

Covenant University

5

**Gender gap: Enrolment and career choices of accounting students in Nigerian universities**

“ African universities have a critical role to play in the social and economic transformation of African societies. ”

#### Abstract

This study analysed the trend of gender enrolment and factors influencing the career choices of accounting students in universities in the six geo-political zones in Nigeria. It examined the enrolment pattern of accounting students in 36 universities from 2004/2005 to 2009/2010. It also examined the factors influencing the career choices of undergraduate accounting students using data collected from sampled universities through questionnaires and focus group discussions. The results revealed a gap in enrolment between male and female accounting students, with fewer female students in the northern zones than in the southern zones. Factors influencing career choices of accounting students included job security, job availability and high salaries. It was also discovered that females perceived accounting to be rule-based, boring, stressful and narrow. The researchers recommended among others that the Nigerian Government formulate a comprehensive gender policy for tertiary education in favour of females in the northern part of Nigeria. It was also recommended that tertiary teaching staff should make accounting more interesting for students by using practical and case study methods.

## 1. Background of the study

Girls' educational opportunities in many countries are limited both in absolute terms and in comparison with those of boys. Also, striking differences have been observed between female and male enrolment at primary and secondary levels, particularly in South Asia and sub-Saharan Africa, with a wider gap at tertiary level. This situation leads to questionable continuity in female education at tertiary level. According to Randell and Gergel (2009), 'If we educate a boy, we educate one person. If we educate a girl, we educate a family and a whole nation.' Despite recommendations of international conferences, a majority of countries across the African continent have so far fallen short of meeting the United Nations (UN), Education for All (EFA) and Millennium Development Goals (MDGs).

Most African countries seem not to have embraced women's rights in the formulation of their educational policies (Adeyemi and Akpotu, 2004). Women in developed countries such as the USA, Canada and France are benefiting from expanded educational opportunities, while in Africa, cultural and economic barriers prevent women from accessing the same range of educational opportunities as those offered to men (Onokala and Onwurah, 2001). Over the past decades, the United Nations has made efforts to promote girls' and women's rights and opportunities. The United Nations' World Conferences on women held in Mexico (United Nations, 1975), Copenhagen (United Nations, 1980), Nairobi (United Nations, 1985) and Beijing (United Nations, 1995) called for the elimination of all forms of discrimination against women. The United Nations Educational, Scientific and Cultural Organization (UNESCO) led the global Education for All (EFA) movement aimed at meeting the learning needs of all children, youth and adults.

Gender inequalities in tertiary education have also been a recurring issue in much policy-making research in Africa (Onokala and Onwurah, 2001; Bunyi, 2003; Nyaigotti-Chacha, 2004; Omoike, 2010). In Africa, the contemporary education inherited from the Western world has been principally based on gender-neutral and co-educational methods of learning and knowledge production.

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In this era of globalisation, women's participation in higher education is crucial if they are to acquire the knowledge and skills needed to lead meaningful lives. Reflecting the colonial model, tertiary institutions in Africa, particularly universities, have been historically male-oriented. However, since the 1960s, tertiary institutions have expanded in line with the increase in population, resulting in higher enrolment.

In an attempt to equalise educational opportunities in Nigeria, the government implemented the free Universal Basic Education (UBE) system, which covers primary and junior secondary education. This policy has significantly improved female enrolment at primary and secondary levels. The Federal Office of Statistics (1999) reports that female enrolment at primary level rose from 43.2 per cent to 44.5 per cent between 1990 and 1998, and at secondary level from 42.7 per cent to 47 per cent. According to Adeyemi and Akpotu (2004), while enrolment at the first two levels of education is moving towards greater gender parity, examination of higher education, especially university level, seems to indicate the reverse. The Joint Admissions and Matriculation Board (JAMB) was primarily established to regulate examinations for admission to tertiary institutions in Nigeria for first degree courses. It was instituted in response to the need for a fair admission system so as to ensure an equitable distribution between sexes of the available spaces in tertiary institutions. However, JAMB does not make any special provision for female students.

Although accounting is one of the most popular courses in social sciences, prior studies have shown that there has been a decline in student enrolment in accounting programmes world-over in recent years (Gungorus and Uyar, 2010). Accounting is an important profession that could be enriched by more female participation. Naturally, low female enrolment may lead to a shortfall in the number of women available in the accounting workforce. If girls are less inclined to study this discipline, their enrolment and career choice may be impaired.

