and conceptually justified) enough to draw
appropriate conclusions. Law et al. (1998) point out that “the main indicator of sample size in qualitative research is often the point at which redundancy, or theoretical saturation of the data, is achieved. The researcher should indicate how and when the decision was reached that there was sufficient depth of information and redundancy of data to meet the purposes of the study. The sampling process should be flexible, evolving as the study progresses, until the point of redundancy in emerging themes is reached.”

4.3.6 Trustworthiness

Establishing trustworthiness ensures the quality of the findings (Law et al. 1998: 8). It increases the confidence of the reader that the findings are worthy of attention. The basic question addressed by the notion of trustworthiness, according to Lincoln and Guba (1985: 290), is simple: "How can an inquirer persuade his or her audiences that the research findings of an inquiry are worth paying attention to?" They define trustworthiness in terms of the ability of an enquiry in any sphere to

- Demonstrate its truth, value or credibility;
- Provide the basis for applying it or its transferability; and
- Allow for external judgments to be made about the consistency or dependability of its procedures and the neutrality or confirmability of its findings or decisions.

When judging qualitative work, Strauss and Corbin (1990: 250) believe that the "usual canons of ‘good science’…require redefinition in order to fit the realities of qualitative research".

Credibility depends less on sample size than on the richness of the information gathered and on the analytical abilities of the researcher (Patton 1990). It can be enhanced through triangulation of data. Patton identifies four types of triangulation: 1) methods triangulation; 2) data triangulation; 3) triangulation through multiple analysts; and 4) theory triangulation. Other techniques for addressing credibility include making segments
of the raw data available for others to analyze, and the use of "member checks," in which respondents are asked to corroborate findings (Lincoln and Guba 1985: 313-316).

4.3.7 External Validity / Generalizability versus Transferability

In conventional research, external validity refers to the ability to generalize findings across different settings, or the generalizability of the results of a given investigation (Ottenbacher 1986: 221, cited in Fitzgerald 2001: 417). Making generalizations involves a trade-off between internal and external validity (Lincoln and Guba 1985). That is, in order to make generalizable statements that apply to many contexts, one can include only limited aspects of each local context.

Lincoln and Guba (1985: 110-111) admit that generalizability is "an appealing concept," because it allows a semblance of prediction and control over situations”. Yet they suggest (ibid.: 124) that the existence of local conditions "makes it impossible to generalize". Fitzgerald (2001: 241) disagrees: “Just because the research was done with a small or severely restricted sample or involved a qualitative methodology does not necessarily mean the findings cannot be generalized.” She does, however, warn (ibid.) that “there may need to be some cautions in doing so and, if so, these should be stated.”

In the naturalistic paradigm, the transferability of a working hypothesis to other situations depends on the degree of similarity between the original situation and the situation to which it is transferred. The researcher cannot specify the transferability of findings; he or she can only provide sufficient information that can then be used by the reader to determine whether the findings are applicable to the new situation (Lincoln and Guba 1985). Other writers use similar language to describe transferability, if not the word itself. For example, Patton (1990: 489) suggests that "extrapolation" is an appropriate term for this process. Eisner (1991: 205) says it is a form of "retrospective generalization" that can allow us to understand our past (and future) experiences in a new way.
In the current study, the issue of generalizability and transferability will be examined using a triangulated approach – qualitative questionnaires, interviews and document analysis.

4.3.8 Ethical Measures

4.3.8.1 Informed consent

Informed consent is ultimately viewed as a process that encourages greater openness and disclosure on the part of researchers, empowers voluntary participants in social research, and engenders a more collaborative relationship between researcher and researched (Fitzgerald 2001: 378). Kumar (1999: 192) maintains that in every discipline, it is considered unethical to collect information without the knowledge of the participants, their informed willingness and expressed consent. Informed consent implies that participants are made adequately aware of the type of information you want from them, why the information is being sought, what purpose it will be put to, how they are expected to participate in the study and how it will directly or indirectly affect them. Informed consent also provides an opportunity for prospective participants to ask questions and receive answers (See Appendix 11).

4.3.8.2 Confidentiality

Sowell (2001: 143) points out that before any data collection takes place, researchers must negotiate for permission to do so with the persons in charge of the institutions or settings where they want to collect data (See Appendix 9). This is because of issues of confidentiality. Towne et al. (2004: 43) state that “conceptually, maintaining confidentiality requires attention to three relevant questions: Who has access to data? What are threats to confidentiality? What are techniques for protecting confidentiality? On the question of who has access to the data, typically there is a restricted set of people who have full access to data and have promised to protect the confidentiality of the subjects. A key question is how this ‘umbrella of confidentiality’ can be extended while
ensuring that the responsibilities of confidentiality are upheld. With respect to the second question, a common threat to confidentiality occurs any time a researcher adds data to an existing data set, because the addition of, for example, geographic information to a person file increases the potential to identify individuals and complicates efforts to maintain confidentiality.” For example, in the present study, even though the questionnaires and testimonies have been alphanumerically coded, the citing of the institution and the degree course taken by the student, could technically allow someone to find out who that student is.

Thus, information obtained about and from subjects must be kept confidential unless otherwise agreed on, in advance, through informed consent. This means that no-one, except the researcher, has access to individual data or the names of the participants. Confidentiality can be assured if the data cannot be linked to the individual participant by name (McMillan & Schumacher 2001: 198).

4.9 DATA ANALYSIS

Thorne (2000) reminds us that qualitative data come in various forms. In many qualitative studies, “the database consists of interview transcripts from open ended, focused, but exploratory interviews. However, there is no limit to what might possibly constitute a qualitative database, and increasingly we are seeing more and more creative use of such sources as recorded observations (both video and participatory), focus groups, texts and documents, multi-media or public domain sources, policy manuals, photographs, and lay autobiographical accounts.”

Qualitative modes of data analysis provide ways of discerning, examining, comparing and contrasting, and interpreting meaningful patterns or themes. Meaningfulness is determined by the particular goals and objectives of the project at hand: the same data can be analyzed and synthesized from multiple angles depending on the particular research or evaluation questions being addressed (Frechtling & Sharp 1997). They continue by saying that “at the simplest level, qualitative analysis involves examining the
assembled relevant data to determine how they answer the evaluation question(s) at hand. However, the data are apt to be in formats that are unusual for quantitative evaluators, thereby complicating this task.” In order to solve this problem they recommend (ibid.) that, throughout the course of qualitative analysis, which is an iterative process, “the analyst should be asking and re-asking the following questions:

- What patterns and common themes emerge in responses dealing with specific items? How do these patterns (or lack thereof) help to illuminate the broader study question(s)?
- Are there any deviations from these patterns? If yes, are there any factors that might explain these atypical responses?
- What interesting stories emerge from the responses? How can these stories help to illuminate the broader study question(s)?
- Do any of these patterns or findings suggest that additional data may need to be collected? Do any of the study questions need to be revised?
- Do the patterns that emerge corroborate the findings of any corresponding qualitative analyses that have been conducted? If not, what might explain these discrepancies?”

Data analysis will then be subjected to a three-step process according to Miles and Huberman (1994, cited in Frechtling & Sharp 1997), namely:

- Data reduction – Data reduction refers to the process of selecting, focusing, simplifying, abstracting, and transforming the data that appear in written up field notes or transcriptions. Not only do the data need to be condensed for the sake of manageability, they also have to be transformed so they can be made intelligible in terms of the issues being addressed, and, indeed, answer the research question.
- Data display goes a step beyond data reduction to provide an organized, compressed assembly of information that permits conclusion drawing. A display can be an extended piece of text or a diagram, chart, or matrix that provides a new way of arranging and thinking about the more textually embedded data. Data displays,
whether in word or diagrammatic form, allow the analyst to extrapolate from the data enough to begin to discern systematic patterns and interrelationships.

- Conclusion drawing and verification - Conclusion drawing involves stepping back to consider what the analyzed data mean and to assess their implications for the questions at hand. Verification, integrally linked to conclusion drawing, entails revisiting the data as many times as necessary to cross-check or verify these emergent conclusions. "The meanings emerging from the data have to be tested for their plausibility, their sturdiness, their ‘confirmability’ - that is, their validity" (Miles & Huberman 1994: 11, cited in Frechtling & Sharp 1997).

4.10 DESIGN OF THE PRESENT STUDY

The research design of the present study followed a qualitative approach. Data collection strategies used were questionnaires, individual interviews and document analysis.

4.10.1 Choice of Qualitative Methodology

Qualitative research is directed toward “understanding human experiences and perceptions of such experiences as they occur in the natural world, a world in which humans directly or indirectly interact with everything in their environment (Fitzgerald 2001: 200). She continues (ibid.): “Qualitative research is about human experience and meaning, but it is a research approach that can address far more. Qualitative research can help us understand all kinds of phenomena. It can help us understand why organisations are organised the way they are and function the way they do. They can tell us about how people affect and are affected by their environment. They can help us understand why people interact in the way they do and why we get particular kinds of outcomes under certain kinds of conditions.”

The current study is aimed at understanding perceptions and meanings that participants attach to their experience of the ACE programme, what influenced their choice of this programme and how they have been affected by these choices as well as the perceptions
of others. Therefore a qualitative approach was selected as the most suitable approach to conduct the study. In Section 4.3.8.1, I discussed the ethics of collecting the necessary information by using “informed consent” which means that the information is collected with the knowledge of the participants (e.g. students, parents and university admissions officers) and other stakeholders such as the owners of information contained in confidential databases (e.g. ACE Ministries). Therefore the researcher applied for permission to conduct the research. Appendix 9 is a copy of the correspondence relating to this matter.

4.10.2 Internal Validity

To ensure internal validity, four of the ten strategies described by McMillan and Schumacher (2001: 407) were used to enhance the validity of the study, namely:

- Participant language and verbatim accounts and low inference-descriptors (section 4.3.4.1.1 and 4.3.4.1.2)

In this study, a “participant construct interview” using an interview schedule was employed “to learn how informants structure their physical and social world” (Gall et al., 1996: 307), and was structured to expose all respondents to a nearly identical experience. The reason for using the term “nearly identical” is that the opening statement, the interview questions and the closing remarks are specified in advance to ensure the meaningful comparison of data from all the respondents; however, the interview format is not so tightly structured because the researcher’s goal is “to collect data to address questions about what people think, for example their beliefs, values, and attitudes” (Fitzgerald 2001: 191), which can, according to the Family Health International (n.d.) often be “contradictory behaviours, beliefs, [and] opinions…”. In addition the researcher’s goal is to “help respondents express their view of a phenomenon in their own terms” (Gall et al. 1996: 309). The general interview guide approach is intended to ensure that the same general areas of information are collected from each interviewee; this provides more focus than a conversational, unstructured interview approach, but still
allows a degree of freedom and adaptability in getting the information from the interviewee (McNamara 1999: 1). The “nearly identical experience” is a useful approach because it allows for a simpler analysis of the data and one can more easily detect similarities and differences, trends and patterns. This arises out of “low-inference descriptors” which are the result of concrete and precise, almost literal descriptions from field notes and interview elaborations – both hallmarks of qualitative research and the principal method for identifying patterns in the data (McMillan & Schumacher 2001: 409). Interviews were conducted in a language that the participants use daily.

- Mechanically-recorded data (section 4.3.4.1.3)

The interviews as described above were tape-recorded, transcribed and submitted to the interviewee for substantiation. A signed and dated copy was returned to me for my records.

- Document analysis (section 4.3.4.1.4)

In this study, the following documents were collected and analysed:

- Testimonies from ACE graduates and parents submitted to the ACE National Office for publication in the Accelerator magazine, a quarterly publication produced by ACE (SA);
- Student results from universities where they were supplied voluntarily by the students, parents or schools; and
- Letters to students from deans of various faculties.

This allowed for triangulation, a further technique to enhance validity and reliability. Validity was further enhanced by the selection of a purposeful sample that is rich in information in the topic under investigation. The researcher addressed individual bias by a continuous self-examination to ensure that personal biases and stereotypes did not influence the interpretation of the data. The analysis of the data was carried out in a
systematic and disciplined way, so that the analysis could potentially be replicable insofar as others can be "walked through" the analyst's thought processes and assumptions (Frechtling & Sharp 1997).

In ensuring the reliability of the study, information gathered was checked several times in order to ensure that nothing had been overlooked. Purposeful sampling, with its use of knowledgeable participants, further enhanced the reliability of the study.

4.11 ETHICAL MEASURES FOR THE PRESENT STUDY

4.11.1 Access to Information

An application was made in writing to the CEO of Accelerated Christian Education Ministries (Africa and Scandinavia) for permission to conduct the research. Several emails were eventually sent to the Director of Academic Policy to explain the purpose and nature of the research (Appendix 9). Appendix 10 is a copy of the final response received in writing. Participants were informed in advance of the purpose of the investigation as well as their rights to refuse to answer any question or to discontinue their participation at any time. Appendix 11 is a copy of the document. All participants gave their permission to participate in both the questionnaire as well as the interviews that were conducted thereafter.

4.11.2 Confidentiality

All participants and stakeholders were given assurance of full confidentiality and anonymity. No personal identifiable information was revealed. Codes were used in the place of names of participants in order to ensure confidentiality and the anonymity of participants who took part in the investigation. Participants were assigned codes such as S1 for a student, P1 for a parent, D1 for a student submitting a testimony and U1 for a university admissions officer.
4.11.3 Other Ethical Aspects

The following further aspects were taken into consideration:

- Acknowledgement of all assistance received;
- Acknowledgement of sources by means of complete references and a bibliography; and
- Presentation of the findings without distortion.

4.12 THE SAMPLE

The sample, as stated previously, was a purposeful one. All the graduates of ACE up to the end of 2005, who had applied for tertiary studies and had indicated their acceptance at a tertiary institution, were selected. There were at that time two hundred and forty such students in the ACE Graduations database. The sample was further refined by contacting the students via email or telephonically to confirm their contact details; some details had changed and were not made available to ACE Ministries and so these students fell out of the sample, leaving one hundred and forty two students, all of whom were then sent the questionnaire by email or post. The questionnaire for parents formed a part of this mailing. The sample of university admissions officers was selected on the basis of their contactability, which proved to be quite problematic in that they were seldom available to speak to. Three such officers were contacted and agreed to complete the relevant questionnaire.

4.13 THE ROLE OF THE RESEARCHER

4.13.1 Researcher Competency and Relationship with the Participants

I have been an employee of Accelerated Christian Education Ministries (Africa and Scandinavia) for eight years. Over these years, I have variously been employed as the examinations officer (when ACE conducted its own examinations from 1998 – 2002);
curriculum development specialist, graduations officer (from 2003 – 2005) and quality assurance officer (from 2005 to present). My current post involves policy development, curriculum development and quality assurance. It is particularly the duties of graduations officer that have relevance to this study, as I was involved with the issuing of the students’ Grade 12 College Entrance certificates from 2003 – 2005; and as a member of the Educators’ Board of ACE, was party to all the discussions and deliberations regarding the acceptance of this certificate for tertiary study purposes. As such, the participants knew who I was and, because of a reputation for integrity and diligence, I had established credibility in their eyes.

4.13.2 Language used during the Research

Although some of the graduates and parents who returned questionnaires were Afrikaans- and Sotho-speaking, all the graduates had taken English as First Language for their Grade 12 certificates. The questionnaires were prepared in English and the subsequent interviews were also conducted in English. The participants who were interviewed all use English as their spoken and written language.

4.13.3 Data Gathering

Primary data sources were used during the study, as outlined in section 4.10.2.

4.13.3.1 Questionnaires

Although questionnaires are usually associated with quantitative research, they can be used where focus groups are not possible (Harding et al. 2005: 3). The initial method of data gathering was by means of a written questionnaire, using “open-ended questions”. The questionnaires were based on a standard questionnaire used by the ACE Graduations Department on an ongoing basis in following up ACE graduates. It was expanded by means of other questions that provided additional information. Appendix 11 provides a copy of the questionnaires. These were sent to one hundred and forty-two graduates and
their parents. Thirteen graduates and ten parents responded. Two parents had two graduates that they reported on; one parent responded but the graduate did not. This accounts for the discrepancy in numbers. The questionnaires followed essentially the same format, with relevant modifications for the graduate or the parent.

The questionnaire for the university admissions officers (Appendix 16) also used open-ended questions, with the focus being on their perceptions and experience with ACE graduates at their institution.

4.13.3.2 Interviews

In-depth interviews were conducted with two graduates and two parents. Appendix 14 is the interview schedule that was used during the individual interviews. Open ended questions were used during the interviews, and additional questions were asked to obtain clarity where this was not initially forthcoming. The interviews were recorded on tape and transcribed verbatim. Copies of the transcripts were returned to the participants for their confirmation and signature as a true record of the interview.

4.13.3.3 Document analysis

I collected data from emails and letters sent to ACE by graduates and parents for inclusion in the ‘Accelerator’ magazine, published quarterly. The magazine itself was used as a source of information where the original letters were not available. Documents dating back to 2002 were used as this is the year when ACE graduates began to be officially accepted into universities in South Africa.

4.13.4 Analysis of Data

The steps indicated in the cyclical process of data analysis as outlined by Frechtling and Sharp (1997) were followed. (See section 4.9).
4.13.4.1 Data Reduction

Questionnaires were analysed and the information synthesised for analysis by grouping and recording verbatim the responses to each question. A similar exercise was done for the graduate questionnaires, the parent questionnaires and the university admissions officer questionnaires. (Appendix 12, 13 and 16). The transcriptions from the interviews (Appendix 14) were analysed to determine any similarities or differences.

The information available from the documents was synthesised and tabulated to examine any similarities between what had been asked in the questionnaires and what had been freely and spontaneously reported in the testimonies of graduates and parents via email or letter. (Appendix 15)

4.13.4.2 Presentation of data

The data obtained by means of the data collection strategies described in Section 4.10, are presented in Chapter 5 under specific themes and categories.

4.13.4.3 Interpretation

In Chapter 6, the conclusions that are drawn from the findings of the study and the recommendations for improvement to the management and implementation of the ACE programme, as well as a revisiting of university entrance criteria for ACE graduates, are presented.

4.14 CONCLUSION

This chapter outlined and addressed the rationale for using the qualitative research methodology. Issues of validity, reliability, trustworthiness and confidentiality were addressed and the data collection strategy was detailed. Limitations of the present study were briefly discussed.
Chapter 5 deals with the presentation and analysis of the data as well as a discussion of the main themes that emerge from this.
CHAPTER 5: FINDINGS AND DISCUSSION

The research strategy and the various methods in which the participants were identified and approached were addressed in Chapter 4, section 4.10. The results of the data analysis are presented in this chapter under various themes.

5.1 THE SAMPLE

The sample, identified in Section 4.3.5 was a purposeful one, selected on the basis of the specialist knowledge and experience of the members of the sample. The ACE Graduate database revealed that there were two hundred and forty graduates (over a period of 4 years from 2002 – 2005) who had proceeded to tertiary education after completing their schooling. Confirmable contact details were available for one hundred and forty two of these students who were subsequently contacted with regard to participating in the study. Of these graduates, thirteen responded to the invitation to participate and subsequently completed the questionnaire (Appendix 9).

Included with the questionnaire to students, was a questionnaire for their parents. Of these, ten indicated their willingness to participate and subsequently submitted the questionnaire. It must be noted that three parents had two graduates each, and one parent submitted the questionnaire while the student did not.

In addition, letters and emails had been received from graduates, parents, principals of schools and university deans about a further sixty four graduates (excluding the participants in the questionnaire) regarding their various experiences at university. In analysing these documents, it was noted that they addressed many of the themes covered in the questionnaire sent to the other graduates, and so provided a basis for comparison between answers that had been solicited by me, as the researcher, and those that had been offered independently.

The total number of students then that form the sample for this study is seventy seven.
5.2 THE CODING SYSTEM

The coding system used to preserve confidentiality was designed as follows:

- S1 – S13 = student questionnaires (Appendix 12)
- P1 – P11 = parent questionnaires (Appendix 13)
- S7I and S13I = student interviews (relating to S7 and S13) (Appendix 14)
- P6I and P10I = parent interviews (relating to P6 and P10) (Appendix 14)
- D1 – D64 = documentary evidence (Appendix 15)
- U1 = questionnaire for university admissions officers (Appendix 16)

The codes were used to replace actual names of participants.

5.3 THE ACE EXPERIENCE

5.3.1 Reasons for Choosing an ACE School

Every parent, without exception, gave Christian education as the reason for their choice; while several also said that they were not happy with the state system (Section 3.1). None, however, mentioned that they had chosen the ACE programme specifically, showing that they were perhaps unaware of what the programme actually entailed when they enrolled their children in a school. Subsequent experience with the behavioural pedagogical approach (Sections 2.2.1 and 2.2.2.2) of the ACE system, however, does not appear to have been an issue for any of the respondents, as no negative comments were received in this regard.

P6I stated that “It’s a very good programme, you know, and I think it’s a very Godly one and I think for a country that is struggling well, struggling as badly as this country, to put children through an ACE system with the Biblical foundation that it gives – that’s how you build a nation.” P10I summed up by saying “I think it’s a brilliant programme. I do!
We put both our boys there. And it’s not because we didn’t have any other choice. … If I had another child, would I put that child in the system? Absolutely.”

The students who were interviewed (S7I and S13I) had both started their education in an ACE school at a very young age (Grades 1 and 2 respectively) and so had little choice in the matter, but both said that it was because of the Christian foundations and principles that their parents believed in.

### 5.3.2 Recollections of the Day-to-Day School Experience

The evidence gather under this heading has been extracted from the interviews with students and parents.

Both interviewed students had been at a school as opposed to a home school, and recalled that the day-to-day experience had been “fine” (S13I) and “pleasant” (S7I). Getting through the work was a matter of self-motivation – “you owe yourself to work, there’s a lot of students who don’t do anything … and so you have to keep yourself focused” (S13I), and the teachers “only really help you if you put your flag up, otherwise you just keep watching the clock waiting for the time to go by.” In response to a question about motivation, the student agreed that “goals help you a lot”… “and also they [the teachers] do check the next day to see that they have been done. Also you have minimum goals you have to set.” In describing the physical environment, student S13I felt that the concept of the “student office” was “a good thing” and it was “really designed … obviously to keep you from talking to the other students so that you keep doing your work.” S7I felt that the multigrade system was not always conducive to a good learning environment: “having large classrooms with so many different grades in at the same time, … it sometimes got a bit out of hand on the noise side.”

S13I felt that the self-pacing was beneficial as this helped him to finish a year early, but S7I felt that the self-pacing in the early high school years had allowed him to become slack: “I wasn’t so energetic in getting my work done and I’d … make excuses to get out
of that whenever an opportunity came to go out for the day or miss out on things like science, I’d take it, but as I soon realized, when it came to my 2nd last year and my final year, I look back and wish I had actually not done that. Because you start getting the feeling of being ready to leave school, … so you start working as hard as you possibly can”, but “I worked so hard that I burnt myself out so I wasn’t able to keep up the pace for the last 1½ years…”.

### 5.3.3 Highlights of the School Programme

#### 5.3.3.1 Main trends

Parents variously mentioned spiritual growth, Christian character, and student conventions. The majority of students’ responses also highlighted the student conventions, while goal-setting, independent learning, Christian principles and the opportunity to develop leadership skills were other highlights recalled. The values of self-discipline, perseverance, diligence, consistency, work ethic, good relationships with people, prudence, excellence and determination were cited in the documentary evidence as personal strengths that students had developed through studying the ACE programme. (See Appendices 12 and 15). Other evidence gleaned from a survey of the documents reveal that students are taking leadership roles (D1, D2, D6, D22, D25, D28, D52), and involving themselves in community service (D7, D8, D14, D21, D52).

#### 5.3.3.2 Teacher-Pupil relationships

One student (S2) mentioned the good personal relationship she had with her supervisor as a highlight of her schooling, while D9 said that his transition from a public school to a Christian school was made “all the easier with the help of an incredible group of teachers who have a passion for training us up as young men and women of God.” Another student (D11) wrote that he “truly admires the staff at [school name] – they have shown me what it is like to literally give up everything for God and to serve and trust Him faithfully even in difficult times.”
5.3.3.3 Moral values (Section 2.2.1)

Parents said that their children were able to “think and act like a Christian in the midst of pressure from other students” (P7), “knowing what is right and wrong” (P4), and “We believe that their foundation for their life has been established on the “ROCK” and that all that they face in their lives ahead of them will be manageable – they will cope and make sound decisions for whatever venture they embark on. They are loved and secure in whatever circumstances they find themselves in” (P11). S13I felt that the Christian values he had learnt at school helped him in moral decision-making: “You can do anything at varsity – it doesn’t matter – and so the Christian side helps a lot to make the right decision and to keep your values.” D51 stated that “I have no need to give in to the world’s way of living because I have been taught to stand for what I believe in.” D53 stated that she credited most of her morals and values to the school she had attended, while D58 stated that the Christian values that were instilled in her at school, helped her through her first year at University.

5.3.4 Attitudes towards the Programme

5.3.4.1 Own attitudes

The students themselves revealed that they personally were quite satisfied with the programme:

- “I think it was a good system that I went through. As I said, I never went to any other school. I only went to one school all the way through so I don’t really have anything to compare it to but as far as I can tell, I’m doing pretty well at varsity now” (S13I);
- “… it is a very powerful programme. Whenever I did homework and I’d tell my parents about what I was doing, they always find that ‘Wow, that’s amazing – we never learnt any of that sort of thing in a government school.’ What we find a strength
in the ACE programme is that it goes into very deep detail, about different subjects” (S7I);

- S5 wrote that “ACE made it possible for me to feel as comfortable at school as at home or church” and that “it provided an environment where I was allowed every opportunity to grow in my Christianity, rather than face constant criticism and ridicule for it.” D48 concurred, calling the school “a home away from home”.

Both interviewed students indicated that they would put their own children in an ACE school although S13I was a little more cautious than S7I:

- “… I find that the working environment and having that Christian basis and all the Biblical principles that you get through the ACE experience has impacted on me and I would definitely want that for my children” (S7I);
- “That’s difficult. I probably would if they sorted out the difficulty of getting into a tertiary institution. Because I know it takes a lot to get in. If they standardized that, then it would be fine” (S13I).

Documentary analysis revealed comments like:

- “dit bevestig dat die ACE sisteem en School of Tomorrow uitstekende opleiding aan leerlinge verskaf” [This confirms that the ACE system and School of Tomorrow provides excellent education to learners] (D32);
- “The parents have this to say: ‘Thanks to the School of Tomorrow, she is an example to the other students and we would like to thank you’” (D2).

The student questionnaires included a question on what they would change regarding their secondary education. The answers, indicative of attitudes towards the programme, revealed the following:

Four students said they would change nothing while three students gave no comment at all, leaving the answer blank. One student (S8) mentioned “more social activities” while
another said she would “go to a public school from Grades 10 – 12” but did not give a reason for saying so. S3 and S4 suggested doing away with access tests and the SAT, while S10 said that the “introduction of six-monthly examinations” would be a good idea. S7I mentioned “I would have them revise all the SA PACES all the SA Math and say Afrikaans because even going through it myself, especially in Math – caused me problems because there’ve been so many glitches that I’ve spent three hours trying to work out a sum that was incorrect.”

Parents were more outspoken regarding this question of recommended changes, with only two saying that they would not change anything. Three aspects that seem to dominate the suggestions for change are social interaction and exposure, the quality of the locally-developed, South African PACES, and the lack of examinations. The issue of limited sporting activities was raised by P10I and S7I. The questionnaire did not restrict the amount of comment and respondents were free to provide as much or as little comment as they felt necessary; the suggestions for change were sparse, while the positive comments were much more detailed. These answers indicate a general degree of satisfaction with the system.

5.3.4.2 Attitudes of others

Interviews were the main source of information on this theme. For the students, the attitudes of others seems to have been a non-issue. On the other hand, parent interviews revealed that there was a fair amount of negativity towards the system from others:

- In speaking of the attitude of other family members, “… they actually thought that the system wasn’t so good but now that they see the fruit of it…” and “in fact I had a teacher come to me and say, ‘…, you should really take [name of student] out for the last few years’ but I chose not to – I chose to keep him in the ACE system” (P6I). The parent continued that this teacher “just thought he wouldn’t get a good matric.” At the same time, the parent indicated that no-one could give her a definitive reason for their negative comments.
P10I felt that negative attitudes were related to the experience at a particular school – “I think it’s a [school] thing – I think that there are people who are absolutely sold out for it, but … I think there are a lot of people who don’t really know the system and they are the ones who are difficult but you know what it is – they are the ones who have had a bad experience with the school and so they blame the system [her emphasis].” The same parent said that a common perception is “that you are isolating your kids” and “taking them out of the world”. The parent also said that others had commented that “they [the students] learn it all parrot fashion” (possibly related to negative perceptions of the behaviourist methodology – mentioned in Section 2.1.1.3) and agreed that this could happen but “if you have a good teacher, good monitor, good supervisor, it should not be a problem, but it’s just the work – you have to work the system … – your school’s got to have the staff, otherwise the children will battle.”

To sum up, it appears that although the opinion of others has been negative, it is put down to a lack of experience, understanding or ignorance of the system. Negative perceptions could be an area for further research.

5.3.4.3 Opinions of university admissions officers

Only one response was received to the questionnaire (Appendix 16). The information is summarised below.

U1 first came to hear about the programme in about 2001. In his opinion, the ACE students are performing very well and “they should be allowed to enter at any university, based on their academic results at the [name of university]”. He indicated that there were no reservations on the part of the university to admitting ACE graduates and that all the faculties at that specific university are open to such students. Regarding the use of the SAT as a benchmark test for these graduates to enter the institution, he indicated that he regarded this as acceptable.
This is a positive response that substantiates the generally favourable attitudes towards the programme as evidenced in Section 5.4.3.1.

5.3.5 Career Guidance

Career guidance was raised in Chapter 3, Section 3.3.2, as a factor that influences success at college. Guidance would include advice about career choices, courses available, standards required at tertiary level, and how one can prepare adequately even while at school for tertiary studies.

5.3.5.1 The academic projection

The ACE system provides for the development of a study plan, called an academic projection, (Section 3.3.2) to guide students through the last years of their schooling. This is designed to prepare the students for tertiary education (or for the working world where students do not intend going on to further studies).

Students’ responses in the interviews show that the range of courses available at the schools where they had studied, had an influence on subject choices, and that this was a fairly restricted choice. Both interviewed students did Mathematics, English, Science, Afrikaans, Business Economics, and Biblical Studies as their subjects for Grade 12, but went in different directions after school – one into Computer Sciences and one into B. Comm. P10I commented that the children compared ACE schools and had said that “‘Mom, you know that at [name of school], they offer this and this and this’ … – and that does make a difference, but the thing is, we need to be working towards those things – we do. Because it just gives the kids more of an awareness of what’s out there …”

5.3.5.2 The process of choosing subjects for Grade 12

S7I revealed that he had sat down with the principal and his parents to see which subjects he was interested in, but at the time of drawing up his Academic Projection, had no idea
of what he really wanted to do except that it was in the business direction. He felt that he was too young really to decide (at the end of Grade 9) so he “just went for the basics”. The parent (P6I) concurred.

S13I felt that his school had not really given him any specific career guidance but he had known all along what he wanted to do and thus chose subjects that would get him into the desired course. There were no specific subject offerings that related to his chosen degree, however. The teachers helped him to choose the subjects. The parent (P10I) concurred that “he always knew right from the beginning of the high school era that he wanted to go to university and so … when he chose the subjects, he chose them for the credits he could get to go to university.” She later stated that the student didn’t get any career guidance as far as university entrance procedures (Section 3.3.2) and courses available were concerned. “I mean even for his SAT, he had to fish it all out and find out and do for himself. For some career guidance I took him down to the technikon and even then I got the telephone number from one of the other moms.”

Questionnaires revealed little as far as career guidance was concerned:

- “It would have been nice to have had something like a career week to go and visit institutions at which you might want to work” (S8);
- “To know what the real working world would be like. There were no visits to large companies, nor any aptitude testing” (P6).

It can be concluded that little real guidance was provided at the ACE schools where the respondents attended – an issue highlighted by Pargetter et al. (1998) who concluded that there was “a significant information gap between universities, secondary teachers and secondary students concerning course structures and academic expectations, leading to inaccurate expectations of vocational and career outcomes identified with particular courses and subjects, or to inaccurate assessment of flexibility in course selection” (Section 3.3.2).
5.4 PREPARATION FOR TERTIARY EDUCATION

All the respondents to the questionnaire indicated that the ACE programme was conducive to providing skills required in tertiary education, with documentary evidence supporting the answers provided by the respondents.

Student questionnaires, parent questionnaires and interviews highlighted goal setting and time management (Section 3.2.2.2 and 3.3.3.), and independent learning (Section 3.3.9) as strengths of the programme. Documentary evidence confirmed this, with 13 of the students citing both goal setting and independent learning as the strengths of the ACE programme that they had carried with them into tertiary education.

While several other characteristics were also mentioned, it is clearly the goal setting and independent learning that stands out in the minds of most people. P10I in highlighting goal setting as the thing that stood out most in her mind about the ACE system, said, “I think it’s taught him to pace himself. And when it comes to exams or that, he knows what he has to do. He sets the goals. We never have to say to him …, you need to go and study. He knows what he has to cover for the exam and he sets goals so that by the time the exam comes, he has covered all that work. I’ve seen him do it. And even at work …. I mean this year at work he decided he wanted to double what he was earning, you know commission-wise, starting at the beginning of this year. That was his goal, And he set himself the goal and I said, ‘Well, how are you going to do it?’ and he said, ‘OK, Mom, if I want to make this amount of money, I have to sell this much, and it usually works out that it is so many customers that I have to sell to.’” The parent went on to say that this was a “life skill” that the student had developed “even as far as his budgeting is concerned – I’ve seen it. We’ve never really ever had to say to him – and I mean [name of student] has got expensive tastes – he really has. But he knows if I want that, then I’m going to have to do this, this, this, and this to get it and, as I say, he says, ‘I know that I have to set those goals and for those three months I won’t do this, this, and this and so by the time I get to the sixth month I’ll have that much money so I don’t have to worry and I can do whatever.’”
Documentary evidence also revealed (in order of number of times mentioned) that self-discipline, self-motivation, perseverance, diligence, consistency, work ethic, good organisation, good relationships with people, prudence, planning, leadership, high standards, excellence, effective study habits, and determination were what the students had developed through the ACE system. Many of these characteristics were discussed in Chapter 3, Sections 3.2.2.2 and 3.3 as essential for success at tertiary level.

In summary, the report from a career guidance counsellor on one student (D47) stated that “die skoolsisteem rus haar goed toe vir hoër onderwys.” [The school system is preparing her well for higher education].

5.4.1 Essential Skills for Tertiary Education – Self-Rating

A synthesis of the self-rating of the 13 students who responded to the questionnaire regarding essential skills as discussed at length in Chapter 3, Section 3.3, is shown in the table below. It is interesting to note that goal-setting and time management appear at the top of the list, confirming what was said earlier.

The four items at the bottom of the list would appear to indicate areas where improvement is needed in terms of preparation for tertiary education, although the average ratings are not dramatically lower than for the other factors. Three of these – test-taking, making notes and effective listening – could relate to the individualised approach of the ACE system where the PACE system tests small amounts of work as opposed to large chunks of work tested at university e.g. semester or year-end examinations (Section 3.3.8); and the lack of group teaching or lecture-style classes where the teacher teaches and the students listen and make notes, although this is provided for in the ACE programme (Sections 3.3.4 and 3.3.5). The areas for improvement are investigated further in Section 5.4.2.
Table 4: Essential Skills – Self-rating on a scale of 1 – 5 (1 being weak, 5 being excellent) (based on skills identified in Chapter 3, Section 3.3)

<table>
<thead>
<tr>
<th>S1</th>
<th>S2</th>
<th>S3</th>
<th>S4</th>
<th>S5</th>
<th>S6</th>
<th>S7</th>
<th>S8</th>
<th>S9</th>
<th>S10</th>
<th>S11</th>
<th>S12</th>
<th>S13</th>
<th>Average</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ability to set goals and manage time</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>5</td>
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<td>5</td>
<td>4</td>
<td>4</td>
<td>4.38</td>
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<tr>
<td>Ability to read effectively</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>3</td>
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<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4.38</td>
</tr>
<tr>
<td>Ability to work well with others in the educational setting</td>
<td>5</td>
<td>2</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>Ability to write effectively</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>3</td>
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<td>4</td>
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<td>5</td>
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<td>5</td>
</tr>
<tr>
<td>Ability to think critically</td>
<td>4</td>
<td>3</td>
<td>5</td>
<td>4</td>
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<td>5</td>
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<td>2</td>
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<td>5</td>
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<td>4</td>
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<tr>
<td>Ability to think quantitatively</td>
<td>3</td>
<td>2</td>
<td>5</td>
<td>4</td>
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<td>5</td>
<td>5</td>
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<td>5</td>
<td>3</td>
<td>5</td>
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<td>4</td>
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<tr>
<td>Possession of adequate study skills</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>4</td>
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<td>Possession of test-taking skills</td>
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<td>5</td>
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<td>4</td>
<td>2</td>
<td>2</td>
<td>4</td>
<td>3.92</td>
</tr>
<tr>
<td>Ability to take notes in class</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>Oral communication skills</td>
<td>4</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>3</td>
<td>1</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>3</td>
</tr>
<tr>
<td>Ability to listen effectively</td>
<td>3</td>
<td>4</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>4</td>
<td>2</td>
<td>3</td>
<td>5</td>
</tr>
</tbody>
</table>

The parent interviews highlighted the development of memory skills (P10I), reading skills, test-writing and essay writing skills (P6I); while the student interviews revealed that essay writing (S13I), memorisation skills (S13I and S7I) and the ability to find the right information in a text (S7I) were essential.

- “We were always taught or encouraged by ACE that, in fact, once they had completed their ACE they would be able to essay write. There is something called “creative writing” which … did for about a term or two but then it was dropped away which I think if it had been allowed to continue, his essay writing would be better. He is, as I’ve said before, he’s my logic young man and he does not like essay writing. He just likes logic. …, on the other hand, with the ACE system, I was told that it has
generally been a complaint that there’s not enough essay writing, when discussing it with friends, in the ACE, but I have found with [name of student] that there has been adequate essay writing …” (P6I);

• “ACE helped me especially understand the steps to answering essay questions effectively and accurately through the use of outlines, etc. Also, having to research and develop my own thoughts in order to write my Grade 11 thesis taught me many skills necessary for tertiary education. Finally ACE taught me to think for myself (to ask diagnostic questions and to come to my own conclusions). This is valuable in tertiary studies where you are often challenged to develop your own ideas on a particular subject” (S5);

• P1 also specifically mentions “logical thinking and reasoning” at the top of the list;

• D36 stated that the development of a research paper and rough drafts which are included in the Grade 11 English PACEs were “vital skills for any student” and commended the programme for incorporating this.

In view of these findings, it is apparent that in terms of the core competencies identified in Table 2 (Section 3.2.2.2), ACE graduates generally regard their preparation for tertiary studies as above average.

5.4.2 Areas where the ACE Programme did not provide Sufficient Skills

To identify negative attributes, survey respondents were asked three questions:

• In what ways did the ACE programme not prepare the students for tertiary education;
• Were there any subjects that were deficient in preparing them; and
• What changes to the secondary school programme would they suggest?

5.4.2.1 “Big Exams”

A problem area highlighted by several students and parents in the questionnaires was “test-taking (Section 3.3.8, and Table 4) in the sense of “big exams” – this was mentioned
as an area for which the ACE system had not prepared them. Answers given during interviews corroborated this:

- “I wouldn’t say it didn’t prepare me, but I know like the first time I wrote a big exam, it was my first year at university and …– while I passed everything, I didn’t do that well – and I had done well all my way through my [school] studies, so I don’t think it really prepares you to write big exams. Although that’s probably just because it was the first time I did it. By the second time, then it was fine” (S13I);
- “… it hasn’t helped prepared me for exams – exams are a lot different from PACE tests – they are much larger, longer and more difficult. You have much [greater] quantity of study material to learn for that, so one thing that ACE hasn’t prepared me for is that” (S7I);
- “The one thing that I think he battled with when he first went to varsity was writing exams. He didn’t know how to write an exam” (P10I);
- D58 stated that “exams were a bit of a challenge for me coming out of a system where we do not write exams … It took a bit of getting used to.”

However, P6I, said that she felt that adequate skills had been developed in this area. “…Again in the ACE system they do books, at the end of the book they take a test, they take a self-test and then a PACE test and they had to pass the self-test well enough to be able to take the PACE test. So they do 12 books per year per subject so that by the time they have completed their final year they have done many, many, many tests and these are not small tests – they can be three or four pages long. Each one is like a mini-exam so at the end of it, they are confident, and their ability has grown tremendously and they can cope with the tertiary education exams.”

Despite this perceived lack, both interviewed students felt that they had coped well with the examination situation and, “By the second time, then it was fine” (S13I) and, “basically we had two hours to complete the exam and I completed and revised them in under 40 minutes each. So I did all right” (S7I).
5.4.2.2 Speaking skills

As far as other areas were concerned, P10I revealed that the development of speaking skills (Section 3.3.10) was an issue: “The other thing that he said to me, in fact he said it to me just the other day, was the one thing that he found was that he hadn’t really, really learnt well was how to speak properly,” and again a little later, “… he was chatting about it just the other day and he said, oh no, he doesn’t think he speaks very well at all, and I said that I think you speak very well and communicate effectively but he didn’t think so.” One student (S9) in the “essential skills self-rating” gave herself a 1 on “oral communication skills”, and stated that her “oral communication skills” had not been sufficiently developed.

5.4.2.3 Other aspects

Other areas that were mentioned by a minority of the sample as lacking in their school experience, were working to time limits in examinations and projects, note-taking, integration of subjects, standards in Science and Mathematics, the focus on grammatical skills as opposed to comprehension skills in languages, and limited social interaction. The variation in these answers seems to point to individual differences rather than actual trends; the literature study, in fact, revealed (e.g. Section 2.2.2.4; Table 1, Section 3.3.5; Section 3.3.3) that most of these skills are incorporated in the ACE programme. It would appear, therefore, that the issues highlighted may be related more to implementation by the school, as opposed to a deficiency in the programme.

5.4.2.4 Size of schools

When questioned as to the reasons for the shortcomings highlighted above, P6I felt that they were caused more by the “unavailability of teachers” than the actual programme itself “because, in actual fact, both my children have done both physics and chemistry with the books and have passed it. There is a lack of teacher input from the point of view of the teacher standing at the board and teaching them – that’s not the ACE way – but...
that side of it does need to be looked at and improved.” P10I said that the smallness of schools tended to be problematic – “there are too many little ACE schools around that are trying to meet the needs of their little church; if we had less ACE schools with more kids in them, hopefully there wouldn’t be that much of a financial burden on the school and the church, and then the bigger school would be able to offer more” but “I still do believe that if you have really, really motivated, sold-out teachers, administrator, headmaster, headmistress, whatever, call it what you will, that are absolutely sold out, that are passionate for the school, it will happen.” The smallness of the schools was also highlighted as a challenge by P3 who recalled that the student “was the only student of his age in the school; he graduated alone [from the school] in 2002”. In Section 3.1.1 the issue of parental choice of schooling was discussed, with it being mentioned that some of the schools have fewer than 50 students (Lewin & Sayed 2005). Whether this is the nature of Christian schools is not indicated in Lewin and Sayed (ibid.), but it appears that this may be an aspect for consideration by those who wish to establish an independent Christian school using the ACE programme.

5.4.2.5 South African PACEs

The document study revealed very little in the way of dissatisfaction with the ACE programme; the main complaint being the issue of university entrance as opposed to issues with the ACE programme itself. However, one parent (D36) commented on the “very different approach to English in SA than what the PACES do”, and recommended the introduction of “cartoons … newspapers and Time magazine” to encourage more “objective thinking”. Another (P8) stated that the standard in the Physics, Chemistry, and Mathematics PACES needed to be improved.

While various weaknesses were identified, the respondents generally did not indicate that educational intervention had been necessary to overcome these gaps in their preparation. In answering the questions “What have you had to do, if anything, to make up your skills?” and “Is there anything that you have had to develop in yourself?” both interviewed students responded, “There’s nothing really” and that they had taken no
remedial courses at university, although they were available. For example, S13I mentioned “they do have essay writing – free essay writing courses at the varsity – so if you are struggling you can go and get help” but that “… my marks were pretty good and so I didn’t think I needed it.” S10 said that Mathematics and Science were two areas where she had to make up her skills and “work very hard to catch up”, while S13I (despite initially saying that he had not had to do anything to make up his skills) said, “Well, the only subject I would have benefited from doing more work or more experience in would probably be maths – it was difficult when I first started varsity – I just passed my first tests … I think it was really just the SA Math was very difficult, I got a lot of help from the teachers, and I don’t think I really understood what I was learning. And when you get into university you’ve got to learn.”

5.4.2.6 Concluding remarks

In summary, the comments from these various sources indicate that students and parents alike believe in the general efficacy of the programme to prepare students for tertiary studies. There are, however, some areas that require some remediation, particularly in Mathematics and Science.

5.4.3 Student Performance at University

Results from many students provide proof that they have succeeded very well in their studies, as shown in the results of thirty two students depicted in the bar graph overleaf.
Figure 2: Average Results for 32 ACE Graduates in Examinations at University (2002 - 2005)

It should be noted that the results of the other forty five students were not available, and because of the vast array of degrees by the various universities as well as coding on results, it is not possible to identify results trends within specific disciplines from the data available.

Others who did not submit specific results mentioned the following achievements:

- Degree awarded cum laude (D52)
- Distinctions for all subjects (D12, D36)
- Rector’s Golden Key Award (awarded to students in the top 15% of the cohort of students in a year at various universities) (S13, D12, D13, D15, D16, D27)
- Being placed in the top 5 students (D1)
- Acceptance into Masters programmes (D12, D13)

This confirms what the ACE website (ACE 2006) states: “Our students are doing exceptionally well and are high achievers across a range of faculties, for example: Medical, Arts, Science, Commerce, etc. ACE graduates have an advantage as they are able to set and achieve goals, are more disciplined and independent and, as a result, are more positive towards their workload.”
Further corroboration is found in U1 questionnaire where it was indicated that “ACE students are performing very well”. The general overall performance was rated by U1 as “good”.

Whether this can be extrapolated to the entire body of ACE graduates is a question that needs to be considered. As mentioned in Chapter 4, Section 4.13, as well as 4.3.5 (in discussing generalizability), the fact that all the data studied (questionnaires, interviews and documents) came from people who are positively disposed to the ACE programme, could be a limitation of this study. However, the fact that the documents do not reveal a great degree of negative criticism could also mean that there are no real problems experienced by the larger body of users of the programme.

5.5 UNIVERSITY DESTINATIONS

5.5.1 Statistics of School Leavers Entering Higher Education Institutions

According to UNESCO (2004), of an estimated 1,01 million South African public school leavers13 in an annual cohort, only 65 000 go on to higher education (i.e. 6%) [The report from which these statistics have been taken was released in September 2004 and relates to the year 2003. At the time of writing, similar statistics for 2004 and 2005 were not available.] An HSRC (2004) study found that the percentage was considerably higher (i.e. 14%).14 This is despite the fact that a much higher percentage potentially could go into tertiary education by virtue of earning matriculation exemption (Section 3.4). The table below shows the statistics for the years 2001 – 2005 for public school students who earned matriculation exemption and ACE graduates who earned “exemption equivalence” by virtue of writing the SAT.

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13 Note: these figures do not only include matriculants, but students at other levels.

14 The lack of agreement in these statistics limits true understanding of the phenomenon, but is possibly due to the selection of different samples.
Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

Chapter 5

Table 5: Percentage of school students earning exemption/exemption equivalent passes (2001 – 2005) (DoE Annual Reports 2001 – 2006; ACE Graduate Database 2006)

<table>
<thead>
<tr>
<th>Year</th>
<th>2001</th>
<th>2002</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public Schools</td>
<td>15%</td>
<td>17%</td>
<td>19%</td>
<td>18%</td>
<td>17%</td>
</tr>
<tr>
<td>ACE Schools</td>
<td>28%</td>
<td>34%</td>
<td>32%</td>
<td>26%</td>
<td>32%</td>
</tr>
</tbody>
</table>

Note: percentages have been rounded to the nearest whole number for ease of comparison.

It is interesting to note that the percentage of ACE students earning exemption equivalence has been consistently higher than the percentage of public school learners earning matriculation exemption passes. While the reasons for this have not been investigated as part of this study, this could be attributed to the issue of parental choice of private schooling (Section 3.1.2) which has been shown in the literature to offer a better education than public schools which are fraught with many problems, social, economic and political (Baloyi 2005: 23 – 24). A comparative study with the results from other independent schools would be insightful and could be the basis of further research.

A similar phenomenon appears in the table below – compared with students from public schools, a higher percentage of ACE school leavers who qualify for university entrance, actually proceed to higher education. Again, the reasons for this phenomenon have not been investigated in this study. One could possibly link this to the higher percentage of students earning matriculation exemption equivalence as shown in Table 5.

Table 6: Percentage of school students proceeding to higher education (2003)\(^\text{15}\) (DoE Annual Reports 2001 - 2006; HSRC 2004; ACE Graduate Database 2006)

<table>
<thead>
<tr>
<th>The percentage of Graduates earning exemption or equivalence (as at end 2003)</th>
<th>Students proceeding to HE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public schools</td>
<td>ACE</td>
</tr>
<tr>
<td>19%</td>
<td>32%</td>
</tr>
<tr>
<td>Public schools</td>
<td>ACE</td>
</tr>
<tr>
<td>14% (HSRC, 2004)</td>
<td>24%</td>
</tr>
</tbody>
</table>

Note: percentages have been rounded to the nearest whole number for ease of reference.

\(^{15}\) Later statistics for the public sector have proven difficult to find.
5.5.2 ACE Graduates (2004 – 2005)

The trend for ACE graduates’ entrance to higher education institutions shows a fair amount of stability in students achieving the required results since 2003, but an overall 3.2% increase in the percentage of those students proceeding to higher education, as shown in the table below. The issues surrounding university entrance for ACE graduates are discussed in detail below (Section 5.5.3).

Table 7: Percentage of ACE graduates proceeding to higher education (2004 - 2005)
(ACE Graduate Database 2006)

<table>
<thead>
<tr>
<th>Year</th>
<th>Total No. of Graduates</th>
<th>With exemption equivalence</th>
<th>%</th>
<th>No. studying at Tertiary Institutions</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>228</td>
<td>72</td>
<td>32</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2004</td>
<td>184</td>
<td>47</td>
<td>26</td>
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<td></td>
</tr>
<tr>
<td>2001 – 2003</td>
<td>485</td>
<td>154</td>
<td>32</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grand Total</td>
<td>897</td>
<td>273</td>
<td>30</td>
<td>242</td>
<td>27</td>
</tr>
</tbody>
</table>

Note: percentages have been rounded to the nearest whole number for ease of reference.

5.5.3 University Destinations of ACE Graduates

In Chapter 1, section 1.5.4, tertiary education was defined as “higher education, leading to a degree”. In Chapter 3, Section 3.4, the issue surrounding university admission and the basis on which ACE graduates are permitted into degree studies was discussed. The following pie-graph reflects the university destinations of seventy six students.16 From the figure it can be seen that a fair number of tertiary institutions have accepted ACE graduates (See also Appendix 1), with the University of the Free State having accepted the highest number. It has not been determined whether this reflects a more open policy on admissions or whether this is a preferred university destination for ACE graduates. It is also clear from the figure that universities attract higher numbers of ACE graduates, as

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16 One student submitting a letter, did not indicate which institution he/she was at.
opposed to other tertiary institutions such as Technikons. Again the reasons for this have not been examined in this study.

5.5.4 The Challenges of Admission to University

Questionnaires, interviews and documents all revealed that access to university had been a challenge for several students. In fact, it is evident from the very strong, emotive, wording used, that this is a major problem for participants in the ACE system. One parent said the following:

“You don’t want to know. It was a nightmare, an absolute nightmare. … You know what, the university knew nothing about the ACE system. What they knew was little and so it was dangerous; and they basically just said, ‘We’re not taking any more ACE students because their performance has been unacceptable.’” Now that came from the admissions officer in one of the faculties, because that’s all she’d heard and that’s all she knew. She didn’t know anything about the ACE system, she didn’t know anything about the ACE schools, she’d had one, in fact, there was one particular student who had really, really battled and that was the one that kind of stood out for her and .. she said ‘Well, we
might get back to you’ and that was like in the September of the one year before he was due to go to varsity in the January or February of the following year and he didn’t get any kind of results from them at all until the end of January you know, and I mean it was backwards and forwards – I ended up getting hold of the guy – I can’t remember his name now – in Pietermaritzburg who was very, very into the ACE system and he was kind of the guy who was pushing and pushing and in the end I mean finally, it wasn’t a problem and when they said yes, he was in in a day and I mean that was fine. They just, I don’t know – they don’t know enough about it and even trying to go from the school to the ACE head office to the varsity was just – I don’t know – maybe it was just communication or whatever but it was a nightmare” (P10I).

P6I indicated that …. “with UNISA – [name of student] had to do the bridging course and they just accepted his certificate and everything, whereas with [name of student], he was signing up to join DIT and they said no, his certificate won’t do any good – and we were in touch with head office – they said they had spoken to DIT, they should accept it. [Name of student] actually went back himself to the Central Applications Office and a senior lady from there took him back to the DIT and pushed him through. And when he came to getting his Diploma, [in May 2006] there was a query about his certificate even now, and he just handed it to the man and the man knew how well [son’s name] worked and how well he’s done, and he just pushed it through.”

Documents variously reported that university entrance was “a fiasco” (D17), “preposterous” (D14) and required a “pioneering spirit” (D13) with the senate’s discretionary route having “teething problems” (ibid.). Another student (D22) applied to University of Johannesburg to do B. Comm. but was not accepted with the ACE certificate, and switched to the bridging course at UNISA. Yet another stated that the student was rejected “by the University because she did not have ‘matric exemption’” (D43) and D14 stated that “there was a lot of opposition from some people in the university” before he was admitted. D44 recalled this as a “very unhappy experience”. D41 was “accepted at [name of university] but after two weeks was kicked out because of her ACE matric”. D53 described her excitement at being provisionally accepted only to
be told when the time for enrolment came that she “should never have been accepted for the degree [she] had selected … as that faculty did not accept the ACE matric and did not recognise the SAT exams … This was devastating news to me.” She concluded her lengthy email by stating that the last few days of her schooling were “stressful and tumultuous”.

Several students reported being sent from pillar to post when they tried to register:

- “They just, I don’t know – they don’t know enough about it and even trying to go from the school to the ACE head office to the varsity was just – I don’t know – maybe it was just communication or what ever but it was a nightmare” (P10I);
- D36 reported that university officials were divided about acceptance, one saying “that they had decided not to admit …” but that the student counsellor at the same university “was not happy that … was not admitted for the reasons [the other official] gave, as she said she was sure School of Tomorrow students were being admitted.” The Vice Registrar told … that “he was not happy with the way this application had been handled” and said “he could not understand why her application had been turned down”;
- One student was told that “ACE students are not accepted” but was then also advised to write the University’s entrance exam – “I can’t really see the sense of writing the entrance exam if ACE students are directly told by the university that they are not accepted” (D16).

Two students commented in the questionnaires that they would do away with the “access course” (S3) and the SAT, “I really can’t see the point of writing the test to get entrance in South African universities when it is an American test and most of us are Afrikaans speaking” (S4).

Since these comments have been extracted from evidence that covers the years 2002 – 2005, it would appear that there are still some difficulties with the university access process, but that this could be put down to lack of communication between university
officers and a lack of knowledge about the ACE graduation certificate. Nevertheless, the fact that more than 200 students have been accepted into universities and other tertiary institutions across South Africa, appears to indicate that acceptance and understanding are growing.

5.6 CONCLUSION

The data analysis revealed generally positive perceptions of the ACE programme by students, parents and university admissions officers who had experience of the ACE programme in one way or another. People who had not had such experience had negative perceptions, which were attributed to ignorance as opposed to negative experiences.

Perceptions of the ACE programme as preparation for tertiary education were overwhelmingly positive, although the alternative admissions process was described as problematic in several cases.

The implications of these findings are discussed in the next chapter.
CHAPTER 6: FINDINGS, CONCLUSIONS AND RECOMMENDATIONS

6.1 THE ALTERNATIVE NATURE OF THE ACE PROGRAMME

This thesis was approached from the perspective of a “emic”, insider perspective” having an interest in the ACE programme. My initial interest in the research was piqued during my term of office as the Graduations Officer of ACE (SA) responsible for processing the Grade 12 College Entrance certificates, and as a member of the ACE Educators’ Board where the issue surrounding university entrance was a permanent item on the meeting agenda for a number of years. As discussed in Chapter 1, Section 1.2, the ACE programme, because of its alternative nature, was seen, particularly by outside observers, as an enigma. Because the programme did not match the traditional paradigms, there were questions about the programme’s efficacy to prepare students adequately in both the academic sense as well as the societal sense.

6.2 THE SOUTH AFRICAN SETTING

The study was conducted in South Africa, although the ACE programme is conducted in many parts of the world. It was not a comparative study, however, although this would form an interesting topic for research. The group selected for study was thus the South African ACE graduates and, more specifically, those students who had entered undergraduate studies. In fact, students who had not entered university were not considered in this study. The purpose was to determine the perceptions of those graduates, their parents and university admissions officers about the ability of the ACE programme to prepare students for tertiary education, “leading to a degree” (Section 1.5.3).
6.3 THE BEHAVIOURIST/CONSTRUCTIVIST DEBATE

The first question asked in the background to the study (Chapter 1) was “how does the ACE system, curriculum and methodology differ from OBE?” The various philosophical and pedagogical issues were examined in detail in Chapter 2. Chapter 3 then examined issues surrounding university entrance in general, performance of undergraduate students at university and more specifically, the acceptance of ACE graduates into the various tertiary institutions in South Africa.

In chapter 2, section 2.1 the issues surrounding behaviourist and constructivist theories of education were outlined. Criticisms were levelled at both approaches by various writers. Behaviourist approaches, incorporating programmed instruction, were said to be “an approach that excluded other kinds of learning methods”, with a perceived “lack of group learning activities, and the inability of such methods to provide learners with the necessary “social and verbal skills” (Section 2.1.1.3). We also saw that Christian education (specifically the ACE programme) tended towards the behaviourist philosophy, based on the premise that true knowledge comes from God and is not “constructed” by an individual trying to make sense of his or her own world. ACE, in particular, revealed a programmed learning methodology with clearly defined pathways to learning and achievement. A further important related aspect of the ACE programme was revealed in the curriculum comparisons (Section 2.4) where it was shown that the ACE curriculum generally (although not exclusively) uses a content-based, syllabus approach, defining the knowledge that a child should have by the time he/she leaves school to enter tertiary education.

In discussing the outcomes-based approach, an outflow of constructivist theories, several authors criticised this approach as being “unproven” (Section 2.3.1). Nevertheless, aspects of OBE approaches were also evident in the ACE programme (Section 2.4), in that:
• It defines the values and attitudes that a student should have, and inculcates these as an integral part of the ACE curriculum materials. Christian values are summed up in the Proverbs 1: 2- 4 (NIV) – “wisdom and discipline … understanding words of insight … acquiring a disciplined and prudent life, doing what is right and just and fair … prudence … knowledge and discretion” (Section 2.3.2). It is clear from the empirical evidence that the students have developed such values (Section 5.2.2.);

• It can be seen to incorporate some aspects of OBE – time allocations, assessment practices, learner-centredness, and subject choices (See Table 1).

It is also clear from the lack of comment about the methodology used in the programme that parents are not concerned about the methodology used as long as it leads to the desired results. This is more a matter of concern to departments of education which have charge over the quality assurance of schools, including independent schools (Section 3.1). A review of the theoretical literature, presented in Chapter 2, revealed that there was a gap in the theoretical knowledge of the ACE programme. Some studies had examined various aspects of the programme but practical, empirical and longitudinal studies were sparse. This led to the formulation of the research question “How do ACE graduates, their parents and university admissions officers currently view the ACE programme in terms of its ability to produce students who are capable of successfully completing undergraduate studies?” The question required an answer by the participants and other stakeholders themselves, rather than being provided by outside observers. The focus of the research then led to an investigation of the perceptions of the programme by these participants, with questions being asked about the management and implementation of the programme in the specific schools that the ACE graduates had attended. A related issue was the strengths and weaknesses of the programme in terms of its ability to prepare them for tertiary studies leading to “a degree”.

6.4 THE RESEARCH PARADIGM AND PROGRAMME

Because the investigation involved an examination of “people in terms of their own definition of the world” (Mouton, 2001: 194), the qualitative research paradigm was
selected, giving rise to a selection of applicable research procedures and instruments. Justification was provided for using questionnaires instead of focus groups (Section 1.4); in addition, interviews and archival studies provided for a triangulated approach to the research.

The eventual sample of seventy seven students consisted of students who agreed to answer a questionnaire, and their parents, as well as students, parents, principals and university officials who had submitted letters, emails and testimonials to the ACE National Office about these students. All the respondents to the questionnaire and those selected for the interviews agreed to participate voluntarily and were apprised of their right to withdraw at any stage should they so choose.

The research design, described in Chapter 4, provided an adequate base from which to carry out the empirical study, the findings of which were discussed in Chapter 5. These findings clearly indicated that there was merit in exploring perceptions of the programme.

6.5 FINDINGS, CONCLUSIONS AND RECOMMENDATIONS ARISING OUT OF THE DATA ANALYSIS

6.5.1 Perceptions of Graduates from the ACE system, their Parents and University Admissions Officers

Three key questions asked in Chapter 1 related to the perceptions of ACE graduates, their parents and university admissions officers. The findings revealed that graduates and their parents perceived that the students had been adequately prepared for tertiary education, with minor gaps, which they had managed to overcome without any additional or remedial assistance. The programmed learning methodology does not appear to have been a limiting factor in the student’s learning experience, as reported by various authors (Section 1.5.2). The respondents who answered the questionnaire, self-reported above-average levels for skills needed to succeed in tertiary studies (Section 5.3.1), and highlighted goal-setting and independent learning as two of the major strengths of the
programme. While some weaknesses were also reported, such as the lack of examinations covering large amounts of work, this does not appear to have hindered the students from achieving success at university across a broad range of degree programmes (Section 5.3.2). The fact that students were able to adapt quite readily to the new situation points to other, perhaps less easily-defined character traits, such as perseverance, diligence or effective study habits which were reported by several students (Section 5.3), that would have enabled them to overcome these deficiencies. It is recommended that schools that use the ACE programme, maintain vigilance in their practices and that attention is given to the findings of this study such that ACE students continue to be well-prepared for tertiary studies. Nevertheless, the aspects that have been identified as limiting factors, should be considered by school principals and staff as points for improvement of the secondary school experience of ACE students.

The experience of the university admissions officer who responded to the questionnaire was also positive.

6.5.2 Weaknesses and Strengths

6.5.2.1 The perceived weaknesses of the ACE system

One of the aims of the study was to determine the perceived strengths and weaknesses of the ACE programme. The study revealed that there was some dissatisfaction with:

- The standard of the locally developed PACEs (Section 2.1.1.3);
- The level of career guidance provided to the students (Section 5.3.5.2).

The first aspect is an area for attention by the ACE curriculum developers, while the second aspect could be an area for training of school staff, particularly those who are involved with drawing up the students’ academic projections at the end of Grade 9 (Section 3.3.2). This is an issue for the consideration of school administrators who are responsible for appointing appropriately qualified staff (Section 2.2.3.2). While it is
realised that ACE schools are independent schools (Section 3.1.1) and are not controlled and administered by ACE Ministries (Africa and Scandinavia) as such, it appears that the proliferation of small schools also causes some challenges with regard to subject choices at the FET level, particularly because the smallness of the school restricts the staffing supply (Section 5.3.2) and therefore access to a wider range of offerings to the students is limited.

Although not directly related to a weakness in the programme, the issue of entrance to university is a related matter. The perceptions of others (Section 1.1 and 3.5) can be said to have some influence in this regard. The examination of university entrance problems indicates that, although there is acceptance of the certificate at many universities, some faculties remain closed and that this is a matter of concern to students, parents and principals alike (Section 5.3). There is a perception that universities tend to discriminate against ACE graduates in terms of their acceptance (Section 5.3.3) and that university staff need to be better informed about the ACE Grade 12 College Entrance certificate.

6.5.2.2 The perceived strengths of the ACE system

The study also revealed that the Christian ethos was the most important aspect influencing the school choice of parents (Section 3.1 and 5.3.3.1). It appears that those students who have come through the programme have developed the attitudes and values that have been characterized as Christian (Section 2.2.1; Section 5.3.3.3), as well as those that are deemed essential to good citizenship by the Department of Education (Section 2.1.2.1), and in this way affirmed the parents’ choice. The development of Christian character has also stood the students in good stead for their tertiary studies and provided them with the attitudes and skills needed for success at this level (Section 3.3; and 5.3.3.3). In addition, the core competencies for success at university appear to have been inculcated in the students who self-reported above average competence in the majority of these competencies (Table 4). This speaks to the strength of the programme and its ability to deliver learners who are capable of succeeding in higher education.
6.5.3 Management and Implementation of the Programme

In answering the question, “how can the management and implementation of the programme be improved to address perceived weaknesses and enhance the experience of participants in the programme” the following recommendations are made:

- The emphasis on the Student Convention by both students and parents as a highlight of the school career was remarkable (Section 5.3.3.1). The reasons for this were not investigated in the present study, and in this, the study could have been expanded. It would appear, however, that this would address some of the needs for “more social interaction”, which was mentioned as an aspect that could be improved (Section 5.2.3.1). Possibly the size of schools is an influencing factor in this regard and could be an aspect for attention by the users of the ACE curriculum, more particularly the owners and managers of the schools (Section 5.4.2).
- Greater attention should be given to effective career guidance (Section 5.3.5.2) not only as far as choices in tertiary studies are concerned but also in the processes involved in gaining university admission (Sections 3.3.2 and 5.4.4).

6.6. CONCLUSION

The study has been successful in determining the perceptions of the ACE programme. The main conclusion that can be reached from the study is that perceptions of the ACE programme as preparation for tertiary education are positive from the perspective of all participants (students, parents and university admissions officers). There are nevertheless areas where there could be improvement, such as career guidance and an easing of the university admissions process for ACE graduates together with a wider acceptance of ACE graduates into some faculties that are currently closed to them at certain universities.
6.7 LIMITATIONS OF THE STUDY

The present study was limited to a study of perceptions of the Accelerated Christian Education programme by those who had some experience or knowledge of it. Although this was not the intention of the research, it appears that only graduates, parents and university admissions officers who generally had had a positive experience responded to the questionnaire and so it is not possible, in this study, to identify what the perceptions of non-participants are. If the reason was due to negative perceptions or experiences, then this might change the picture gained from the current study, which can reasonably be said to have determined that there is an overall level of satisfaction with the ACE programme and the preparation it provides to students entering university.

In addition, it would have been useful to carry out a comparative study of ACE graduates and their counterparts from public schools to provide a broader perspective. This could be a topic for further research.

6.8 SIGNIFICANCE OF THE STUDY

The study has clarified many issues surrounding the negative perceptions of the ACE system as highlighted in Chapter 1, section 1.1, and has, in my opinion, negated many of these perceptions. For me personally, this has confirmed my choice of Accelerated Christian Education for my own children. Secondly, other parents and their children can be assured that the ACE system provides adequate preparation for tertiary studies.

As far as Accelerated Christian Education Ministries itself is concerned, it is recommended that the organisation continues to pursue greater acceptance and recognition of the programme, particularly with tertiary institutions, so that the disciplines for which ACE graduates can be accepted, is widened.

School managers should take note of the areas highlighted for improvement and can use these findings as indicators for development in their own schools, while at the same time,
they can be assured that, with proper implementation of the system, they are providing quality education to their learners.

Finally, the study has made a contribution to the field of educational management in that it has highlighted fundamental issues surrounding educational philosophies, pedagogy and methodology, and has shown that alternative systems to that prescribed by the state (like the ACE system) can, and do, provide for sound education of learners and can prepare them to become the kind of learners envisaged in the National Curriculum Statements (DoE 2005).
References


Accessed: 1 February 2006


Accessed: 8 May 2006


References


References


Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

References


References

Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

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Lolwana, P. 2005. ‘Where to with Matric?’ “What is matric: What is to be done?” Conference proceedings, Pretoria. pp. 64-73


References


Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

References

Passow, A. H. 1982 *John Dewey's influence on education around the world*. Teachers College Record, v83 n3 p401-18


Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

References


Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

References


Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education

References


APPENDIX 1: Tertiary Institutions in South Africa that accept ACE Graduates

- Damelin
- Durban Institute of Technology
- Global School of Theology
- Helderberg College
- Midrand Graduate Institute
- PE Technikon
- Pretoria Technikon
- South African Theological Seminary
- Technisa
- University of Cape Town
- University of Johannesburg
- University of Kwa-Zulu Natal
- University of Port Elizabeth
- University of South Africa
- University of Stellenbosch
- University of the Free State
- University of the North-West
- University of the Transkei
- University of Tshwane
- University of Witwatersrand. Faculty of Education only.
- University of Zululand
- Vaal Triangle Technikon & Satellite Campuses
46. Did your school have a net increase in student numbers or a net decrease? Please state reasons for:

<table>
<thead>
<tr>
<th>Increase in Student Numbers</th>
<th>OR</th>
<th>Decrease in Student Numbers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Increased Promotion</td>
<td></td>
<td>Financial</td>
</tr>
<tr>
<td>Educational Programme</td>
<td></td>
<td>Internal Challenges. e.g. Staff, management.</td>
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<tr>
<td>Biblical Emphasis</td>
<td></td>
<td>Competition. other schools in area.</td>
</tr>
<tr>
<td>Good reputation</td>
<td></td>
<td>Lack of conviction by parents</td>
</tr>
<tr>
<td>Other – please specify below</td>
<td></td>
<td>Other – please specify below</td>
</tr>
</tbody>
</table>

APPENDIX 2: Extract from ACE Statistical Return

ACE Ministries.

2006 School Statistics.
APPENDIX 3

MATRICULATION BOARD.
Unisa Sunnyside North Campus • Building 3 • cor Rissik & Mears Streets Sunnyside PRETORIA.
PO Box 3854 PRETORIA 0001 South Africa • Tel: +27 12 481 2927 • Fax: +27 12 481 2922.
E mail: cobus@sauvca.org.za.

M10.9 .
M11.6 .

Thursday 21 October 2004.

TO: REGISTRARS

CIRCULAR 82/2004

RECOGNITION OF ACE SCHOOL OF TOMORROW QUALIFICATIONS FOR ADMISSION TO
DEGREE STUDIES.

Previous circulars on the recognition of ACE School of Tomorrow qualifications were as follows:

- Circular U4/95 dated 31 May 1995 to the effect that the examinations were not recognized at that
  stage;
- Circular U22/99 dated 23 December 1993 informing universities that the senior certificate examination
  conducted by ACE School of Tomorrow under the external moderation of the SA Certification
  Council, SAFCERT, is acceptable for matriculation endorsement in terms of the provisions of the
  Universities Act read in conjunction with the SA Certification Council Act;
  Matriculation Board’s decision about continued acceptance of the SAFCERT moderated senior
  certificate but conditional acceptance on the Senate’s Discretionary basis of specific ACE School of
  Tomorrow qualifications; and
- Circular U2/2002 dated 25 April 2002 informing institutions about the procedures for handling ACE
  School of Tomorrow qualifications offered for admission to first university degree studies.

This circular reaffirms the relevant information of circular U2/2002 except that ACE School of Tomorrow
ceased to conduct senior certificate examinations as from 2002, that such certificates are adequately taken
of since they have been certified by SAFCERT, now Umalusi, and that the combined SAT I and SAT
II scores were recently lowered from 1100 to 1050.
1. **ACE School of Tomorrow College Entrance Certificate**

The ACE School of Tomorrow’s own self-paced examination certified as the ACE School of Tomorrow *College Entrance Certificate*, previously called *Grade 12 Graduation Certificate*, does not have the same recognition as an endorsed or unendorsed senior certificate for purposes of admission to first degree studies at a public South African university\(^\text{17}\). An exemplar of a certificate issued to such candidates is attached as separate jpg attachment.

The only external assessment involved in this school examination is the attainment of a specific score for either the SAT I or the SAT II programme, and evidence to the effect that the applicant had met such requirements, should as matter of procedure be submitted with the school certificate for university entrance via a senate approved selection process, i.e. in terms of paragraph 31 of the exemption regulations. vide http://www.sauvca.org.za/mb/rules/par31.htm.

**Admission procedures**

Institutions therefore require evidence from an applicant that s/he had met both the appropriate SAT scores and the requirements of the *Grade 12 College Entrance Certificate* for admission into Senate approved and Matriculation Board recorded selection process.

Universities submitting applications for the issue of certificates of conditional exemption in terms of paragraph 31 must therefore submit the following to the Board:

- a) The prescribed exemption fee. currently R220,00 per application;
- b) Application form M30 duly completed;
- c) The actual student score report of the College Board SAT I programme indicating a total score of 1050 or more and a subminimum of 500 for the Verbal and the Mathematics score or the actual student score report of the SAT II programme indicating a total score of 1050 or more and a subminimum of 500 for the English and the Physics/Chemistry score;
- d) The ACE School of Tomorrow *Grade 12 College Entrance Certificate*;
- e) Proof that the requirements for admission in terms of the relevant Senate approved and Matriculation Board recorded programme/test had been met.

2. **National Christian School Certificate**

The ACE School of Tomorrow, both locally and abroad, also conducts the ACE School of Tomorrow *National Christian School Certificate*, NCSC, examination and the only external moderation instrument employed for this purpose is the SAT I or the SAT II programmes. A copy of the certificate is separate jpg attachment.

It is reported that the *National Christian School Certificate* issued by Maranatha Foundation in the UK was renamed as the *ICCE*, but a copy of it shall be forwarded to institutions once it is received.

**Admission procedures**

Institutions therefore require evidence from an applicant that s/he had met both the required SAT scores and the requirements of the *National Christian School Certificate* before allowing them into the Senate approved and Matriculation Board recorded selection process.

Universities submitting applications for the issue of certificates of conditional exemption in terms of paragraph 31 must therefore submit the following to the Board:

\(^{17}\) This is only applicable to admission to first degree programmes at public universities and not to technikons or technikons operating as universities of technology where different admission requirements may apply.

Jacqui Baumgartd, 2006  Page 193
a) The prescribed exemption fee, currently R220.00 per application;
b) application form M30 duly completed;
c) the actual student score report of the College Board SAT I programme indicating a total score of 1050 or more and a subminimum of 500 for the Verbal and the Mathematics score or the actual student score report of the SAT II programme indicating a total score of 1050 or more and a subminimum of 500 for the English and the Physics/Chemistry score;
d) The ACE School of Tomorrow National Christian School Certificate; and
e) Proof that the requirements for admission in terms of the relevant Senate approved and Matriculation Board recorded programme/test had been met.

General Enquiries on Examination and Admission related issues concerning the ACE School of Tomorrow examinations

- Examination related issues.

  Examination related queries should be directed to Mr Daniel Govender at 031 569 1744.

- Institutional policy issues.

  Institution-related policy issues should be directed to the institution’s admission office.

COBUS LÖTTER.
DIRECTOR: MATRICULATION BOARD
APPENDIX 4: Diagrammatic Representation of the ACE Curriculum Model.

Mastery Learning

Individualized, self-paced study

Continuous assessment.
- self evaluation.
- educator evaluation

Success

Review and revise entire foregoing section in order to deal with conceptual challenges

Failure

Proceed to next section or module of work after review of any conceptual difficulties

Structure of a PACE
- Objectives
- 3 sections
- Continuous self evaluation (formative assessment)
- Checkup - Self test after each section of the unit (formative assessment)
- Cumulative Self-test at end of unit (formative assessment)
- PACE Test - Educator assessed test (summative assessment) at end of unit to consolidate knowledge before proceeding

Key: PACE = Packet of Accelerated Christian Education. a unit of curriculum.

Further Education and Training Phase Grade 12

<table>
<thead>
<tr>
<th></th>
<th>Term 1</th>
<th>Term 2</th>
<th>Term 3</th>
<th>Term 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>English</td>
<td>133*</td>
<td>134</td>
<td>135</td>
<td>136</td>
</tr>
<tr>
<td>Biblical Studies</td>
<td>133</td>
<td>134</td>
<td>135</td>
<td>136</td>
</tr>
<tr>
<td>Business Economics</td>
<td>133</td>
<td>134</td>
<td>135</td>
<td>136</td>
</tr>
<tr>
<td>Mathematics</td>
<td>133</td>
<td>134</td>
<td>135</td>
<td>136</td>
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<tr>
<td>Etc.</td>
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</tbody>
</table>

* The 133<sup>rd</sup> Pace in the sequence of 144 PACEs that make up the curriculum for a subject. Students may get to this level earlier or later than stipulated in the PACE Sequence, so this is merely a guide to where the average learner would be in Term 1 of the Grade 12 year.
APPENDIX 6: Academic Projection.

Details deleted to preserve confidentiality
**APPENDIX 7: Extract From Learning Programme for Grade 8 Natural Sciences**

**LEARNING OUTCOME 3: SCIENCE, SOCIETY AND THE ENVIRONMENT:** The learner will be able to demonstrate an understanding of the interrelationships between science and technology, society and the environment.

<table>
<thead>
<tr>
<th>National Curriculum Statement: Assessment Standards</th>
<th>AS1</th>
<th>Other learning areas</th>
</tr>
</thead>
<tbody>
<tr>
<td>We know this when the learner:</td>
<td>Understands science as a human endeavour: Recognises differences in explanations offered by the Natural Sciences Learning Area and other systems of explanation. Achievement is evident when the learner, for example, identifies sources and nature of authority in two differing explanations for an event, coming from two differing world-views; compares ways that knowledge is held in an oral tradition and in a written, public tradition; traces the way a theory about nature has changed over the centuries.</td>
<td>Human and Social Sciences: Earth Science 93 – Creation: wonders of creation, cycles of creation, resources of creation Earth Science 1096 - proofs of Creation; proofs of the Flood</td>
</tr>
</tbody>
</table>

**EXTRACT FROM LEARNING PROGRAMME FOR GRADE 8: ECONOMIC AND MANAGEMENT SCIENCES**

**MANAGERIAL, CONSUMER AND FINANCIAL KNOWLEDGE AND SKILLS:** Learning Outcome 3: The learner will be able to demonstrate knowledge and the ability to apply responsibly a range of managerial, consumer and financial skills.

<table>
<thead>
<tr>
<th>National Curriculum Statement: Assessment Standards</th>
<th>AS6</th>
<th>Other Learning Areas</th>
</tr>
</thead>
<tbody>
<tr>
<td>We know this when the learner:</td>
<td>Investigates the various methods of savings and investments. e.g. savings accounts, fixed deposits, shares, unit trusts., and calculates returns on a variety of investments.</td>
<td>PACE No</td>
</tr>
<tr>
<td>PACE No</td>
<td>EMS SA 85 – investigates various methods of savings and investments. e.g. savings accounts, fixed deposits, shares, unit trusts.</td>
<td>Other Learning Areas</td>
</tr>
<tr>
<td></td>
<td>MLMMS: SA88 – calculate interest on investments</td>
<td></td>
</tr>
</tbody>
</table>

**EXTRACT FROM LEARNING PROGRAMME FOR GRADE 9: ART AND CULTURE**

**LEARNING OUTCOME 1: TECHNOLOGICAL PROCESSES AND SKILLS:** The learner will be able to apply technological processes and skills ethically and responsibly using appropriate information and communication technology.

<table>
<thead>
<tr>
<th>National Curriculum Statement: Assessment Standards</th>
<th>AS1</th>
<th>Other learning areas</th>
</tr>
</thead>
<tbody>
<tr>
<td>We know this when the learner:</td>
<td>Identifies and explains a problem, need or opportunity from a given real-life context, and investigates the context, the nature of the need, the environmental situation, and the people concerned.</td>
<td>Senior Student Convention Items</td>
</tr>
<tr>
<td></td>
<td>Senior Student Convention Items</td>
<td>Science: Science engineering – electronic equipment, optical devices, solar energy converter, using scientific principles to perform a task; exhibit includes plans, diagrams, schematics, parts list, etc so that another person could take your plans and duplicate your project. no commercial kits.</td>
</tr>
<tr>
<td></td>
<td>Senior Student Convention Items</td>
<td>Arts and Culture: Project: Making a Musical Instrument</td>
</tr>
</tbody>
</table>
APPENDIX 8

Tertiary Study Liaison 2006
A.C.E. Ministries (SA)

This form needs to be completed for all graduates wanting to pursue any tertiary studies with any South African tertiary institution (university, college or technikon) where entrance to studies requires a Senior Certificate (with or without exemption). The purpose of this form is for A.C.E. Ministries to liaise on behalf of a prospective graduate for study along the Senate’s Discretionary Routes of these institutions. (On completion kindly e-mail to academics@aceministries.co.za for attention the Tertiary Liaison Department). Alternatively post the form to the Tertiary Liaison Department, A.C.E. Ministries, P.O. Box 22072, Glenashley, 4022.

NOTE: FAXED COPIES WILL NOT BE ACCEPTED.

NB! the administration office of a school using the ACE programme is to submit this form to the national office at least 3 months prior to the earliest cut-off date for admission/selection at the institution selected for study. Host schools and home education academies are to complete these forms on behalf of prospective graduates hosted by them.

Student Details:

Surname: 

Name(s): 

Gender: Male Female

Tel: Fax:

Cell: 

E-mail: 

Name of School: 

Name of Host or Home Education Academy: 

Postal Address: 

Alternative Address: 

Tel: Fax:

Cell: 

E-mail: 

1 January 2006
**Tertiary Information:**

Please submit the following details for the prospective institution(s) of study:

<table>
<thead>
<tr>
<th></th>
<th>Name of Institution</th>
<th>Course of Study</th>
<th>Faculty</th>
<th>Tel</th>
<th>Fax</th>
<th>Admissions Officer</th>
<th>Dean</th>
<th>Cut-off Dates for Admission</th>
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<td>1st choice</td>
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</table>

**Subject Scores:**

Please note that we cannot provide this assistance unless all Grade 11 PACE scores are available. Please enter the Candidate’s Grade 11 scores on the table below:

<table>
<thead>
<tr>
<th>Major Subjects</th>
<th>HG/SG</th>
<th>Percentage per PACE</th>
<th>Average % for 12 PACEs</th>
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</table>

Average % for 6/7 major subjects ➔

**Grade Point Average (GPA):**

<table>
<thead>
<tr>
<th>Percentage Grade</th>
<th>Symbol</th>
<th>Percentage Grade</th>
<th>Symbol</th>
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</thead>
<tbody>
<tr>
<td>98-100%</td>
<td>A+</td>
<td>88-89%</td>
<td>B-</td>
</tr>
<tr>
<td>95-97%</td>
<td>A</td>
<td>85-87%</td>
<td>C+</td>
</tr>
<tr>
<td>94-95%</td>
<td>A-</td>
<td>83-84%</td>
<td>C</td>
</tr>
<tr>
<td>92-93%</td>
<td>B+</td>
<td>80-82%</td>
<td>C-</td>
</tr>
<tr>
<td>90-91%</td>
<td>B</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

January 2006
Perceptions of the Accelerated Christian Education Programme as Preparation for Tertiary Education. Appendices

#TSL 2006

*Are you in possession of an approved School of Tomorrow Academic Projection?  Yes ☐  No ☐

*Projected date of fulfillment of all requirements for graduation as stipulated on the Academic Projection:      Day / Month / Year

**Which certificate are you going to apply for?**

Please tick the appropriate block below:


**SAT 1/2 Testing**

Prospective graduates with Mathematics as a major subject need to take the SAT 1 which is a Reasoning Test incorporating English and Mathematics. If the student has not taken Mathematics as a major subject, (or does not intend to study in a direction where Mathematics is a requirement) he/she needs to take the SAT 2 (which is a subject test). Please note that Students who do the SAT 2 and would like to go to university must take the English and either Physics or Chemistry. For more information on the requirements for these tests or to register for the SAT online, visit the SAT Prep Center (www.collegeboard.com)

*Projected date for sitting the ☐ SAT 1 or ☐ SAT 2      Day / Month / Year

*(Please attach a copy of SAT 1 or 2 results if available)*

*If this is not your first attempt at the SAT, kindly indicate the number of attempts:

☐ 2 ☐ 3 ☐ more

Please fill in the SAT results below (if they are available):

<table>
<thead>
<tr>
<th>SAT 1</th>
<th>MATH:</th>
<th>VERBAL:</th>
<th>TOTAL:</th>
</tr>
</thead>
<tbody>
<tr>
<td>SAT 2</td>
<td></td>
<td></td>
<td>TOTAL:</td>
</tr>
</tbody>
</table>

**CRUCIAL ISSUES!!!**

1. All incomplete forms will be returned to you for completion before a link is created.

2. Parents of graduates must work through the school their child is at. Home educators must work through their host schools or home education academies.

3. The total minimum SAT score required for a School of Tomorrow Grade 12 College Entrance Certificate with endorsement is 1050 points with a sub minimum of 500 points in each subject. The total minimum SAT score required for a School of Tomorrow Grade 12 College Entrance Certificate without endorsement is 850 points with a sub minimum of 400 points in each subject for Home Schools and Full Schools without Silver Status.

* Please note that most universities still require 1100 points.

3 January 2006

Jacqui Baumgardt, 2006  Page 201
4. The Senate’s Discretionary Route by and large incorporates various types of entrance tests or courses of access depending on the institution. Language proficiency, Mathematics, Physical Sciences and Accounting usually forms the basis together with some personality tests. Graduates who intend to study in a direction where the above-mentioned subjects will be majors need to ensure that they review Mathematics on a consistent basis in the Grade 12 year as if for a year-end traditional examination. It is highly recommended to work through old exam papers as institutions differ in their measuring tools, for some cases the standard expected is extremely high e.g. University of Stellenbosch.

5. Please do not contact any tertiary institution or the Matriculation Board directly, regarding entrance requirements relating to Accelerated Christian Education – all liaison must be channelled via National Office.

6. Although quite a few applicants have been accepted since 2000, prospective applicants are considered on merit and no guarantee whatsoever can be given that they will be accepted.

**AUTHORISATION**

**School or Host or Home Education Academy:**

I hereby declare that I am authorised to complete and submit this form to A.C.E. National Office on behalf of the above-mentioned student. I have carefully read through this document and understood the content. The information that I have submitted is correct.

Name: ______________________________ Sign: __________________

Date: ___________________ Position held: __________________________

**Parents of Student:**

We, hereby declare that we have carefully read through this document and understood the content. The information submitted above is correct.

Father’s Name: ______________________________ Sign: __________________

Mother’s Name: ______________________________ Sign: __________________

Date: ______________________________
APPENDIX 9: Communiqués Regarding the Use of the Graduate Database of ACE Ministries

From: Jacqui Baumgardt [mailto:jbaumgardt@aceministries.co.za]
Sent: Tuesday, September 19, 2006 10:29 AM
To: dgovender@aceministries.co.za
Subject: FW: Masters Degree

Dear Daniel

Please see the attached as discussed. I would appreciate your help in this matter.

Perhaps it would be helpful for them to understand that the Thesis title is “Perceptions of the ACE Programme as Preparation for Tertiary Education”, and it involves a study of the opinions and perceptions of students, their parents and university admission officers, in this regard.

Thank you

God bless

Jacqui

From: Daniel Govender [mailto:dgovender@aceministries.co.za]
Sent: 20 September 2006 10:51
To: jbaumgardt@aceministries.co.za
Cc: pkwaan@aceministries.co.za; esmith@aceministries.co.za
Subject: RE: Masters Degree

Hi Jacqui

Please could you give us some detailed information on what school stats you will need? Will you need to call students, schools etc. Will names of students, schools be used? We will need as much detail as possible to help with a decision on this.

Outside of university mentors, who else will the final report go to?

I will table it again at our next managers meeting!

Thanks.

Daniel Govender
ACE Ministries
PO Box 22072
Glenashley, 4022
South Africa
Tel: (031) 573-6500
Email: dgovender@aceministries.co.za

From: Jacqui Baumgardt [mailto:jbaumgardt@aceministries.co.za]
Sent: 20 September 2006 11:27
To: ‘dgovender@aceministries.co.za’
Subject: RE: Masters Degree: Perceptions of the ACE Programme as Preparation for Tertiary Education

Dear Daniel

I need to use the following information:

- School stats to get a sample of comments as to why students leave to go to other schools in the FET years. No other information or identification is required.
- Contact details of graduates and parents from the Alumni “database”. They will be approached to complete a questionnaire and thereafter some of them will be asked to do an interview with me. They will give their “informed consent” and may voluntarily withdraw from participation even if they initially agree to participate.
• Contact details of university admissions officers - this falls into the public domain so does not require permission, but I want you to be aware that this forms part of the study.
• Letters and emails containing testimonies submitted for use in the Accelerator will be used – these are also in the public domain in the sense that they are published on the website.

In the study, I am required to ensure absolute confidentiality and to use a system of coding as identifiers:

I propose to use the following codes to preserve the anonymity of all participants:

S1 – S? for student responses
P1 – P? for parent responses
U1 – U? for university admissions officers responses
T1 – T? for testimonies

I will need to record some interviews in which case this will be coded as follows:

e.g. if I interview S1, the interview will be recorded as S1I etc.

In this way, only I will have the “source” information and this will not be released to or accessible by anyone else. Once the research is completed, I am required to keep the source information for 5 years; this must be held in a secure place e.g. a safe or other generally inaccessible place.

The thesis must be submitted to the Faculty of Education at UNISA who will then retain a copy of the thesis in the library. Copies will also be made available to ACE Management who may then decide what to do with the findings, conclusions and recommendations.

I trust that this provides you with sufficient information on which to base your decision.

Yours in His service

Jacqui Baumgardt

From: Daniel Govender [mailto:dgovender@aceministries.co.za]
Sent: 03 October 2006 07:51
To: jbaumgardt@aceministries.co.za
Cc: mstewart@aceministries.co.za
Subject: Masters Degree Research Requirements

Jacqui, please could you give us the following before a final decision is made:

• Could we see a copy of the questionnaire that you will use
• Could you estimate the number of schools/parents/learners that will be involved
• Is there a code of conduct/confidentiality or some ethics document that you must sign with UNISA – we will need a copy as well.

Once I have these management will consider limited access to our database.

Thanks.

Daniel Govender
ACE Ministries
PO Box 22072
Glenashley, 4022
South Africa
Tel: (031) 573-6500
Email: dgovender@aceministries.co.za
From: Jacqui Baumgardt [mailto:jbaumgardt@aceministries.co.za]
Sent: 03 October 2006 08:07
To: ‘dgovender@aceministries.co.za’
Subject: RE: Masters Degree Research Requirements

Dear Daniel

I trust that the information provided below will suffice.

Please see the questionnaire attached.

It is difficult to say how many students but I would hope to contact all the graduates that I can via email (as per the tertiary liaison/ alumni database of graduates) and this will determine who gets the questionnaire, and eventually who answers the questionnaire. Because the study is a "qualitative" one, the number of responses is actually not really a consideration. So students and parents who do not respond will not be nagged for a response – it will be totally voluntary and of their own free will. I will also contact UNISA, Free State and Natal universities.

There is no contract with UNISA. In my first chapter I had to explain how “confidentiality” would apply – the paragraph written below is what was submitted and accepted by UNISA in the sense that the first chapter has been approved. What then has to happen is that my correspondence with you and your response is then inserted as an appendix in the thesis to show that I have followed these procedures.

Thank you for your consideration.

Yours in His service
Jacqui Baumgardt

“1.6.1 Ethical Measures

The relationship I have with both ACE Ministries and the programme participants demands critical ethical consideration. It is essential that the participants feel protected from coercion and that ACE Ministries itself feels protected from potential breaches of confidentiality. In designing the research instruments, e.g. the questionnaire and the interview, it is imperative that there should be transparency of intent. Participation will be based on voluntary participation, with an invitation to participate being extended in writing. Consent will be requested from each participant, but they will also be advised that they are free to withdraw at any time even if they grant such consent. The questionnaires and interviews will be numerically coded to protect the anonymity of the participants, and the safe-keeping, confidentiality and preservation of this anonymity is my responsibility.

Permission will be sought from ACE Ministries to access information from its database, as well as authorisation to contact participants, schools and tertiary institutions, and an undertaking given by me that the information derived from the ACE Ministries resources will be utilised for the purposes of this research study.”

From: Daniel Govender [mailto:dgovender@aceministries.co.za]
Sent: 03 October 2006 13:02
To: jbaumgardt@aceministries.co.za
Subject: RE: Masters Degree Research Requirements

Jacqui, I am concerned about some aspects as in your attached letter. Please make the necessary changes if possible before we relook at it. Everything else in the body of your email seems fine.

Thanks.

Daniel Govender
ACE Ministries
PO Box 22072
Glenashley, 4022
South Africa
Tel: (031) 573-6500
Email: d.govender@aceministries.co.za
Dear Daniel

Please see revised letter attached. Regarding the SAT Critical Reading Score, this only came into effect this year so I don’t think there are any current ACE university students that have done this. I can add it if you think it is necessary.

Thank you

God bless

Jacqui
Appendix 10: Letter of Permission to Use Graduate Database

Mrs J Baumgardt  
27 Cunningham Road  
NORTHDENE  
4093  

11 October 2006

USE OF ACE GRADUATE DATABASE FOR RESEARCH PURPOSES

Dear Jacqui,

You have been granted use of the ACE Graduate database for research purposes with the following provisos:
- You may not mention to graduates that you are employed by ACE but instead state that you are an independent researcher
- You may not use the ACE letterhead

Thank you.

Daniel Govender  
Director: Policy Development
APPENDIX 11: Questionnaires

27 Cunningham Road
Northdene
4093

Date as postmarked

Invitation to Graduates and Parents of Graduates of Accelerated Christian Education
to participate in a research project

Dear Graduate

I am writing to invite you to participate in a research project that I hope will assist users of the
Accelerated Christian Education programme to better understand and address the needs of their
learners who wish to go to university after they have completed their schooling.

Your experience of the programme will be invaluable in helping me to analyse “Perceptions of The
Accelerated Christian Education Programme as preparation for Tertiary Education” which is the
topic of my Masters Dissertation. This research will provide an objective evaluation and give me a
better understanding of the programme’s effectiveness in this regard.

The usefulness of the study will be dependent on getting a response from as many graduates and
parents of graduates as possible. I am therefore trusting that you will assist me.

The study will be done in three stages:

1. The completion of a short written questionnaire and a graduate survey form – this will probably
take a maximum of half an hour to complete.
2. An oral, face-to-face interview with a selected number of students and parents which will be
arranged once the questionnaires have been returned. The interview will probably take about 45
minutes and will be recorded on a Dictaphone and transcribed into text. The text will be sent to
you for confirmation and clarification of the details. These interviews will take place during
October 2006.
3. The research proposal has been sanctioned by UNISA and the moderator appointed for the
purpose of overseeing the study is Professor AC Lessing, Faculty of Education, UNISA.

I will be contacting all graduates via email, as far as possible, and have been authorised to use the
Graduate Database of Accelerated Christian Education Ministries.

Confidentiality is an important part of research, and so while I will know the names of the
participants through the details provided on the survey form, a numerical code will be assigned to
each to ensure that participants cannot be identified when I write up my report.

I will be pleased to supply you with a copy of the findings once the study is completed.

Please note that there is no compulsion on you to participate in the study – it is entirely voluntary.
You may choose to respond to all the questions in the questionnaire, only some of the questions, or
indeed not to respond at all. The same applies to the interviews. If at any stage of the study you
wish to withdraw from participation, you may do so in writing.
Unfortunately, there is no remuneration for participating in this study, since it is part of my study programme.

If you are willing to participate in this study, please complete the enclosed Consent Form as well as the relevant sections of the Survey and Questionnaire. These should be posted back as I need your original signatures on the Consent Form. If, however, you choose to email it back, I will take your response as granting consent. Please let me have the forms back as soon as possible.

Please contact me if you would like to know more about this project.

I look forward to your responses.

Yours sincerely

Jacqui Baumgardt
Tel: (031) 7083971
Cell: 0848152018
Email: indecon@intekom.co.za
STATEMENT OF INFORMED CONSENT – GRADUATE OR PARENT

Title of Project: “Perceptions of the Accelerated Christian Education Programme as preparation for Tertiary Education”

I hereby confirm that

1. I have read and understood the information outlined in the introductory letter.
2. I understand that the study involves the completion of a questionnaire, and the possible invitation to participate in an interview at a conveniently arranged time and place.
3. I understand that all research data will be treated as confidential.
4. I confirm that any questions I have asked have been answered to my satisfaction.
5. I agree that research data gathered for the study may be published provided that I cannot be identified as a subject.
6. I agree to participate in this study and understand that I may withdraw at any time without prejudice.

Participant’s name: ______________________________________________________________

Signature:_______________________________________ Date: ___________________________

Statement of the Investigator

I have explained the terms of this project and the implications of participation in it to this volunteer. I believe that the consent is informed and that he/she understands the implications of participation.

Name of Investigator: J Baumgardt

Signature: [Signature]

Date: 11 October 2006

Confirmed by: __________________________________________________________________

Signature:_______________________________________ Date: ___________________________
## GRADUATE SURVEY AND QUESTIONNAIRE

### SURVEY SECTION

<table>
<thead>
<tr>
<th>Name of Student</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Contact Tel. /Email</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Name of School attended</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Graduation Year from School of Tomorrow</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Type of Certificate obtained</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>SAT RESULTS</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Subject 1</th>
<th>Verbal</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Subject 2</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Tertiary Institution entered into</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Current Year of Study</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Faculty and Course of Study</th>
</tr>
</thead>
</table>

| Have you been awarded any bursaries/ scholarships? | YES [ ] NO [ ] |
|----------------------------------------------------|

<table>
<thead>
<tr>
<th>Year</th>
<th>Amount</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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<td></td>
</tr>
</tbody>
</table>

Please attach transcripts of results of Latest Exams/Tests.
QUESTIONNAIRE SECTION

At which grade level did you begin ACE?

What were 2 highlights of your years of ACE

In what ways has the ACE Programme prepared you for your studies at your tertiary institution?

In what ways did it not prepare you?

Are there areas/subjects that were deficient in preparing you for your present studies? Explain.

What would you change about your secondary education if you could?

The following characteristics have been identified as the essential skills a person needs to succeed in tertiary education. Rate your ability on each of the following criteria, on a scale of 1 – 5. 1 being weak, 5 being excellent.

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ability to set goals and manage time</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to listen effectively</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to take notes in class</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to read effectively</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Possession of adequate study skills</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to think critically</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Possession of test taking skills</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Oral communication skills</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to work well with others in the educational setting</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to write effectively</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ability to think quantitatively, i.e. ability to work with numbers.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

J Baumgardt 10/06

Confidential
PARENT SURVEY AND QUESTIONNAIRE

SURVEY SECTION

Name

Contact Tel. /Email

Name of School your graduate student attended

QUESTIONNAIRE SECTION

What were your reasons for putting your child in an ACE school?

What were the highlights of the years your graduate(s. spent at the school?

In what ways has the ACE Programme prepared them for tertiary education?

In what ways did it not prepare them?

What would you change about their secondary education if you could?
### APPENDIX 12: Summary of ACE Graduates’ questionnaires

<table>
<thead>
<tr>
<th>Code</th>
<th>Grade began ACE</th>
<th>Graduation Year</th>
<th>Course</th>
<th>University</th>
<th>SAT</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>S1</td>
<td>8</td>
<td>2004</td>
<td>B.A. (Christian Psychology)</td>
<td>Inst. Chr Psych.</td>
<td>440 330 770</td>
</tr>
<tr>
<td>S2</td>
<td>9</td>
<td>2004</td>
<td>B. Soc. Sc.</td>
<td>UoFS</td>
<td>540 690 1230</td>
</tr>
<tr>
<td>S3</td>
<td>4</td>
<td>2002</td>
<td>B. Com</td>
<td>UNISA</td>
<td>570 610 1180</td>
</tr>
<tr>
<td>S4</td>
<td>7</td>
<td>2004</td>
<td>LLB</td>
<td></td>
<td>Not supplied</td>
</tr>
<tr>
<td>S5</td>
<td>9</td>
<td>2000</td>
<td>B. Ed</td>
<td></td>
<td>640 650 1290</td>
</tr>
<tr>
<td>S6</td>
<td>6</td>
<td>2003</td>
<td>B.A. Christian Ministry</td>
<td></td>
<td>570 530 1100</td>
</tr>
<tr>
<td>S7</td>
<td>2</td>
<td>2002</td>
<td>B. Tech (IT)</td>
<td></td>
<td>- -</td>
</tr>
<tr>
<td>S8</td>
<td>1</td>
<td>2005</td>
<td>B. Com</td>
<td></td>
<td>- -</td>
</tr>
<tr>
<td>S9</td>
<td>6</td>
<td>2004</td>
<td>B. Sc Quantity Surveying</td>
<td></td>
<td>680 540 1220</td>
</tr>
<tr>
<td>S10</td>
<td>6</td>
<td>2004</td>
<td>B. Optometry</td>
<td></td>
<td>540 590 1130</td>
</tr>
<tr>
<td>S11</td>
<td>1</td>
<td>2001</td>
<td>B. Com</td>
<td></td>
<td>500 470 970</td>
</tr>
<tr>
<td>S12</td>
<td>1</td>
<td>2005</td>
<td>LLB</td>
<td></td>
<td>490 590 1080</td>
</tr>
<tr>
<td>S13</td>
<td>2</td>
<td>2003</td>
<td>B. Computer Science</td>
<td></td>
<td>550 580 1130</td>
</tr>
</tbody>
</table>

Key:
- Inst. Chr Psych: Institute of Christian Psychology
- UoFS: University of the Free State
- UNISA: University of South Africa
- CEC: Christian Educators College
- Stell.: University of Stellenbosch
- DIT: Durban Institute of Technology
- UoJ: University of Johannesburg
- UKZN: University of KwaZulu Natal

Omitted to preserve confidentiality.
## Highlights of the school experience

<table>
<thead>
<tr>
<th>Code</th>
<th>Details</th>
</tr>
</thead>
</table>
| S1   | The Christian based schooling system  
      | Working at one’s own pace |
| S2   | My relationship with my supervisor – we are good friends now |
| S3   | - |
| S4   | Getting to know God’s word  
      | Setting my own goals |
| S6   | Being in a Christian environment while undergoing my education  
      | Student Convention |
| S7   | Silver medal at Student convention (Science Engineering)  
      | Head boy |
| S8   | Obtaining a gold medal at student convention (clowning)  
      | Head boy |
| S9   | All Africa Student Convention, Bloemfontein, 2002, 2003  
      | Field trip to Rotanga Junction |
| S9   | Student Conventions  
      | Godly environment |
| S10  | International Student Convention  
      | All Africa Student Convention |
| S11  | ACE convention |
| S12  | - |
| S13  | Learning to study on my own  
      | Finishing early |

## In what ways has the ACE programme prepared you for tertiary education?

<table>
<thead>
<tr>
<th>Code</th>
<th>Details</th>
</tr>
</thead>
</table>
| S1   | Prepared me spiritually in a sense that my spiritual foundation was formed at HCA and my going into Christian Psychology was influenced by my prior knowledge.  
      | Prepared mentally, used to hard work and giving my total best in what I do  
      | Getting used to working on your own and only referring to the teacher when necessary  
      | Prepared me to set goals and stick to them which makes the workload easier, as well as the discipline of doing your own work. |
| S2   | It has taught me to set goals, to manage my study time effectively. I have also benefited greatly from the vocabulary I learnt through the ACE programme |
| S3   | Definitely in my ability to plan my semester into small easily manageable units. My life as a whole is much simpler as I can look at a task holistically but still see the individual pieces. I am better able to work independently due to the ACE programme. The Biblical input has also been of great value |
| S4   | I learned to set goals |
| S5   | ACE taught me to take responsibility for my own learning. It helped me learn to prioritise, set reasonable goals and achieve what I set out to do. It helped me especially understand the steps to answering essay questions effectively and accurately through the use of outlines, etc. Also, having to research and develop my own thoughts in order to write my Grade 11 thesis taught me many skills necessary for tertiary education. Finally ACE taught me to think for myself (to ask diagnostic questions and to come to my own conclusions)). This is valuable in tertiary studies where you are often challenged to develop your own ideas on a particular subject. |
| S6   | Going through the ACE programme really taught me how to set goals for myself. It also taught me determination and perseverance in order that I may reach those goals. It is important that while you are studying in a tertiary institution you set goals for yourself. |
Going through the ACE programme prepared me adequately to achieve any goals that I set for myself or that are set for me by the University. Spiritually it taught me to be strong in my faith and comfortable with who I am. It is important that you are strong in these areas as you go out into university life.

S7 It has taught me to set my own goals
Help me teach myself

S8 To work on my own
To set goals

S9 Setting goals
Self-discipline
Handling lots of work, different subjects at the same time
Good English background – ACE helped me to be able to read with understanding and write English effectively (Afrikaans is my first language)
Seeing Christ in everything – social, work, study, etc
Working on your own effectively

S10 Having a strong Christian foundation
Having self-motivation to complete studies

S11 To be able to work alone and carry on with work
To be disciplined in what I do

S12 It has helped me to work independently and to set goals

S13 It taught me to study on my own

<table>
<thead>
<tr>
<th>Code</th>
<th>In what ways did it not prepare you?</th>
</tr>
</thead>
<tbody>
<tr>
<td>S1</td>
<td>-</td>
</tr>
<tr>
<td>S2</td>
<td>It did not prepare me for time limits. In ACE you are used to working at your own pace. Completing tests at your own pace, but in tertiary institutions, you have a specific time to complete academic work, especially tests. It’s not a major problem, but it can be quite nerve-wracking until you get used to it.</td>
</tr>
<tr>
<td>S3</td>
<td>The ACE programme prepared me adequately for the world. Any limitations I experienced were of my own shortcomings.</td>
</tr>
<tr>
<td>S4</td>
<td>To study big amounts of work</td>
</tr>
<tr>
<td>S5</td>
<td>I really believe that ACE did not leave me unprepared in any way. As with any schooling system, what you put in determines what you get out, and I have found that if you follow the ACE programme correctly and put in all you can, you will not be left unprepared in any way.</td>
</tr>
<tr>
<td>S6</td>
<td>The only area is maintaining your concentration in class while a lecturer teaches from up front. This may be my own problem though as I do find it difficult to concentrate for long periods of time.</td>
</tr>
<tr>
<td>S7</td>
<td>Final exams</td>
</tr>
<tr>
<td>S8</td>
<td>For final exams</td>
</tr>
</tbody>
</table>
| S9   | Doing big projects in little time
Taking notes in class
Writing exams on a whole year’s work
Oral debates |
| S10  | My academic level of Science and Maths wasn’t on standard. I had to work very hard to catch up. |
| S11  | I didn’t learn much about SA history
Sport in the school wasn’t good
Didn’t prepare me to take big exams |
### Are there any areas/subjects that were deficient in preparing you for your present studies?

<table>
<thead>
<tr>
<th>Code</th>
<th>Areas/Subjects</th>
</tr>
</thead>
<tbody>
<tr>
<td>S1</td>
<td>-</td>
</tr>
<tr>
<td>S2</td>
<td>-</td>
</tr>
<tr>
<td>S3</td>
<td>No</td>
</tr>
<tr>
<td>S4</td>
<td>No</td>
</tr>
<tr>
<td>S5</td>
<td>No (I do feel that the SA Biology PACEs were of a poor standard, and so I didn’t follow through with them. That didn’t affect my area of tertiary studies, though).</td>
</tr>
<tr>
<td>S6</td>
<td>No</td>
</tr>
<tr>
<td>S7</td>
<td>Insufficient computer studies</td>
</tr>
<tr>
<td>S8</td>
<td>Business studies – it would have been nice to have had something like a career week to go an visit institutions at which you might want to work</td>
</tr>
<tr>
<td>S9</td>
<td>-</td>
</tr>
<tr>
<td>S10</td>
<td>Science and Maths. I think if I had carried on with the American PACEs, my problems would have been solved</td>
</tr>
<tr>
<td>S11</td>
<td>Not writing big exams and learning for them</td>
</tr>
<tr>
<td>S12</td>
<td>History – ACE seems to focus primarily on American history while paying little attention to local history</td>
</tr>
<tr>
<td>S13</td>
<td>No</td>
</tr>
</tbody>
</table>

### What would you change about their secondary education if you could?

<table>
<thead>
<tr>
<th>Code</th>
<th>Changes</th>
</tr>
</thead>
<tbody>
<tr>
<td>S1</td>
<td>Academically I would not change a thing. ACE has an excellent standard which few people appreciate.</td>
</tr>
<tr>
<td>S2</td>
<td>Do away with the access course</td>
</tr>
<tr>
<td>S3</td>
<td>SAT test – I really can’t see the point of writing the test to get entrance in South African universities when it is an American test and most of us are Afrikaans speaking</td>
</tr>
<tr>
<td>S4</td>
<td>Nothing. Entering the ACE programme was the best thing I could have done.</td>
</tr>
<tr>
<td>S5</td>
<td>Nothing</td>
</tr>
<tr>
<td>S6</td>
<td>That goal setting is important [?].</td>
</tr>
<tr>
<td>S7</td>
<td>More social activities</td>
</tr>
<tr>
<td>S8</td>
<td>I would go to a public school from Grade 10 – 12</td>
</tr>
<tr>
<td>S9</td>
<td>I would implement exams into the system: every six months</td>
</tr>
<tr>
<td>S10</td>
<td>-</td>
</tr>
<tr>
<td>S11</td>
<td>-</td>
</tr>
<tr>
<td>S12</td>
<td>Nothing</td>
</tr>
<tr>
<td>S13</td>
<td>Nothing</td>
</tr>
</tbody>
</table>
### Essential Skills – Self-rating on a scale of 1 – 5 (1 being weak, 5 being excellent)

<table>
<thead>
<tr>
<th></th>
<th>S1</th>
<th>S2</th>
<th>S3</th>
<th>S4</th>
<th>S5</th>
<th>S6</th>
<th>S7</th>
<th>S8</th>
<th>S9</th>
<th>S10</th>
<th>S11</th>
<th>S12</th>
<th>S13</th>
<th>Average</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ability to set goals and manage time</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>4.38</td>
</tr>
<tr>
<td>Ability to read effectively</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>4</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4.38</td>
</tr>
<tr>
<td>Ability to work well with others in the educational setting</td>
<td>5</td>
<td>2</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>4.23</td>
</tr>
<tr>
<td>Ability to write effectively</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>5</td>
<td>3</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>2</td>
<td>4</td>
<td>4.23</td>
<td></td>
</tr>
<tr>
<td>Ability to think critically</td>
<td>4</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>2</td>
<td>4</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>4.15</td>
<td></td>
</tr>
<tr>
<td>Ability to think quantitatively (i.e. ability to work with numbers)</td>
<td>3</td>
<td>2</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td>5</td>
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<td>5</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>4.15</td>
</tr>
<tr>
<td>Possession of adequate study skills</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>4</td>
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<td>4</td>
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<td>4</td>
</tr>
<tr>
<td>Possession of test-taking skills</td>
<td>4</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>2</td>
<td>2</td>
<td>4</td>
<td>3.92</td>
<td></td>
</tr>
<tr>
<td>Ability to take notes in class</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>5</td>
<td>5</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>3</td>
<td>4</td>
<td>3.62</td>
<td></td>
</tr>
<tr>
<td>Oral communication skills</td>
<td>4</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>4</td>
<td>5</td>
<td>3</td>
<td>1</td>
<td>4</td>
<td>4</td>
<td>3</td>
<td>4</td>
<td>3.62</td>
<td></td>
</tr>
<tr>
<td>Ability to listen effectively</td>
<td>3</td>
<td>4</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>4</td>
<td>3</td>
<td>3</td>
<td>4</td>
<td>2</td>
<td>3</td>
<td>5</td>
<td>3.54</td>
<td></td>
</tr>
</tbody>
</table>

### Preparation for Tertiary Education – summary of comments

<table>
<thead>
<tr>
<th></th>
<th>Number of questionnaire respondents citing</th>
<th>Number of archival documents citing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ability to set goals and manage time</td>
<td>10</td>
<td>13</td>
</tr>
<tr>
<td>Independent Learning (self-study, teaching oneself, responsibility)</td>
<td>9</td>
<td>13</td>
</tr>
<tr>
<td>Self-discipline</td>
<td></td>
<td>3</td>
</tr>
<tr>
<td>Diligence</td>
<td></td>
<td>4</td>
</tr>
<tr>
<td>Consistency</td>
<td></td>
<td>3</td>
</tr>
<tr>
<td>Perseverance</td>
<td></td>
<td>2</td>
</tr>
<tr>
<td>Work ethic</td>
<td></td>
<td>2</td>
</tr>
<tr>
<td>High standards, excellence</td>
<td></td>
<td>2</td>
</tr>
<tr>
<td>Self-motivation</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Well-organised</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Relationships with people</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Prudence</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Planning</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Leadership</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Effective study habits</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Determination</td>
<td></td>
<td>1</td>
</tr>
</tbody>
</table>
### APPENDIX 13: Summary of questionnaires - parents

#### Reasons for putting child in an ACE school

<table>
<thead>
<tr>
<th>Code</th>
<th>Reason</th>
</tr>
</thead>
<tbody>
<tr>
<td>P1</td>
<td>For having a spiritual based foundation; for allowing children the opportunity of working at their own pace and the high standards it sets</td>
</tr>
<tr>
<td>P2</td>
<td>Het aan die gemeente behoort waaruit die skool ontstaan het, maar ook die beginsels en die doelstelling van Christen onderwys ondersteun</td>
</tr>
<tr>
<td>P3</td>
<td>Biblical conviction; we were not happy with the lack of Christian principles in the public schools</td>
</tr>
<tr>
<td>P4</td>
<td>Godly principles; don’t like OBE/RNCS</td>
</tr>
<tr>
<td>P5</td>
<td>We started the school because we wanted our children to be educated in a school that was God focused and not humanistic</td>
</tr>
<tr>
<td>P6</td>
<td>For the first time there was going to be a Christian school close by! In 1994, there was a good possibility of political change in SA. After much thought and prayer, as there was the likelihood of government schools deteriorating</td>
</tr>
<tr>
<td>P7</td>
<td>Did not agree with current state school system Children went to boarding school – lack of discipline and safety problems ACE presented Christian education and a support system</td>
</tr>
<tr>
<td>P8</td>
<td>The possibility of emigrating to the USA Christian education</td>
</tr>
<tr>
<td>P9</td>
<td>A conviction for Christian education; principles of wisdom and of Proverbs 22: 6</td>
</tr>
<tr>
<td>P10</td>
<td>Ours was a conviction for our children to have an education based on the Word of God and for them to be educated without the influence of the secular and humanistic worldview and for them rather to have a Biblical Worldview</td>
</tr>
</tbody>
</table>

#### Highlights of the school experience

<table>
<thead>
<tr>
<th>Code</th>
<th>Highlight</th>
</tr>
</thead>
<tbody>
<tr>
<td>P1</td>
<td>Her going to All Africa Student Convention. End of the year banquets which are rather motivational</td>
</tr>
<tr>
<td>P2</td>
<td>Persoonlike aandag en Christelike insette</td>
</tr>
<tr>
<td>P3</td>
<td>His achievements both academically and spiritual growth. His maturing in the Lord</td>
</tr>
<tr>
<td>P4</td>
<td>Spiritual growth</td>
</tr>
<tr>
<td>P5</td>
<td>Student convention Watching them grow and mature in the “body”</td>
</tr>
<tr>
<td>P6</td>
<td>The preparation an involvement in 2 Student conventions A good grasping of the alphabet thus following word structure and spelling and memorizing Scripture memorizing and God’s good character</td>
</tr>
<tr>
<td>P7</td>
<td>The Student Conventions of 2003 and 2004</td>
</tr>
<tr>
<td>P8</td>
<td>Conventions, especially International convention</td>
</tr>
<tr>
<td>P9</td>
<td>Student conventions – interaction with other schools and achievements there Christian character awards Both children were head boy in their time</td>
</tr>
<tr>
<td>P10</td>
<td>Definitely their participation in the International Student Conventions in the USA</td>
</tr>
</tbody>
</table>
### In what ways has the ACE programme prepared them for tertiary education?

<table>
<thead>
<tr>
<th>Code</th>
<th>In what ways has the ACE programme prepared them for tertiary education?</th>
</tr>
</thead>
</table>
| P1   | Logical thinking and reasoning  
In setting goals and striving to achieve them  
In working well alone and being independent with her studies |
| P2   | Om te glo in haarself. Fondasies is gesetel in Christus en self aanvaarding. Hulle hoef nie toe te gee aan groepdruk om aanvaarding om kry nie. Self doelstelling en selfstudie is waardevol waar hulle as individu self verantwoordelikheid vir hul studies moet aanvaar |
| P3   | It has taught … how to set goals, be an independent learner, how to teach himself and how to study effectively |
| P4   | Setting goals, knowing what is right and wrong, self-image – knowing that you are special to God |
| P5   | Well-balanced children, solid in Word, no confusion, single-minded, stand without compromise  
Strong academics – well balanced  
Self-motivated |
| P6   | Setting goals, self determination. Checking of own work(cheating does not pay); Being a prefect was the beginning of developing leadership skills. As head boy, accepting responsibility and talking in public, and improved Christ-like traits. The examination results would not be as high is in government schooling |
| P7   | Discipline to study on her own  
Planning and goaling her studies  
To think an act like a Christian in the midst of pressure from other students  
Other parents agree with me: a definite mature way of being |
| P8   | Independent studying method  
Christian values – most important advantage of all |
| P9   | Focus on goal setting  
Ability to work on their own and research on their own  
General discipline |
| P10  | - |
| P11  | We believe that their foundation for their life has been established on the “ROCK” and that all that they face in their lives ahead of them will be manageable – they will cope and make sound decisions for whatever venture they embark on. They are loved and secure in whatever circumstances they find themselves in. |

### In what ways did it not prepare them?

<table>
<thead>
<tr>
<th>Code</th>
<th>In what ways did it not prepare them?</th>
</tr>
</thead>
<tbody>
<tr>
<td>P1</td>
<td>-</td>
</tr>
<tr>
<td>P2</td>
<td>-</td>
</tr>
<tr>
<td>P3</td>
<td>-</td>
</tr>
<tr>
<td>P4</td>
<td>PACE tests are only a small amount of work. University exams are written on a lot of work</td>
</tr>
<tr>
<td>P5</td>
<td>None that I can think of</td>
</tr>
<tr>
<td>P6</td>
<td>To know what the real working world would be like. There were no visits to large companies, nor any aptitude testing</td>
</tr>
</tbody>
</table>
| P7   | She (and other students) feel the lack of examinations  
Work is in compartments; the student does not always get the interaction of different parts, especially in Maths  
ACE English and Afrikaans focus very much on grammar, but students find it difficult to do comprehensive work |
| P8   | Absence of formal examination |
| P9   | Limited social interaction with peers |
We believe the worldly preparation that they might have had is something that they are now mature enough to work out for themselves. If they did not have a sound foundation to build on as a young man and woman, they would be confused young people, unable to decide for themselves as to what is the difference between right and wrong.

What would you change about their secondary education if you could?

<table>
<thead>
<tr>
<th>Code</th>
<th>Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>P1</td>
<td>nothing</td>
</tr>
<tr>
<td>P2</td>
<td>Geen</td>
</tr>
<tr>
<td>P3</td>
<td>Make his exposure to more young people of his own age bigger. He was the only student of his age in the school; he graduated alone in 2002.</td>
</tr>
<tr>
<td>P4</td>
<td>I would let them write a longer PACE test on 6 PACEs or perhaps even more.</td>
</tr>
<tr>
<td>P5</td>
<td>Set a standard of no compromise for all ACE schools; some are on the programme but are still secular and humanistic. This dilutes the purity of the programme. Keep the original programme. All the changes are dropping the standards. SA PACEs are not up to the USA grade.</td>
</tr>
<tr>
<td>P6</td>
<td>There should be small group work projects from time to time. There should be a minimum number of each sex pupils per grade to ensure that by Grade 12 there is no disaster. Out of the group we would like to have some close friends, for life!! Teachers, of each subject, should, each term, knowing their group “PACE Rate” give the class an overview of the work next e.g. difficult, similar or easy, but give personal encouragement to them</td>
</tr>
<tr>
<td>P7</td>
<td>Master Maths helped Sanet a lot to integrate the different modules in Maths. ACE English is EXCELLENT but comprehension tasks must be implemented. Once again – I complain about the SA Bio – it was a nightmare. Videos to demonstrate practical tests in Chem, Bio and Physics</td>
</tr>
<tr>
<td>P8</td>
<td>Stick to the ACE programme. Formal examination every six months. Bring Math, Chemistry and Physics up to standard for SA universities</td>
</tr>
<tr>
<td>P9</td>
<td>Arrange quarterly interactions with other Christian schools in the region. Relax learning center procedures for Grades 10 - 12</td>
</tr>
<tr>
<td>P10</td>
<td>Nothing</td>
</tr>
</tbody>
</table>
APPENDIX 14: Interview Schedules and Transcripts

Interview schedule – student participant

Pre-interview introduction:

- Confirm name and contact details
- Express appreciation for initial response and participation
- Provide copy of signed consent form
- Describe the management of the audio-recording equipment and confirm confidentiality aspects of the recording
- Describe the format of the interview i.e. using the same basic questions for each participant with some questions similar to those already asked on the survey form, seeking responses that are relative to their personal experience, i.e. their own perceptions
- Affirm that notes may be taken during the interview
- Affirm “freedom of choice” in response
- Confirm that a transcript of the interview will be presented for checking

RECOLLECTION OF THE EXPERIENCE

1. When you think back to your school days, is there anything that really stands out in your mind?
2. Where was your educational programme conducted i.e. school or home school?
3. Who supervised your educational programme in your final year?
4. For a normal school day, describe the general working/studying environment. What was it actually like?
5. How do you recall a normal school day?
6. How would you describe your attitude to school work at that time?
7. Thinking about study skills, what would you mean by study skills?
8. How would you describe yourself as a learner?
   - Visual
   - Kinaesthetic
   - Verbal

*Check recording

RECOLLECTION OF THE PROGRAMME

9. Before my next question, please tell me what you have been doing since you left school.
10. How did the ACE programme prepare you for where you are now?
11. How didn’t the programme prepare you for where you are now?
12. What factors associated with your schooling experience would you now attribute to your chosen field of study?

SPECIFICS

13. Which subjects and elective courses did you study to attain your Grade 12 Certificate?
14. How did you choose the subjects?
15. Was your choice related to a career pathway?
16. Some graduates have said that they wished they had had more experience in some subject areas. How do you feel about this suggestion in respect to your own situation?
17. What have you had to do, if anything, to “make-up” your skills?
18. What about essay writing? Have you had to do anything extra to complete post-school tasks associated with written assignments?
19. How have you managed exam situations?

ATTITUDES TOWARDS THE PROGRAMME

20. When you first met up with other students who had not used the programme for example at university, or in the workplace, how did you feel your education compared?
21. How do you feel now?
22. If applicable: what would you attribute to this change in reflection?
23. Did you complete all the course work and assignments required or was there some flexibility allowed?
24. What do you think about having flexibility?

OPINIONS OF OTHERS: WHAT HAVE YOU FOUND OTHERS THINK ABOUT THE ACE PROGRAMME?

25. Other students who have used the programme?
26. Friends?
27. Students who have not used the programme?
28. Family?
29. Why do you think your parents chose this educational programme?
30. What about tertiary institutions? What have you found at this level?
31. What about employers?
32. How do others comment about the weaknesses of the programme?
33. What do you feel about such comments?
34. How do others comment about the strengths of the programme?
35. What do you feel about such comments?
36. Would you put your own children through the programme?
37. Why?

FINAL QUESTIONS

38. What would you change about the programme itself if you were given the opportunity?
39. What impact has the Christian ethos of the programme had on your post-school life?

THIS QUESTION COMPLETES THE INTERVIEW,

40. Is there any aspect relating to your experience of the programme that you would like to talk about further?

INFORM THE PARTICIPANT THAT THE INTERVIEW IS NOW COMPLETE.

TURN RECORDING EQUIPMENT OFF AND EXPRESS SINCERE APPRECIATION FOR THEIR PARTICIPATION.
Interview questions – parent participant

Pre-interview introduction:

- Confirm name and contact details
- Express appreciation for initial response and participation
- Provide copy of signed consent form
- Describe the management of the audio-recording equipment and confirm confidentiality aspects of the recording
- Describe the format of the interview i.e. using the same basic questions for each participant with some questions similar to those already asked on the survey form, seeking responses that are relative to their personal experience, i.e. their own perceptions
- Affirm that notes may be taken during the interview
- Affirm “freedom of choice” in response
- Confirm that a transcript of the interview will be presented for checking

RECOLLECTION OF THE EXPERIENCE

1. When you think back to your children’s school days, is there anything that really stands out in your mind?
2. Where was your educational programme conducted i.e. school or home school?
3. Who supervised the educational programme in their final year?
4. For a normal school day, describe the general working/studying environment. What was it actually like?
5. How do you recall a normal school day?
6. How would you describe their attitude to school work at that time?
7. Thinking about study skills, what would you mean by study skills?
   - Visual
   - Kinaesthetic
   - Verbal

*Check recording

RECOLLECTION OF THE PROGRAMME

9. Before my next question, please tell me what your child has been doing since he/she left school.
10. How did the ACE programme prepare them for where they are now?
11. How didn’t the programme prepare them for where they are now?
12. What factors associated with their schooling experience would you now attribute to their chosen field of study?

SPECIFICS

13. Which subjects and elective courses did they study to attain the Grade 12 Certificate?
14. How did they choose the subjects?
15. Was the choice related to a career pathway?
16. Some graduates have said that they wished they had had more experience in some subject areas. How do you feel about this suggestion in respect to your own situation?
17. What have they had to do, if anything, to “make-up” their skills?
18. What about essay writing? Have they had to do anything extra to complete post-school tasks associated with written assignments?
19. How have they managed exam situations?

ATTITUDES TOWARDS THE PROGRAMME

20. When you first met up with other students who had not used the programme for example at university, or in the workplace, how did you feel your education compared?
21. How do you feel now?
22. If applicable: what would you attribute to this change in reflection?
23. Did you complete all the course work and assignments required or was there some flexibility allowed?
24. What do you think about having flexibility?

OPINIONS OF OTHERS: WHAT HAVE YOU FOUND OTHERS THINK ABOUT THE ACE PROGRAMME?

25. Other students who have used the programme?
26. Friends?
27. Students who have not used the programme?
28. Family?
29. Why did you choose this educational programme?
30. What about tertiary institutions? What have you found at this level?
31. What about employers?
32. How do others comment about the weaknesses of the programme?
33. What do you feel about such comments?
34. How do others comment about the strengths of the programme?
35. What do you feel about such comments?
36. Would you put your own children through the programme again?
37. Why?

FINAL QUESTIONS

38. What would you change about the programme itself if you were given the opportunity?
39. What impact has the Christian ethos of the programme had on your child’s post-school life?

THIS QUESTION COMPLETES THE INTERVIEW,

40. Is there any aspect relating to your experience of the programme that you would like to talk about further?

INFORM THE PARTICIPANT THAT THE INTERVIEW IS NOW COMPLETE.

TURN RECORDING EQUIPMENT OFF AND EXPRESS SINCERE APPRECIATION FOR THEIR PARTICIPATION.
S13I 15 October 2006

Thank you for agreeing to do this interview with me. I really hope we’ll have a fruitful time and that you’ll be able to help me with this degree of mine. I’m in the research phase right now. So I’m going to ask you a whole lot of questions about your schooling and what you think about the programme. There are no right or wrong answers but no yes/no answers either.

Thinking back to your school days, is there anything that really stands out in your mind? Positive or negative.

Nothing comes to mind at the moment – only that I was in one school for my whole school career.

**Ok, so do you feel that this was a disadvantage?**

Well, I don’t really have anything to compare it to, so I guess I don’t know.

**Where was the programme conducted – in a school or home environment?**

School

**Who supervised your educational programme in your final school year?**

I think it was DC, but I can’t remember – I think it was, ja.

*Can you think back to a normal school day and generally describe the environment, the study, what was it like working in the school environment. Or the ACE school environment.*

It was fine. I don’t have anything to compare it to but ja, go, do some work, it’s what it all comes down to – you owe yourself to work, there’s a lot of students who don’t do anything -------- and so you have to keep yourself focused.

**So do the teachers help you with that?**

Oh they do, but they only really help you if you put your flag up, otherwise you just keep watching the clock waiting for the time to go by.

**So you basically have to motivate yourself.**

Ja, and the goals are there and also they do check the next day to see that they have been done. Also you have minimum goals you have to set. So that also helps you a lot.

*So you think working in the ACE environment, you know the “office” – that you had to work in and everything – what do you think about that?*

Well, what the office – what it is really designed to do is obviously to keep you from talking to the other students so that you keep doing your work and that is where the dividers help. …. So the office is a good thing.

**So you kind of feel that the office is a disciplined environment. Did you enjoy the system?**
Well, the best part of it – is that you can work as hard as you can, as you want, so you can finish early. So I did enjoy it.

**Did you finish early?**

Yes, I did.

**How early?**

One year early.

*So that’s where the self-pacing comes in, so you are not bound by academic years or grade levels. That’s why it’s called accelerated? How would you describe your attitude to work at that time?*

Well, when I was probably in the middle of the whole school career, I didn’t really, I was relaxing, just going with the flow and then I started to realize that school does end some day and the harder you work, the sooner it ends ………and towards the end I started working harder and harder just to get to the end.

*Things like study skills - What do you mean by study skills?*

Study skills – I think it’s probably – is like when you are studying for test or an exam The ACE system didn’t have big exams at the end of the year, you only had to study a little bit and then write a test.

*Ok what specific skills, like for example when you study for a test, how do you study?*

Well, for me in the ACE system – I don’t know – I have a very good short term memory and I didn’t really have to study. I just knew the work and then wrote.

*So would you say, you almost have a photographic memory,*

But now that I am at varsity with big exams, you can’t do that – you have to study.

*Ok so what do you do then to study?*

Well me, just depending on the subject, like economics, I just read the textbook, I just read it once, and what happens we have tests – I do the test I get good marks – if you get good marks for the tests then you will probably do well in the exam, then I read over the work and then I read the whole textbook once again.

*Do you make notes, summarise?*

I don’t make notes, I don’t summarise.

*You don’t do any of those things?*

But for maths, then that’s a different story – I do make notes and I do summarise because you have to know every single step, if you do a problem or something like that so it’s more difficult, I find.
Do you set aside specific time for studying?

Like if I know exams or a test is coming, I work out like a week ahead or how much time I need ahead, and then I think I’ll go through the work on this day or something like that – I don’t actually write it down. I just keep it in my head.

So you don’t have stuff stuck all over your walls, like timetables and things?

How would you describe yourself as a learner? Verbal, kinaesthetic, visual?

I think I’m kinaesthetic – I don’t really enjoy reading diagrams or anything like that. I know they are important and can help you understand but I don’t enjoy it – and then also reading a book, like a text book, unless it’s a subject that you really enjoy doing, I don’t really enjoy doing that. I think the best way is hands-on.

How would that be in your varsity course – what do you do?

I’m doing a computer science degree and the best way is like when you are learning programming, we go into the lecture theatre, we learn the theory and then after that we go to the computers themselves and do what we have just learned.

So actually it’s an auditory skill because you are listening, making notes as you go?

No, after that you just go and every week you learn, even if you missed the lecture, you can go in there and you can learn, meet with your friends or something like that, what to do on the computer, and I think that’s probably the best way to do it.

Ok. Do you miss a lot of lectures?

No, I don’t. I try not to.

So you don’t go and play bridge in the Oppidani common room or something? So now before my next question, tell me what you have been doing since you graduated from ACE.

I’ve been studying Computer Science.

Anything else.

I’ve been working at …. as a sales assistant only on weekends – casual work

How do you feel then that the ACE programme prepared you for where you are now?

I think that working on your own, helps especially when you have to read textbooks, and then you do have lectures and work you have to get through and things like that ….. also on the setting goals when it comes to exams it helps quite a bit and you know you have to get through this thing today, tomorrow I’ll have to do that and then you’re ready for the exams.

And so that relates to your study environment – what about your working life?

Well, in the job that I have depends on whether someone wants to buy something – not really. Maybe when I get a permanent job, it will be different but not really at the moment.
And would you say that there were certain aspects of the programme or anything in the programme that didn’t prepare you for where you are now?

I wouldn’t say it didn’t prepare me, but I know like the first time I wrote a big exam, it was my first year at university and I didn’t do – while I passed everything, I didn’t do that well – and I had done well all my way through my studies so I don’t think it really prepares you to write big exams. Although that’s probably just because it was the first time I did it. By the second time, then it was fine. The second semester – you know, I didn’t work hard enough in the first.

Do you think that the ACE system could be adapted, like let’s say in your grade 12 year to bring in say a quarterly exam?

Ja, I definitely think it could – it wouldn’t be hard – just take a couple of PACE tests and stick them together.

I think that’s a common factor from everyone I have spoken to and even from the questionnaires, most people mentioned that factor – that they were not prepared for the big exam. Anything in your school that helped you to make your decisions or to career path you?

I think – I don’t know – that’s a difficult question. In my schooling career I don’t really know if it really helped me that much because I kind of knew what I wanted to do all along and I just chose that thing. I did change courses at university from Computer Engineering to Computer Science but that was basically related to ……

Coming now to more specifics – which subjects did you take?


You didn’t do anything to do with computers at the school – things like Futurekids?

We didn’t have anything at the school at that time. It was only in my final year that they introduced Furturekids.

So nothing related really. How did you choose your subjects?

The teachers helped us choose – that was along time ago.

Did they say you have to do this and that for purposes of university? Did they give you career guidance?

I think they did.

Some graduates have said that they would have liked more experience in some subject areas they studied. How do you feel about this in your own situation?

Well, the only subject I would have benefited from doing more work or more experience in would probably be maths – it was difficult when I first started varsity – I just passed my first tests.

How do you think that the ACE system could be improved to help you with that?
I think it was really just the SA math was very difficult, I got a lot of help from the teachers, and I don’t think I really understood what I was learning. And when you get into university you’ve got to learn.

*So the application aspect wasn’t there really. It was working through the steps but not really understanding the application of it.*

Why and what you’re doing - why you’re doing what you’re doing

*What have you had to do, if anything, to make up your skills? Is there anything that you have had to develop in yourself?*

There’s nothing really.

*You’re just an academic type*

No, I just carry on.

*What about essay writing – did you find that the ACE system helped you to write essays?*

No, not really.

*Why do you say that?*

I don’t think we wrote enough essays or read enough. We did do literature – I don’t think we read enough literature. I’ve always read books, so I suppose I didn’t suffer with that too much ….. but when it comes to writing essays in the ACE system, we didn’t really write any long essays but when it comes to things like economics at university and all those kind of subjects, management and things like that, they expect you to write pages.

*Ok, now if you look at the ACE or if you look at education per se, let’s say you were asked to do a business economics essay would you see that that might be a thing that could be brought into the system so you could write essays in whatever it might be or was it really only in English that you wrote essays?*

We did write essays in business and we did write short questions as well, not just essays and I suppose that helped quite a lot, but in English was the only subject we really wrote essays, in Afrikaans as well but mainly in English as far as I can remember.

*And of course, in writing at varsity, you’ve had to really develop those essay writing skills*

Ja.

*Did they take you through a process of writing?*

No, at varsity they just give you the questions and they expect you to write the essays, but they do have essay writing – free essay writing courses at the varsity – so if you are struggling you can go and get help.

*But you didn’t feel you needed it.*
Well, my marks were pretty good and so I didn’t think I needed it. And also maybe it’s because I just don’t like essays and so maybe that’s why.

*When you got your essays back, were there comments about structure or explanation or language*

Funnily enough, I don’t think I’ve ever read any of the essays that I’ve written because in the economics class there’s probably about a thousand students and they just put the papers there and you have to try and find your paper and it’s such a long story; and then after exams to get your papers you have to go and stand in line so I just decided I couldn’t be bothered. I’ve only ever looked at my Maths papers and there’s nothing there.

*So how have you managed the exam situation – you’ve mentioned that you were totally unprepared in a sense for the situation the first time you did it but once you’ve gone through that -*

Once I’d gone through that, you know what’s coming so you know what it’s not really a problem; I’ve just written exams recently and I’m pretty confident that I’ve passed everything quite well. Up to now I’ve been fine.

*What would you say it is in your own personal aptitudes and interests – what you like to do really - that have influenced you in your choices in terms of subjects, in term of the course that you’re taking?*

Oh definitely. I chose exactly what I wanted to do – I wanted to go into the field of computers. I wanted to be a programmer specifically, and that’s what I chose. There was no pressure from my parents to become a doctor or to do something specific in business or something like that.

*Why did you choose that?*

I enjoy technology a lot so I wanted to get involved with it and eventually make some money off it.

*How do you think your attitude to school helped? I mean, would you classify yourself as a “good student”? Or as a “reluctant student”?*

I think, probably, towards the middle of my schooling I was quite reluctant but towards the end, I realised that this is going to take me somewhere for the rest of my life I became a good student and at varsity I like to think that I’m a good student.

**Attitudes towards the programme**

*When you first met up with other students who hadn’t used the programme – and obviously you must talk to other students at varsity or even in the work place, how do you think your education compared*

I’ve always had a friend who’s always been in a different programme from me and if you compare the programmes, we basically started the same courses together at university and I know specifically when I think about the ACE system, I think it’s a very good system – if I compare myself to him, I don’t know, we never really talk about it that much, come to think of it. He’s probably cleverer than I am – he does better in the exams.

*So you haven’t had any major discussions about “Well I was at an ACE school and you were at a government school” but people haven’t really commented on it?*
No I haven’t really.

*How do you feel now about the programme?*

I think it was a good system that I went through. As I said, I never went to any other school. I only went to one school all the way through so I don’t really have anything to compare it to but as far as I can tell, I’m doing pretty well at varsity now.

*So the proof of the pudding is in the eating so to speak. Did you complete all the required courses and assignment in the programme?*

I did it all

*And if you’d been given a choice, would you have chosen differently?*

No

*Now what about others’ opinions of the ACE – what have you heard, what do other people think, have you discussed it with anyone?*

I haven’t really discussed it but I’ve found that – well my parents think it’s a great system – they sent me there – and as for friends, I don’t really know what they think.

*You’ve never really spoken to them about it and it’s never been an issue, in a sense?*

No, not for me. It’s never been an issue.

*But thinking about other students who have used the programme, have you ever discussed things about the programme with them?*

I probably did, but I was back in school then and we were school kids so ….kids don’t like shool – that’s the way that it goes. But they didn’t they never said anything against the system – maybe school, in general – but not against ACE.

*Why do you think your parents chose this particular programme for you?*

Because it was a Christian system.

*And tertiary institutions – what has your experience been of for example your acceptance into the university? And do your lecturers know where you come from?*

Well, getting in was quite a hassle at first. I went through a lot of people and this and that and that and I wrote the SATS test and they said it wasn’t good enough. And that I needed to do an access year. But I ended up getting in, on a conditional thing and then the other day – after about three years – I got my provisional exemption from the matriculation board provided I pass by 2008. That’s fine.

*But it hasn’t really – but your lecturers aren’t really interested in where you’ve come and what school you’ve come from, just as long as you’re getting through their course.*
Ja, they have nothing to do with it they just teach the course – they come, they go – and all the administration’s behind them

_Do they get personally involved with you in any way?_

It depends on the size of the class. Like for economics, no. There are just so many students. For computers it’s a smaller class and you have practicals and the lecturer’s walking around helping the guys. And so it’s a bit more personal but not to any large extent.

_Have you ever had anyone commenting about strengths or the weaknesses of the programme._

I have. I’ve heard of other students who finished before me commenting on the strengths but not really on the weaknesses. Goal setting and working on your own and things like that

_Would you do it again?_

I probably would.

_Having said that, would you put your own children through the programme?_

That’s difficult. I probably would if they sorted out the difficulty of getting into a tertiary institution. ‘Cause I know it takes a lot to get in. If they standardized that, then it would be fine.

_In other words you are talking about a level playing field where it doesn’t really matter what you’ve done as long as you’ve proven yourself in some way._

Like if they had an entrance exam to university and if you pass that you get in and that’s fine. Because I had to go through a whole lot of hassles to get in and these guys who have been to a government school, just present their application and they’re in. So if they had a standard to test all students to get in, that would be fine.

_And under those circumstances, you’d put your kids in the programme._

Yes

_Is there anything that you would change about the programme if you were given the opportunity?_

No, not that I can think of. I might change the fact that that they don’t write big exams but I don’t know if that is such an important thing because you can learn quite quickly – it’s not difficult to learn ….. other than that

_Even things – I’ve heard things about SA PACES_

The American PACES are not bad at all; I mean some of the American spelling might be different, but then it’s only a few words and you can usually tell if it’s wrong or right. I don’t think it’s a real problem.

_In terms of your faith? What impact has the Christian ethos of the programme had on your post-school life?_

I think I am. Obviously I think that learning the Scriptures and all that is a very good thing. You …..
What about moral values – you’re now in a varsity situation where basically anything goes.

No definitely

I’m just asking now – do you think it’s the Christian education or Christian upbringing that you’ve had that have helped you to make right decisions in the moral sense at varsity.

Definitely. You can do anything at varsity – it doesn’t matter – and so the Christian side helps a lot to make the right decision and to keep your values.

Is there any aspect relating to your experience of the programme you’d like to comment on further?

Not that I can think of

Thank you for your time.

S7I 15 October 2006

Thinking back to your school days, is there anything that really stands out in your mind? Positive or negative.

Nothing really stands out. The thing that really stuck in my head was when I was at HCA when I was under Mr SB, we used to mess around and he’d give me a “lamey” and I’d give him one back. But one day I sort of missed and for about three days afterwards he had a fat lip. This is something that has stuck in my mind from then on.

Where was the programme conducted – in a school or home environment?

At a school

Who supervised your educational programme in your final school year?

Pastor SE

Can you think back to a normal school day and generally describe the environment, the study environment, what was it like working in the school environment?

Pleasant. Although in the mornings it was usually quite hectic – the teachers are all on the ball, and everybody’s trying to settle down and get working and stuff. Usually by the time 15 minutes before break, we’re all yearning for the break. And then after break, everybody’s settled and calm and we all just do our work normally until lunchbreak. Afternoon, you could say that wasn’t really working time. You would try and do a bit of work in the afternoon but you’re really in the mood of getting home and just relaxing and stuff like that.

Was it a noisy school environment?

At times, like when it was just a few of us by ourselves then it was fine, but having large classrooms with so many different grades in at the same time, then it sometimes got a bit out of hand on the noise side.
So let’s go back to your senior year - can you describe your attitude towards it and towards your school work?

Um, I would say I’m just going over the last four years – well the 4th and 3rd year before I left – I wasn’t so energetic in getting my work done and I’d like try and make excuses to get out of that whenever an opportunity came to go out for the day or miss out on things like science, I’d take it, but as I soon realized when it came to my 2nd last year and my final year, I look back and wish I had actually not done that. Because you start getting the feeling of being ready to leave school, you want to get out of there so you start working as hard as you possibly can, but one thing that I think I did which wasn’t so good is that for the first part of the 2nd last year, I worked so hard that I burnt myself out so I wasn’t able to keep up the pace for the last 1 ½ years but it still went very well. But you mustn’t think that your averages from the years before your last year are going to stay the same, like how many Math you completed in a year because when you reach Matric, you basically can’t say that “O, but I’m doing well in Math and I’ve got plenty of time” – you need to try to get ahead as soon as possible because completing Math and Afrikaans and even English is difficult. Especially Science as well. You need extra time. Because matric work in an ACE school, you’re still learning new things. Often in government school, you’ve learnt all the things already and in matric you repeat going over what you’ve learnt already and what I’ve found with this, is you have to prepare yourself as much as you can and try and get ahead before you enter that final year.

So now thinking about study skills – what do you mean by study skills?

Well, basically being able to learn for a test.

How would you actually do that?

The best way I’ve found of learning for a test is by writing out the information that you’ve got and obviously repetition, just doing it over and over again – it might be very tedious work but that’s the only way to get it printed in your mind.

How would you describe yourself as a learner? Verbal, kinaesthetic, visual?

I would say I like to be doing something with the studying. I like to always relate things that I’m learning with things that happen in life, things that are tangible, and that is how I try to learn as well as repetition.

In terms of the ACE system, were you able to do that because it catered for your learning style or did someone say “no, no, no you can’t do that – you have to do it this way,” or were you able to develop your own learning style?

Definitely there’s no solid way that they teach you to learn. I mean in the ACE system that’s how a PACE is created with the repetition – you first do a little test and a check up to see how you are doing with that work and you repeat that in the self-test and you finally do it in the PACE test. Obviously it’s always not the same but it helps you get ready for the PACE test. No, there hasn’t been anyone who has said “No, you can’t learn it like that” and I did fine.

So now before my next question, tell me what you have been doing since you graduated from ACE.

Well, I’ve enrolled with UNISA to do a bridging course because I never did the SATS exam—once I finished school I decided I didn’t want to go for that because I sort of wanted a gap year this year ….. but I contacted UNISA if I could start next year to do a course and they said I could do a bridging course which is only 3 modules as opposed to 12 which you have to complete in a year.
before you are allowed to start studying. So I decided to do that and that’s going pretty well – I’ve
done 2 of the 3 modules already and I’ll be doing my third module and last exam at the end of
November this year. And I’ve also started working with a friend of mine … and he has a brokerage,
selling life insurance through the company called Channel Life and we go out and we sell
insurance.

How do you feel then that the ACE programme prepared you for where you are now?

Concerning studying the ACE has prepared me very well for the studying that I’m doing. First I’m
doing UNISA, that’s working correspondence. You basically have your text book and you learn out
of that and it’s like your PACE in Science– you have your reading book and you have your writing
book. That’s what it’s like with UNISA. One thing that I find highly annoying with the ACE is that
it hasn’t helped prepared me for exams – exams are a lot different from PACE tests – they are much
larger, longer and more difficult. You have much more quantity of study material to learn for that,
so one thing that ACE hasn’t prepared me for is that.

Now when you came to writing exams, how have you done?

I’ve done very well, I must say – I haven’t got my marks yet. Basically we had two hours to
complete the exam and I completed and revised them in under 40 minutes each. So I did all right,
but in terms of preparation, I didn’t know when to start preparing for an exam, how to get through
such a huge textbook of 500 pages, to prepare for that 2 hour exam.

In terms of goalsetting, did you apply that or not?

I did all right with my goal setting at school but one thing – I do goal set – I find that helps me the
most is in a sense is incentives. I need incentives to get through something. That’s what drives me
so what I have done is with my studying – it wasn’t very good – I tried pacing myself with the
studies to get some done every day but it doesn’t always work like that – what actually happens is I
missed out on a whole lot of days and ended up going flat out for the last two days before the exam
and that’s basically how I did it.

Well you’ve basically the next question, which is how didn’t it prepare you?

Before you carry on – the other thing that it didn’t prepare us for – I don’t know whether it’s
supposed to be with the ACE – but I’ve never had a time limit on the amount of time I had for a
PACE test but and now I was limited with the exam – I had ample time but it might not always be
so. So that’s another thing.

Anything in your school that helped you to make your decisions or to career path you?

Well, with my line of work and the career that I want to go into, I have to be able to be quite on the
ball with answering questions, and that actual documents that we use in what we are selling are
about the average size of a PACE. So knowing how to go through a PACE and how to pick up key
points of that has helped me with that, that I am able to go through the different policies, so to
speak, of what we’re doing and pick up the main part of it so I’m able to answer people on that as
soon as they ask.

You’re actually talking about reading skills.

Yes, I’d say so.
And communication skills

Definitely.

Coming now to more specifics – which subjects did you take?

You’re actually talking about reading skills.

Yes, I’d say so.

And communication skills

Definitely.

How did you choose your subjects?

I sat down with the principal at that time and went through each …. and see what I was interested in. Obviously my parents were with me and had a lot of input on what they wanted me to take. I was very keen for the business part of it but coming from a Christian home and being a Christian, my parents were very enthusiastic for me to take the whole Biblical studies course which I would say wasn’t completely necessary. I know that definitely two of them were all right but I found Basic Old Testament Survey is too drawn out and actually too long and too difficult. I know that most of my friends that have taken that have completely battled with it as I did. I think that should definitely be revised and changed around a bit and made more appealing to our age. Honestly you can do that as an adult if you’re wanting to go to a Bible College sort of environment but doing that whole course I found was obviously not to go through the history and all that – I didn’t find that very appealing

When you chose your subject, did you have some idea of what you wanted to do and then choose your subjects accordingly?

Absolutely not.

Why do you think that was?

I was young – four years before leaving school I didn’t really know, I had a few ideas of what I wanted to do, I wanted to go into the food industry but the school didn’t have anything to help me with that, so I basically just went for the basics.

Some graduates have said that they would have liked more experience in some subject areas they studied. How do you feel about this in your own situation?

Definitely. I would have loved to actually put what I’d learnt into practice. I mean the science was all well and fun – I don’t actually like science as a subject but because I don’t like it, I really worked on it and studied it and I got good marks, but it would have been interesting – the lab reports are OK but they’re outdated I would say in terms of, how we are today. But I would have enjoyed doing some of the experiments and doing practical work and putting situations that we are learning into real life.

What did you have to do if anything to make up your skills?
Not really, in what I’m doing it’s come quite naturally. I’ve never been a shy person or one to back down from a discussion or too shy to speak to people. I am very open about that and it’s helped me in my line of work and career that I’m choosing.

*What about essay writing? Have you had to learn anything extra, any special courses?*

No.

*Did you feel that the ACE system prepared you sufficiently for that?*

Yes, but just one thing that I’ve picked up is with the ACE in the English is the indentation of the paragraphs.

*Like a writing style or a convention, they would indent. Because that is the American way of doing things.*

Because of that indentation, my first two essays that I submitted, I actually had marks deducted from the assignments because of the indentation.

*Now you have mentioned some of this. How have you managed the exam situation – do you just go in cold not really knowing what to expect?*

You go in blind completely. I did the CAT tests that they did at the school for a few years, I had to fill in a little bit like in the multiple choice questions but in the last like two, three years of schooling I never did that so being able to follow that just took a little while of getting used to so I did recover and was able to do it.

*What would you say it is in your own personal aptitudes and interests – what you like to do really - that have influenced you in your choices in terms of subjects, in term of the course that you’re taking?*

Personally I do not like studying. I don’t like it, I’ve never been that interested in school, I mean when I was young before going into the high school part of ACE I would spend probably of the six hours that I spent at school, I probably spent three hours working and three hours daydreaming. ‘Cause my needs have – I was always thinking about other things and watching students and other waste ….. I had a funny notion when I was very young that I’m going to school to do this work and I have to do all these PACES, the school must be paying my parents a lot for me to do all this work for them. That’s the scheme I had in my mind of school. My parents must be getting paid for me to do this work.

I know that I need to get a degree or a diploma under my belt before I actually completely go into the business world that’s why I am doing UNISA but the nice thing about it, like ACE, is that you work at your own pace. What I’m thinking of doing because I’m working this year already, and it’s going very well, I’m going to continue working next year as well but only do one semester of work, if you know what I mean. Instead of doing a full 12 modules, I’m thinking of doing 6, I think, next year. Instead of the whole lot. Although my studies will be prolonged, I will still be able to work and further my career while I’m getting my degree.

**Attitudes towards the programme**

*Have you met any other students who have not been on the program and had any kind of discussion with them?*
Not really.

*What about friends?*

I found that friends of mine who are actually in Matric this year, what’s happened to me it’s actually been a little bit funny that with my friends and community within the church and school, I was in between, there were people who were a year and a half older than me or a year and a half younger than me. And for a little while I couldn’t really fit into either group. But in the long run, I’ve actually gone with the younger group, so all my friend are in matric this year and the ones that are in government school seem to be having a much harder time with matric than what I did because of exams and I can see why now that I’ve done my own exams with post-matric study.

*Have you ever had any negative critical comments about the programme?*

Yes, Definitely – They said “Oh matric wasn’t very hard for me because you can’t fail,” which is true but you still needed to get that amount of work done in that year before the end of the year. Of course you get criticism but I know – I haven’t been in any other type of school than ACE so I’m pretty for ACE, and definitely once I’m married and have my kids of my own, I’ll definitely send them to an ACE school.

*That was one of the questions I was going to ask you – if you had to do it all over again, would you?*

Yes. One thing that – I don’t know if it was just with the school I was at – but there wasn’t enough sporting activity and extra curricular activity.

*Did you complete all the assignments and courses? Was there any flexibility allowed?*

Yes, Math 135 wasn’t compulsory any more but I decided, with quite a lot of persuasion from my mother, we decided though it would take me an extra month to continue with Math – SA Math – a very difficult subject – it took me an extra month to do it and I did complete it and I’m the better for it.

*So there wasn’t much flexibility allowed.*

There wasn’t really any need for flexibility.

*What have you found from other students who have used the programme?*

I know from friends at school, friends who actually came from government schools to ACE, once they started, they actually found it quite a lot easier. But what often happens is that they find it quite irritating because they’re in a certain grade in a government school, but then when they come to an ACE school they often get put a grade lower or two grades lower. That’s because the ACE system is very different to a government system. They don’t work in the same way, if you know what I mean – there are different writing styles; different learning styles. In my own opinion, I would never advise anybody to come from a government high school to an ACE school.

*That’s what ACE also says because of that very specific thing.*

*Other friends who are in matric this year?*
Not really.

Family members? Apart from your own immediate family.

My cousin Daniel. Whenever I told him, “Ja, I’m finishing this and we only do PACE tests not exams”, he said, “Ah that’s so cool, you’re so lucky”. But they have to do all these matric exams and everything, and we just had to do these little PACE tests to get through matric, so he was envious of what my school had but also my school wouldn’t be able to support Daniel in all that he’s going for. Like he’s number 3 in South Africa for squash – and his school continually supports him in that, and sends him to PMB and furthers his sporting career which I don’t think an ACE school would do.

Why did your parents choose this system?

For my older brother, he went to a government primary school until he was half way through Class 2, and my parents, because we were at that time going to the church, and the church at that time decided to start a church school and my parents went for an interview and found this amazing programme and system and put us both in. They knew that it was at an extremely higher cost, especially primary school, because government primary school a lot less in cost, but they were willing to sacrifice certain things to allow us to have a chance in the schooling system.

What was it that stood out for them, do you think?

I don’t know. Basically it was probably because of it being a Christian-based system.

Did you have any difficulties or question marks about getting into UNISA?

No, actually it was quite nice, we went there to get all the documentation and then we had to go back a week or two later to go and actually sign up. There was a long waiting queue and we waited there for about 1½ to 2 hours but when we actually got there. She didn’t have any problems with all my documentation.

You felt she actually know about ACE

We actually asked her about it. And asked her “Have you had any other ACE students”, she said there - I mean we were probably in the first 50 people – and there had already been several other students who had come in from an ACE school.

So she wasn’t unfamiliar with it – she didn’t have any problems.

Weaknesses

No I haven’t really

And the strengths

Ja. That it is a very powerful programme. Whenever I did homework and I’d tell my parents about what I was doing, they always find that “Wow, that’s amazing – we never learnt any of that sort of thing in a government school.” What we find a strength in the ACE programme is that it goes into very deep detail, about different subjects.

Would you put your own children through the system?
Yes

Why

Because I found it very good working environment – you say it’s a Christian school, that there’s no swearing, no smoking, no drinking – you can never say because it’s a Christian school those things never happen – Christians aren’t perfect – we’re still human. Some of that does still go on. You can’t say that because it’s a Christian school, nothing bad can happen – people still get angry, still fight and all that, but I find that the working environment and having that Christian basis and all the Biblical principles that you get through the ACE experience has impacted on me and I would definitely want that for my children.

What would you change about the programme itself if you were given the opportunity?

I would have them revise all the SA PACES all the SA Math and say Afrikaans because even going through it myself, especially in Math – caused me problems because there’ve been so many glitches that I’ve spent three hours trying to work out a sum that was incorrect.

But you don’t find the same with the American PACES.

No, maybe once in a blue moon, there’s a little printing error but nothing so extreme that a whole sum is wrong to make me waste that amount of time.

What impact has the Christian ethos of the programme had on your post-school life?

I am able to quote Scripture verses to my self to encourage myself in different situations.

Had it had an impact on moral issues, like relationships and things like that?

Not so much with relationships per se with the opposite sex, but relationships with friends and stuff definitely, there’s always been the character traits that are in the English PACES that showed me different examples of how you should be with the different character traits.

Now, finally, is there any aspect relating to your experience of the programme you’d like to comment on further?

I really think about the ACE school that I was at – what I found is that the sport isn’t broad enough for me. Growing up, I’m a big-sized guy, I’ve often been asked, “So which rugby team do you play for? Do you play for first team rugby at your school?” – there wasn’t rugby at my school and there isn’t enough extra-curricula things as well. We’d go on a school outing once a term but there’s not educational outings that you go on. Like I mean, say you learn in your science about the making of glass or just the making of something, it would be good to see what the student who are on that PACE or who are doing that PACE – It’s up to the supervisors and the monitors just to look through the books and see what people are doing and see if there’s an opportunity to take them to a factory where they are doing that sort of thing. So they can see not just by reading and looking at the pictures in the book but see it is actual life.

What about other extra-mural –in your questionnaire, you mentioned Student Convention being a highlight.
Student Convention was fun – there are a few things that I would change. I would allow civvies to be worn in the evening. Because you go to Convention for such a long time and your days are very long, you wake up a half-past six in the morning and you only get to bed at ten o’clock at night and you have to walk around in your school shoes and school pants and everything like that, and you’re away for that amount of time, you don’t have enough clothes for that amount of time. What I’d like to do is to allow people to have a shower and change into civvies for the evening events.

But it was a very enjoyable experience.

So in terms of other like cultural activities, the school didn’t actually let you down, because you say there wasn’t enough in terms of sport but in other area such as cultural activities.

I can’t actually give my school much credit for what I achieved at convention, because I was supported a little bit but not incentively at the school to do what I did. Like I did the clowning and the drama part of it at convention, but the school never assigned somebody to come alongside me and say, “Listen, let’s work on this project, let’s think of a theme.” I basically did all that by myself. And I think the school could have assigned teachers, or assigned time to actually get into that and actually work with me.

Thank you.

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Thank you, for agreeing to see me and to discuss this with me.

Thinking back to the boys’ school days, is there anything that really stands out in your mind? Good or bad.

Well, one of the main things that absolutely thrilled me was how quickly and how easily they learned to read. That to me was absolutely fantastic – that they learned to read and spell out words and read words that they hadn’t learnt before.

How have you seen that translate for later studies?

Well, everything that they look at they read, and with ACE everything was based on your reading material and they were always able to read the material very clearly and very well. I think also the system teaches them to isolate points which is also very important in coming to giving answers and that whole concept. The other thing I really liked about it was the repetition and the foundation of constantly laying new foundations and going over it and that’s carried them right through to the end of their schooling when they just really flowed through that last year and prepared them for tertiary education.

Where was the educational program conducted – in the school or home environment?

In the school. [name of school]…. We chose school as we wanted them relating with other students, although it was still a small school and the number of children they were interrelating with – I would have preferred that there were more but I had chosen a Christian education from a personal point of view – that was the type of education we wanted for our children. We were happy to leave the fact that they didn’t have quite so many people to choose from.

Is the school still so small?
No, the school has grown. I mean, [name of student] started at QCA with 13 students. When both of them left I think that there were about 70 students. That was another great thing was that they were at one school and carried right the way through from Grade 1 – Grade 12 at the same school. Which again to me was very good.

*Who supervised the educational programme in the final year?*

For [name of student] it was Pastor …. For [name of student] …. 

*The reason why I am asking that question is what did you feel about them as educators?*

PE is absolutely tops. There was also DC who is very good, but PE has a heart for the children. He has Mathematics which we desperately needed in the school so that helped them tremendously because he also had a heart for the children.

*What are you recollections of the practice during a normal school day?*

Well again what I feel is that the personal side of ACE is that with each of my sons when they had a problem they were able to call a teacher to help them immediately and that one-on-one has helped them to understand their work. We are an English speaking people; neither of my sons were too keen to learn Afrikaans because I hadn’t been able to learn it, but they both were able to learn it very well because of this one-on-one with a teacher giving them the foundation that they needed and the interrelating that they needed.

*So that is part of the procedure in the learning centre, that they would study on their own and they would call a teacher for assistance when they needed help?*

Yes, that’s right.

*And if they didn’t need assistance they just carried on on their own?*

Each child – again I found this was very good – because it instilled in each child the ability to goal set because each child had to – within a perimeter – they obviously weren’t allowed to just set themselves one page – they had to set themselves a certain number of pages – but they set themselves that number of pages, they did the work themselves and then they had to get permission to do the marking themselves but if at any stage if they were struggling or if their marking was incorrect, they were then able to call somebody to come and help them. So I feel that that procedure actually prepared them for tertiary education. When they had to read things, find out things for their own selves, and put it into writing themselves.

*Talking about study skills, can you define what you mean by study skills? What does that mean then?*

I think what you’re asking me is “Are they able to study?” – are they able to obtain information from one area and put it into another place.

*So what specific skills?*

In the ACE system I found that they – in actual fact ACE America was able to write out clearly for each student and therefore for my two sons – were able to write out clearly how to do a practical thing – I’m thinking of Math, they were then able to work out how something was done and then
apply it to the information that was there and therefore be able to work out the Math themselves, which was very good.

*In terms of studying now, take [name of student] for example, what does he do when he studies? When he goes into his study?*

I don’t know. No, but the thing is he takes the information that he got – well, [name of student] has actually done IT and a lot of that is practical and he has been able to just take the knowledge from the book and apply it – he’s got a very logical mind apply it to the programme that is required. This year he’s in his final year and he’s doing managerial and he’s actually finding it quite a lot harder because he’s having to write out all the information, it’s not just applying it to a practical situation. 

*And [name of student].*

Now [name of student] is just at the beginning as you know – he’s just doing the bridging course. To begin with he said “Oh, help, Mum” but, in actual fact, once he started to settle down and read through the work, he was able to pick out the answers with both the two assignments he submitted in March– he said that he had not missed out a lot of questions but he’s been able to go through it very easily. I think as well the ACE system helps the children to learn how to retain the knowledge because of the repetition, and I trust that that is what they’re taking into their tertiary education – to read through things quite a few times which is part of what ACE does.

*So both your children are currently studying at university. Not in full time employment.*

[name of student] is in part time employment – he has now been working for three years at …. working weekends selling computers, equipment, software and hardware, and doing very well.

*And [name of student]?*

[name of student] has gone into insurance – but it’s not your house and car insurance, it’s more life insurance, funeral policies. He wants to be a financial adviser eventually and he’s doing the bridging course into doing the B. Comm.

*Now this is really an expansion of one of the questions that you answered in the written questionnaire? How do you think the ACE programme prepared your sons for where they are now? We have discussed quite a lot of this already. But were there any aspects of the programme where you felt that it did not prepare him for where he is now?*

[name of student] was able to cope with going straight into working with other students and working with a tutor. [name of student] has chosen to do UNISA because he is afraid that he will not be able to assimilate enough information from the tutor standing in the front. So I do think there is a bit of a lack there. In our school, personally, the chemistry and physics side and biology side, there is a strong lack there.

*Is it because there is an unavailability of teachers or is it because the material, the programme itself that’s lacking?*

Unavailability of teachers because, in actual fact, both my children have done both physics and chemistry with the books and have passed it. There is a lack of teacher input from the point of view of the teacher standing at the board and teaching them – that’s not the ACE way – but that side of it does need to be looked at and improved.
Were there any factors in their schooling experience that led them into the career direction that they have chosen? Did they just do a general schooling and their own characters led them where they are now?

Mainly I would say it was their own characters and their own interests, but I say that with [name of school] they do have Futurekids there, which is the computers, and I was able to send [name of student] to do a week’s course with Futurekids in hardware and it made him realize he didn’t want to do hardware – he wanted to do programming so that helped there. With [name of student], his love for money, therefore the math side, the fact that he had such an excellent teacher in his last year with his maths helped him to understand his math so much better and enabled him to realize that, yes, that is what he wanted to do.

Can you remember what subjects they did?

They both did Biblical Studies, [name of student] did English, Afrikaans, Maths, Science, Speech, etymology and history. [name of student] did Geography and all the other subjects. There were a few minor electives. Both also did Business Economics.

How did they choose those courses?

The teacher at the time sat them down and discussed with them what they were wanting to do with their lives and therefore chose the different subjects, and as we went along the basis ones were written down, it was defined a little bit more.

Was there an availability of other types of subjects which they could have also chosen?

I think there could have been if they’d wanted to. But basically they were just doing the basic ones.

Now what about essay writing?

We were always taught or encouraged by ACE that, in fact, once they had completed their ACE they would be able to essay write. There is something called “creative writing” which [name of student] did for about a term or two but then it was dropped away which I think if it had been allowed to continue, his essay writing would be better. He is, as I’ve said before, he’s my logic young man and he does not like essay writing. He just likes logic. [name of student] on the other hand, with the ACE system, he was told that it has generally been a complaint that there’s not enough essay writing, when discussing it with friends, in the ACE, but I have found with [name of student] that there has been adequate essay writing and literature as well supposed to be not such a good subject with the ACE but to me, my children’s reading foundation – good solid Christian books has been absolutely fantastic rather than doing Shakespeare and all the rubbish that you get to do with Shakespeare, they have done other books that have actually been excellent books for them to learn from. And actually in the ACE system as they go through the English, they read many poems so they get a lot of literature.

Do you think that helps with essay writing?

Absolutely. [name of student] has actually written a number of poems I think as a result of actually having done you know poetry in the ACE.

Now what about exams?
They take exams with a pinch of salt basically. On the whole that is. [name of student] obviously, he’s in his final year, he knows how to study well, he knows how to approach the subject and approach the exam well and he has actually done very well.

*And where do you think he learnt those skills?*

Again through the ACE system

*So it wasn’t something he had to learn on top of ACE – at varsity suddenly being confronted with these things.*

No Again in the ACE system they do books, at the end of the book they take a test, they take a self-test and then a PACE test and they had to pass the self test well enough to be able to take the PACE test. So they do 12 books per year per subject so that by the time they have completed their final year they have done many, many tests and these are not small tests – they can be three or four pages long. Each one is like a mini-exam so at the end of it they are confident, and their ability has grown tremendously and they can cope with the tertiary education exams.

*What about personal attitude and aptitude at school?*

Well, [name of student] enjoyed school life and I think [name of student] also enjoyed his school life. Both of them were head boy which we were very thrilled about, because they were given responsibility and again being a Christian school, the teachers were not pulling them down and belittling them; they were given confidence; they were confident in sport, which enabled them to face life. As you know at the moment my sons are doing my kitchen for me and I was just thinking about it this morning, it was partly because of the training through the ACE – they take this as a project, we face it and we deal with it.

*Attitudes towards the programme*

*Have you had any kind of discussion with any other students who haven’t been on the programme? For example or other family members?*

I haven’t talked to them very much. But I am aware. My sons do have friends who have been in other good schools, where we have been told, when my children were going to the ACE school, “oh they’re at a much better school,” but in the long run my kids are actually the ones who are able to cope with life. This is one of the foundation things. Because they’re given a Godly tuition, again good confidence, not pulling them down, that also that foundation of the Bible, they have that to run on. And they are able to face life and move forward whereas I do have friends with children who are finding facing life quite difficult.

*And what about others whose children are on the programme think about it?*

Well everybody I have spoken to is very happy with their children on the programme. Another little thing – I have a friend whose son has to have major operations, and ends up staying in bed but he is not behind because he is able to do the work at home and then go back to the school and mark it.

*So it’s fairly flexible as far as that’s concerned.*

Very flexible and in fact with [name of student] was a year behind, well he went in young and he lost a year – but he could have lost more except I was able to bring the books home and he was able
to study at home when he was sick but not too sick to not do any work. So it’s a very flexible programme.

*And what have you found friends whose children have not been on the programme think about it?*

Well, as I said earlier, they actually thought that the system wasn’t so good but now that they see the fruit of it, and now this end. At the beginning there were quite a number of people who said “…, really…” and in fact I had a teacher come to me and say, “…, you should really take [name of student] out for the last few years” but I chose not to – I chose to keep him in the ACE system

*What was their reason for saying that?*

I think she just thought he wouldn’t get a good matric – but he got an adequate matric – he also did the SAT English and Math and there was a bit of a problem getting him into DIT (now the Durban University of Technology) but when they saw his standard they then let him in, but there are problems and there have been problems

*But you haven’t spoken to people who have said “But this is my criticism of the ACE system”?*

Not really. I don’t think anybody dared!

*What about other family members?*

Well again, it’s the fruit that has spoken louder than words.

*And when you put the children in?*

They didn’t really comment.

*Do you think it’s because they are ignorant of the system or they just don’t really worry about it?*

No, they really don’t worry about it.

*Why specifically did you choose this programme?*

Well, I thought and prayed about it for about 6 months to begin with there was a lot of anti-ACE feeling and highly unrecommended – I am going back 12 years now.

*But where did that come from?*

I don’t know. There was someone who was a teacher at the church – she said “Oh, no, no, no, no” – just a general feeling that you shouldn’t be doing this, or going that way. But I really prayed about it and the two pictures that I had – one was [name of student], that [name of student] was taken to a church school, basically, and it was said of him that not a single word that he spoke fell to the ground - he was such a Godly man. And of course Moses was brought up in the world situation but he then had to lose it all to learn God’s ways of doing things, and those two pictures really made just me decide to do it and I really believe God wanted us to, because the other thing is a lot of people said it costs too much. If you saw my husband’s income and my income – or my husband’s income at that point in time – you would have said we couldn’t do it but we have done it. When it’s God’s plan – and I said to my husband, we’ve made a decision that this is what we want to do, you look at the finances, and when he looked at the finances, he worked out that we could manage it, and we managed to send [name of student] as well, and God has honoured that.
You mentioned just now about problems with the tertiary institutions and you said that [name of student] had a few hiccoughs with trying to get in. What about [name of student]?

Well, [name of student] with UNISA – he had to do the bridging course and they just accepted his certificate and everything, whereas with [name of student], he was signing up to join DIT and they said no, his certificate won’t do any good – and we were in touch with head office – they said they had spoken to DIT, they should accept it. [name of student] actually went back himself to the Central Applications Office and a senior lady from there took him back to the DIT and pushed him through. And when he came to getting his Diploma, there was a query about his certificate even now, and he just handed it to the man and the man knew how well [name of student] worked and how well he’s done, and he just pushed it through.

You said that [name of student] is employed part time at Incredible Connection – has he come back with any comments.

No, I can’t say that he’s made any comments – but he’s still working there. I personally think he’s the hardest worker there because he is only a casual, he only works weekends, but he sells incredibly well He knows his subject and he knows it very well and he just is able to sell.

Well, they basically wouldn’t have kept him on if he hadn’t proven himself.

He’s now the senior casual and so he’s actually in charge of them. I mean actually from that perspective, the head boy, for both of them, has been a marvelous experience because in my mind both my sons have leadership abilities. And that has again been encouraged through the ACE system.

Now you may not have any comment here but how do others comment about the strengths of the programme. Has anybody basically sat down and discussed it with you?

No, not really. Funny, isn’t it how everyone wants to focus on the negative.

We’re nearly at the end. if you had to do it again, would you?

I think because of all the things that I’ve been saying – the sound Christian doctrine, the Christian ethos of the school gives them confidence, the training in the Word of God, the understanding of the Word of God, as a foundation for your life which to me is the most important thing. Somebody – it was actually FD – who said one time, “It’s good to put your child in the same river.” We are Christians at home and our children went to Christian school. So they were sent along the same river, which to me actually is very important. So the foundation was really there, and then on top of that the way the teaching was done, the way the children learnt, everything was built upon a foundation upon a foundation. Growing more and more and more – and to me they just got such a strong foundation, which is what I would want to give my children – a high diving board to dive off into life!

So what would you change about the programme itself if you were given the opportunity?

I think I would try and bring the cost of the PACEs down – because of the cost of the PACEs, in the school that we were in – and we couldn’t afford a more expensive school – we didn’t have enough teachers. I do feel that each class should have its own teacher and then in the senior section each subject needs a teacher – that to me would be the most important thing. And if that happened, you
would then be able to have your teacher teaching with the blackboard to complement, not to
overtake, but to complement the ACE system.

_OK. We’ve come to the final question. Is there any aspect related to your experience of the
programme, that you would like talk about further, anything else you would like to say or do you
think you’ve said it all?

I think we’ve said it all. It’s a very good programme, you know, and I think it’s a very Godly one
and I think for a country that is struggling well, struggling as badly as this country, to put children
through an ACE system with the Biblical foundation that it gives – that’s how you build a nation.
And that is what I would like to see – the ACE system growing here in South Africa and world
wide. You know I read the promises that the glory of the Lord will cover the earth as the waters
cover the sea, and one of the ways is through giving them a good sound Christian education.

_Thank you._

_P10I: 17 October 2006_

_Thinking back to [name of student]’s school days, is there anything that really stands out in your
mind? Good or bad._

The one thing that really, really, really stood out in my mind was the goalsetting. I think that is
amazing.

_How have you seen that translate into higher studies?_

I think it’s taught him to pace himself. And when it comes to exams or that, He knows what he has
to do. He sets the goals. We never have to say to him [name of student], you need to go and study.
He knows what he has to cover for the exam and he sets goals so that by the time the exam comes,
hes covered all that work. I’ve seen him do it. And even at work and even at work. I mean this
year at work he decided he wanted to double what he was earning, you know commission-wise,
starting at the beginning of this year. That was his goal, And he set himself the goal and I said
“Well how are you going to do it?” and he said “OK, Mom if I want to make this amount of money
it I have to sell this much, and it usually works out that it is so many customers that I have to sell
to.” And he had already worked out that if he wanted to double what he was earning, how much the
sales, you know, the total days’ work, would have to be, and more or less how many customers he
would have to see based on the monthly sales. He knows, he knows on average over the month and
over the year what he has to - what kind of things he sells to make that kind of money.

_In other words, he has kind of developed a life skill, that would stand in his good stead, basically
for life?_

Definitely. You know what – even as far as his budgeting is concerned – I’ve seen it. We’ve never
really ever had to say to him – and I mean [name of student] has got expensive tastes – he really
has. But he knows if I want that, then I’m going to have to do this, this, this, and this to get it and, as
I say, he says, “I know that I have to set those goals and for those three months I won’t do this, this,
and this and so by the time I get to the sixth month I’ll have that much money so I don’t have to
worry and I can do whatever.”

_Where was the educational program conducted – in the school or home environment?_
In the school. [name of school]

*Who supervised the educational programme in the final year? Do you know?*

It was DC.

*Do you know anything about her in terms of her background, or skills or education?*

Not a lot. Although she’s been with ACE for a long time.

*So she is a very experienced supervisor.*

Very experienced, And she’s really good with the high school kids, she really is good. She builds a relationship with them. She can communicate with them, she really can.

*So do you think that it’s important? In terms of the ACE system being very programmed and very self-directed, do you think that having a supervisor – a good supervisor – is … contributes to the success, if I can put it that way?*

Oh Absolutely. I really do. Definitely

*Ok Good. Talking about study skills, what do you mean by study skills?*

I suppose it means knowing how to study? Isn’t that study skills?

*What does that mean then?*

Well, I think, studying is not just sitting down and reading a book and learning it parrot fashion. You’ve got to know how to study that work.

*So what specific skills?*

I suppose, Memory skills … but definitely memory skills.

*When you particularly study yourself, what skills do you specifically use? What do you do?*

I don’t know. I learn it. What do I do?

*Do you make notes? Yes*

*Do you summarise? Yes*

*Do you write it out again for yourself or not?*

No, but I use my summary notes. But I do summarise.

*Now this is really an expansion of one of the questions that you answered in the written questionnaire? How do you think the ACE programme prepared your son for where he is now?*

I think, um, it’s really just goal setting and that’s definitely being able to motivate himself very much and it’s also given him lots of self-confidence, lots and lots and lots of self-confidence. You know, he’s able to work on his own. What else? I think the big thing is that he really is able to
motivate himself. But it works double – he is able to give himself goals and work towards those goals and pace himself.

Thank you. And were there any aspects of the programme where you felt that it did not prepare him for where he is now?

The one thing that I think he battled with when he first went to varsity was writing exams. He didn’t know how to write an exam.

Ok so, was it writing skills per se or was it exams skills?

I think is was exam skills, pacing yourself time-wise, you know just what is expected of you in an exam because although they have self tests and PACE tests, it’s very, very different to an exam environment where you are writing a whole year’s worth of work, or a whole semester’s worth of work and just he’d never really written an exam before other than his SAT, ja, you know. The other thing that he said to me, in fact he said it to me just the other day, was the one thing that he found was that he hadn’t really, really learnt well was how to speak properly.

Yes, he did actually put that in his questionnaire – well, he gave himself a 3 for oral communication skills.

Did he put that in there as well?

And he gave himself a 2 for ability to write effectively, so basically what you’ve now said really confirms in a sense what he actually felt.

And yet, I think he communicates very well. But then may be that’s just …

Yes, it could be just a personality thing where, you know .... Has he had to do any presentations at university of the work that he’s doing?

Um, Just at the end of this semester they had to present a project which they put together. Um and it went fine. Beyond that, no. Not really. Not yet, anyway. I mean he works with people all day every day at work and does really well, so I think when he’s in a field that he knows …… Ja, he was chatting about it just the other day and he said oh no he doesn’t think he speaks very well at all and I said that I think you speak very well and communicate effectively but he didn’t think so

And may be he’s looking at his more social communication skills as opposed to if he was speaking about something that he knew, that he’d studied, that he’d prepared – I mean if you think about it in terms of his work, he has to speak to people all the time.

Ja

So may be it’s the social skills, although in terms of the fact that you said he was self conscious, I mean self confident, it shouldn’t really be a problem, but maybe that’s just an area where he feels a lack of confidence.

Ja, maybe it’s and also writing, may be he feels that he doesn’t communicate properly. The problem with [name of student] is that he’s always in such a hurry. ....... He know what to say but doesn’t take the time to write it down.
Did he, at school, take any elective courses or did he just take mainstream courses?

He just took the mainstream courses

So he didn’t do anything specifically directed towards his career choice or his subject choice at varsity.

There wasn’t anything on offer that I know of. I mean the computer centre wasn’t even up then so it was really just the maths and science and the languages and so on. Ja.

Did you want - I mean when he did his plan, his academic plan, did you have a specific career direction in mind at that time or was it developed over the last three years of his schooling?

It was basically developed over the last two years. In those last two years he knew exactly what he wanted to do. Or the field that he wanted to go into. And he always knew right from the beginning of the high school era that he wanted to go to university and so every day when he chose his career and he chose the credits that he could get, I mean when he chose the subjects, he chose them for the credits he could get to go to university.

Ok, so the subjects were not specifically related necessarily to his chosen career.

He sat with WB and she said well if you want to go to university then you need math, definitely math and science were the ones he needed to do and then obviously the English ….

Some graduates have said that they felt they needed more experience in some of the subject areas. How do you feel about this?

If he had had more experience in that at school, would that have helped him? Oh, yes.

And how do you think that could be addressed?

The [name of school] has a lot of electives to choose from like computers and I know what I saw. I think it’s things that we need to look at. You know what I think, personally – there are too many little ACE schools around that are trying to meet the needs of their little church, if we had less ACE schools with more kids in them, hopefully there wouldn’t be that much of a financial burden on the school and the church, and then the bigger school would be able to offer more. The schools outside, the government schools, the better government schools, can offer computer studies and this and that as electives – its just that the kids have so much more of a choice.

So you think that the smallness of the schools inhibits the development of those kind of, let’s say those interests?

Definitely. To a certain extent. I still do believe that if you have really, really motivated, sold-out, teachers, administrator, headmaster, headmistress, whatever, call it what you will, that are absolutely sold out that are passionate for the school, it will happen. The kids have to know that, I mean. I know that [name of student] says “Mom, you know that at [name of school] they offer this and this and this ” – well I know that [name of school] has been around for a couple of hundred years – and that does make a difference, but the thing is we need to be working towards those things – we do. Because it just gives the kids more of an awareness of what’s out there and ….
Did you feel or do you know if [name of student] got any really serious career guidance at all at the school?

He didn’t. No, not at all. I mean even for his SATS he had to fish it all out and find out and do for himself. For some career guidance I took him down to the technikon and even then I got the telephone number from one of the other moms.

Do you think he’s had to make up anything in terms of skills? Has he had to develop in any special ways outside of the school environment where he felt he lacked – I know you mentioned that he felt that his exam writing skills were lacking

I would say that this was probably the only area – the exam writing skills – and that type if thing, otherwise. I don’t think so. I mean he’s got the grounding. Definitely. I just feel that the thing they really need is some type of exam skills. Because when they get to university, there’s a lot of exams and it’s wonderful for the kids at school, I mean the pressure’s off, and all that kind of things, but the thing is then they suddenly get to university and then it’s - whoa what’s happened here because ….

Essay writing – does he have to do a lot of essay writing?

Now? No, lots of projects, and they write programmes on the computer and that but actual essay writing, no. I mean even in the tests, short little paragraphs, … kind of thing.

Have you had any kind of discussion with any other students who haven’t been to ACE?

You mean after ACE?

Yes, Now that he’s at varsity - What does he say they say?

No, I don’t know of any.

Now this is something that you might want to consider. What have you found that others think about the ACE programme? What have you come across?

I think it’s a … thing – I think that there are people who are absolutely sold out for it, and I think often when you find people who have had children who have had problems and are battling just to cope academically in the government schools and they come into an ACE school with smaller the attention is there but also very often those people are the people whose kids are in an ACE school that is working well. Um, I think there are a lot of people who don’t really know the system and they are the ones who are difficult but you know what it is – they are the ones who have had a bad experience with the school and so they blame the system. The system’s brilliant – it really is. And if you understand the whole picture of the ACE system, you can’t fault it. You can’t, Jacqui. It gives the kids a most amazing grounding because it establishes them in the Word of God and you cannot give a child – no matter how much academics you give them – if they are not grounded in the God’s Word, they’re going to wobble around all over the world. But if they are grounded there and then you bring in the academics as well, you can’t give them a better package. You really, really can’t.

Have you spoken to other people about where are your kids at school and what is their reaction when you tell them?

Oh yes. I was having a chat with my sister-in-law just the other day because her son is ready to go to school and she doesn’t know where to send him to school. And they live in the [name of area].
And I said to her, have you considered [name of school] and she said, “I actually have” but she said, “I don’t want to isolate him”, and I mean that is a common thing that you are isolating your kids. You are not isolating them – really you are grounding them. I mean she heard what I was saying. But I think a lot of people say but “You’re taking them out of the world” – but you are not taking them out of the world. I think a lot of the time they just lack the understanding.

So that’s even coming from a Christian parent.

That’s coming from Christian parent – I mean a radical Christian parent and she’s been a school teacher all over the show.

Now what about your experience of getting [name of student] into university?

Ha ha ha. You don’t want to know. It was a nightmare, an absolute nightmare.

Run through it for me

You know what, the university know nothing about the ACE system. What they knew was little and so it was dangerous; and they basically just said, We’re not taking any more ACE students because their performance has been unacceptable. Now that came from the admissions officer in one of the faculties, because that’s all she’d heard and that’s all she knew. She didn’t know anything about the ACE system, she didn’t know anything about the ACE schools, she’d had one in fact there was one particular student who had really, really battled and that was the one that kind of stood out for her and um she just said no we’re not, you know. And she said “Well, we might get back to you” and that was like in the September of the one year before he was due to go to varsity in the January or February of the following year and he didn’t get any kind of results from them at all until the end of January you know, and I mean it was backwards and forwards – I ended up getting hold of the guy – I can’t remember his name now – in Pietermaritzburg who was very, very into the ACE system and he was kind of the guy who was pushing and pushing and in the end I mean finally, it wasn’t a problem and when they said yes, he was in in a day and I mean that was fine. They just, I don’t know – they don’t know enough about it and even trying to go from the school to the ACE head office to the varsity was just – I don’t know – maybe it was just communication or what ever but it was a nightmare.

Have you come across anyone commenting on weaknesses of the system?

The only weakness that I’ve heard is that they learn it all parrot fashion.

Do you think they do?

Some times I think they do. I think especially things like Maths and then also Afrikaans but then also if you have a good teacher, good monitor, good supervisor, it should not be a problem, but it’s just the work – you have to work the system and if the monitor – your school’s got to have the staff otherwise the children will battle.

So you’ve got another child in the programme. Do you feel the same about him – in terms of his development, in terms of the things that he’s developed, the skills that he’s developed.

You know, Jacqui – there are so many good qualities that these kids develop coming out of a Christian environment, Christian - you know the whole thing - just growing up in the Word of God but there are other things that they don’t learn. Again I don’t think, I honestly don’t think it’s the system. I really don’t! I’m sold out for ACE.
It’s the application of the system as opposed to the system itself that you saying?

If you get a good – have a school with a brilliant headmaster sold out for ACE – and we do – we have a fabulous headmaster – he is sold out for the system, his heart is for the school – and you get a good bunch of teachers in there, monitors and supervisors, the school will fly. I think that if they can apply the system properly then you won’t have – of course there will always be the weaknesses, but often I think it’s things that kids don’t – you know you can’t expect the school to do everything.

But the little things, the monitors and the teachers. That’s my beef with the school, it’s my beef with [name of school]; it’s getting teachers there who really don’t have a heart for it, you know it’s just a job - … Like [name of other school] – the principal is passionate. Every sports meeting we go to she’s there, her kids are doing well on the whole, but they have good teaching. And you know I’m often at [name of school] here, and our teachers are coming out before the pupils.

So your main criticism is actually the application in the different school settings.

Absolutely!

So what would you change about the programme itself if you were given the opportunity?

They need more extra-curricular activities. They need more sport. Our kids don’t play sport. You know, I think that is a side of ACE that we can really, really develop. You know and I know that they really do try to do because the schools are much smaller so they try to link the schools together but if they try to focus a bit more on that, get the kids involved in sport – it’s very, very, very important because it also that also gives them – it develops their skills in other areas, you know. And, that is very lacking – I know that’s very lacking in our school. You know the other thing that I would love to see happen for our kids in the ACE system –they did it one year and it was beautiful, absolutely beautiful, it was the year, praise God, that [name of student] finished Grade 12 - we don’t do anything – and maybe again this is just our school, maybe it’s because the school is so small – we don’t do anything for our Matrics at the end of the year to make them really feel like “Wow! I’ve finished 12 years of school and it’s been a good time and praise God I’ve gotten all these skills,” and now they --- You know it’s sad we don’t do – that it’s something that’s lacking and something that – you know maybe go out for dinner or something – we need to do something, you know when [name of student] finished, all the schools got together, they went to Shongweni, to the Castle up there and they had the most beautiful dinner dance and it was so special. It really, really was. We need to do something like that.

Ok We are going to finish off now. Is there any aspect related to your experience of the programme, that you would like talk about, anything else you would like to say or do you think you’ve said it all?

I think it’s a brilliant programme. I do! We put both our boys were there. And it’s not because we didn’t have any other choice. We wanted them to - If I had another child would I put that child in the system? Absolutely. Would I put them where our boys are now? I don’t think so. I don’t, Because I don’t think – you know what , Jacqui, sometimes I look and think, “Have I really given them, have I really exposed them to everything that they deserve to be exposed to at school. Have I given them every choice, you know, and there I don’t think that – but I know that other ACE schools do offer all that maybe not as much as they could but Ja, You know.

Thank you for your time.
### APPENDIX 15: Summary of Archived Documents

<table>
<thead>
<tr>
<th></th>
<th>University</th>
<th>Course</th>
<th>Results</th>
<th>Personal strengths</th>
<th>University entrance problems</th>
</tr>
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<tbody>
<tr>
<td>D1</td>
<td>Pretoria</td>
<td>HR Management</td>
<td>Top 5 students</td>
<td>Well-organised</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
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<td>Goal setting</td>
<td></td>
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<tr>
<td>D2</td>
<td>PE Tech</td>
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<td>D3</td>
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<td>D8</td>
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<td>D12</td>
<td>DIT</td>
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<td>8 distinctions</td>
<td>Teaching myself</td>
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<td>D12</td>
<td>Stellenbosch</td>
<td>Chemical Engineering (Masters)</td>
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<td>Work ethic, Diligence, Consistent hard work, Independence, Goal setting</td>
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<td>GPA</td>
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<td>University of Syracuse USA</td>
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<td>3.7</td>
<td>Goal setting, effective study habits</td>
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<tr>
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<td>D20</td>
<td>UoFS</td>
<td>B. A (Human Movement Science)</td>
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<td>UoFS</td>
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<td>Goal setting, Excellence, Perseverance, Prudence, Diligence</td>
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<td>B. Compt</td>
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<td>B Sc</td>
<td>80% average</td>
<td>Self-discipline</td>
<td></td>
</tr>
<tr>
<td>D38</td>
<td>UoFS</td>
<td>B. Mus</td>
<td>65% +</td>
<td>Planning, Goal setting, Independence</td>
<td></td>
</tr>
<tr>
<td>D39</td>
<td>Pretoria</td>
<td>B Sc Eng</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>D40</td>
<td>NorthWest</td>
<td>B Cur (V) E</td>
<td>65% + average</td>
<td></td>
<td></td>
</tr>
<tr>
<td>D41</td>
<td>Pretoria</td>
<td>B. Eng (Industrial Engineering)</td>
<td>65%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>D42</td>
<td>NorthWest</td>
<td>B Sc Psychology</td>
<td>75% +</td>
<td>Goal setting</td>
<td></td>
</tr>
<tr>
<td>D43</td>
<td>RAU</td>
<td>B. Th</td>
<td></td>
<td>Goal setting, Independence</td>
<td></td>
</tr>
<tr>
<td>D44</td>
<td>UKZN</td>
<td>B Sc Chem</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D45</td>
<td>UKZN</td>
<td>B. Sc</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D46</td>
<td>RAU</td>
<td>B. Com (Industrial Psych)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D47</td>
<td>NorthWest</td>
<td>BA Comm Studies</td>
<td>87%</td>
<td>Consistency, Perseverance</td>
<td></td>
</tr>
<tr>
<td>D48</td>
<td>CT UoT</td>
<td>HR Management</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D49</td>
<td>University of Tennessee</td>
<td>B Com (Econ)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D50</td>
<td>?</td>
<td>B. Sc (BioChem and Psych)</td>
<td>75%</td>
<td></td>
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</tr>
<tr>
<td>D51</td>
<td>UoFS</td>
<td>B. Soc Sc</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>D52</td>
<td>UoFS</td>
<td>B Acct. (Hons)</td>
<td>Degree awarded Cum laude</td>
<td></td>
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</tr>
<tr>
<td>D53</td>
<td>Edgewood</td>
<td>B. Ed</td>
<td></td>
<td></td>
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<tr>
<td>D54</td>
<td>Rhodes</td>
<td>B. Sc</td>
<td></td>
<td>Independence, Goal setting</td>
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</tr>
<tr>
<td>D55</td>
<td>UoFS</td>
<td>B. Comm.</td>
<td></td>
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<td>D56</td>
<td>Pretoria</td>
<td>I.T.</td>
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<tr>
<td>D57</td>
<td>Pretoria</td>
<td>B Ed.</td>
<td></td>
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<tr>
<td>D58</td>
<td>Pretoria</td>
<td>B. Ed</td>
<td></td>
<td></td>
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<tr>
<td>D59</td>
<td>UoFS</td>
<td>Medicine</td>
<td></td>
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<td></td>
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<tr>
<td>Code</td>
<td>Location</td>
<td>Degree</td>
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<tr>
<td>D60</td>
<td>Pretoria</td>
<td>B. Eng</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D61</td>
<td>UoFS</td>
<td>B Soc Sc</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>D62</td>
<td>UoFS</td>
<td>Medicine</td>
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<td></td>
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</tr>
<tr>
<td>D63</td>
<td>UoFS</td>
<td>Law</td>
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<tr>
<td>D64</td>
<td>Stellenbosch</td>
<td>B. Ing</td>
<td></td>
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<tr>
<td>D65</td>
<td>Huguenot College</td>
<td>B. Diac</td>
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APPENDIX 16: Questionnaire for University Admissions Officers

27 Cunningham Road
Northdene
4093

Date as postmarked

Invitation to Admissions Officers of Tertiary Institutions that have accepted Graduates of Accelerated Christian Education to participate in a research project

Dear Sir/Madam

I am writing to invite you to participate in a research project that I hope will assist users of the Accelerated Christian Education programme to better manage and implement the programme to the benefit of their students.

Your experience of the programme will be invaluable in helping me to analyse “Perceptions of The Accelerated Christian Education Programme as preparation for Tertiary Studies” which is the topic of my Masters Dissertation. This research will provide an understanding of the programme’s effectiveness in preparing students for tertiary studies and graduates of the future will benefit from the implementation of recommendations arising from the research.

The usefulness of the study will be dependent on getting a response from as many graduates, parents of graduates and admissions officers as possible. I am therefore trusting that you will assist me.

Your part in the process will be the completion of a short written questionnaire – this will probably take a maximum of half an hour to complete.

The research proposal has been sanctioned by UNISA and my supervisor is Professor AC Lessing, Faculty of Education, UNISA. The easiest way of contacting her is via email at lessiac@unisa.ac.za, should you have any concerns about the ethical manner in which this project is conducted.

I will be contacting all participants via email (as far as possible) and have been authorised to use the Graduate Database of Accelerated Christian Education Ministries.

Confidentiality is an important part of research, and so while I will know the names of the participants through the details provided on the survey form, a numerical code will be assigned to each to ensure that participants cannot be identified when I write up my report.

I will be pleased to supply you with a copy of the findings once the study is completed.

Please note that there is no compulsion on you to participate in the study – it is entirely voluntary. You may choose to respond to all the questions in the questionnaire, only some of the questions, or indeed not to respond at all. If at any stage of the study you wish to withdraw from participation, you may do so in writing.

Unfortunately, there is no remuneration for participating in this study, since it is part of my study programme.
If you are willing to participate in this study, please complete the enclosed Consent Form as well as the Questionnaire. These should be posted back as I need your original signatures on the Consent Form. (If, however, you choose to email it back, I will take your response as granting consent.) Please let me have the forms back as soon as possible.

Please contact me if you would like to know more about this project.

I look forward to your responses.

Yours sincerely

[Signature]

Jacqui Baumgardt
Tel: 031 7083971
Cell: 084 815 2018
STATEMENT OF INFORMED CONSENT – ADMISSIONS OFFICER

Title of Project: “Perceptions of the Accelerated Christian Education Programme as preparation for Tertiary Studies”

I hereby confirm that

1. I have read and understood the information outlined in the introductory letter.
2. I understand that the study involves the completion of a questionnaire.
3. I understand that all research data will be treated as confidential.
4. I confirm that any questions I have asked have been answered to my satisfaction.
5. I agree that research data gathered for the study may be published provided that I cannot be identified as a subject.
6. I agree to participate in this study and understand that I may withdraw at any time without prejudice.

Participant’s name: _______________________________________________________________

Signature: __________________________ Date: __________________________

Statement of the Investigator

I have explained the terms of this project and the implications of participation in it to this volunteer. I believe that the consent is informed and that he/she understands the implications of participation.

Name of Investigator: Jacqueline Baumgardt

Signature

Date: 11 October 2006
QUESTIONNAIRE FOR ADMISSIONS OFFICERS OF TERTIARY INSTITUTIONS

Please answer the following questions

Name of Admissions Officer

Contact Tel. /Email

Name of Tertiary Institution

1. When did you first come to hear about the ACE programme? ____________________________________

2. Can you recall your opinion of it at that stage?
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

3. Has your opinion changed since then? Please explain.
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

4. What are your general perceptions of graduates entering your institution with the School of Tomorrow
Grade 12 College Entrance Certificate?
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

4.1 Does your institution have any reservations about admitting such students?
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

4.2 Please give the reasons for such reservations.
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

5.1 Are graduates with the School of Tomorrow Grade 12 College Entrance Certificate able to enter any of
the institution’s faculties? Yes/No

5.2 If the answer is no, which faculties are not open to them and why?
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________

6. Do you regard the Scholastic Aptitude Test (SAT) as an appropriate benchmark test for these graduates to
enter your institution? Yes/No
5. Considering the general overall performance of ACE graduates at your institution, please rate this performance on the table below: (Please tick one)

| Weak | Satisfactory | Good | Very good | Excellent |

Please provide a detailed explanation for your rating.

_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________
_______________________________________________________________________________________