### 1.1 Statement of the problem

Studies have shown that there is no gender equity in university education in Africa, and there is need to ensure adequate representation of women in higher education (Assie-Lumumba, 2006b). Nigeria and other developing countries find it difficult to achieve equality in access

to tertiary education, especially in universities (Adeyemi and Akpotu, 2004). In Nigeria, tertiary education was reported to be almost exclusively a male affair in the late 1990s (Alao, 1998). According to Omoike (2010), globally higher education is being aligned with the wider demands of sustainable development and increased modernisation. Increasing participation in higher education has become a policy thrust and a priority of the Nigerian Government. However, there does not seem to be a comparative increase in female enrolment to that of males. Onokala and Onwurah (2001) highlighted that gender-equitable access to higher education must be an integral part of any strategy to promote long-term development in universities. Therefore, universities must be sensitised to the issue and take deliberate steps to redress the imbalance.

Female enrolment in science-based courses in Nigeria is generally low, while it is higher in the humanities. Omoike (2010) noted that 'female access and equality in university education has not been given enough sensitisation for meaningful contribution to sustainable development in Nigeria and admission to higher education has continued to be tilted in favour of males.' There is generally a wide gender gap in university enrolment in Nigeria, but the gap is wider in the sciences and science-based disciplines than in the humanities (Adeyemi and Akpotu, 2004). Similarly, it was found that there is variation in the trend and pattern of gender enrolment in the nation's universities across the geo-political zones, with wider differences existing in the northern parts of the country, which could be attributable to the cultural and religious disposition of the people. Generally, gender inequity in the Nigerian education system has been traced to a number of factors, which include the exclusion of women from career development opportunities, prejudice against women (particularly mothers), gender violence and prejudice about girls' academic abilities.

Women remain significantly under-represented in such fields of study as accounting, mathematics, applied science and engineering in the northern part of Nigeria. Eshun (1995) observed that gender inequity is a common problem in universities in both developed and developing countries, and that there is frequently a large difference in the choice of subjects between males and females. In Ghana, Ardayfio-Schandorf (1995) noted that most of the girls and women who reached university often enrolled in faculty of arts and social sciences. In Nigeria,

Onokala and Onwurah (2001) found gender disparity in various fields of study. Bunyi (2003) also discovered that the majority of tertiary institutions in Africa do not have any form of gender equality policies or interventions to increase female student enrolments.

Accounting is an important profession that requires a gender mix of male and female participants. Some studies on enrolment in this discipline were conducted about a decade ago, the bulk of which identified and reported various gender patterns in enrolment and factors influencing career choices (Simons, Lowe and Stout, 2003). However, these findings have not given us a clear picture of the Nigerian context. Despite the available literature, to the researchers' knowledge none has been able to give a comprehensive picture of accounting students' enrolment and career profiles in Nigeria. There is therefore a need to re-examine this issue in order to see how female enrolment in Nigerian accounting programmes is changing, if at all.

### **1.2 Significance and objectives of the study**

The present study provides usable data on enrolment that allows practitioners and policy-makers to address gender gaps when formulating and implementing policy. This research will unveil the factors that influence the career choices of female accounting students in Nigeria. This should enable policy-makers to implement a curriculum in the universities that takes into account the ideologies of female accounting students. There is a need to investigate students' perceptions of accounting in order to develop appropriate strategies and guidelines for the formulation of educational policy in Nigeria that could attract female students to study accounting. The study is also important in that it informs accounting lecturers and career counsellors on how students perceive accounting. This will help them to motivate the students and change their perception.

The objectives of the study are to:

1. Determine if there is a gender gap in the enrolment of accounting students in Nigerian universities.
2. Uncover the factors that influence the career choice of female accounting students in Nigeria.
3. Understand students' perceptions of accounting as a career choice.
4. Develop an advocacy programme for an education policy that can influence female career choices and encourage female admission to Nigerian universities.

### 1.3 Research hypotheses

The following alternative hypotheses were tested:

Hypothesis 1: There are gender imbalances in enrolments in Nigerian universities.

Hypothesis 2: Male and female accounting students regard accounting courses and the accounting profession differently.

Hypothesis 3: Male and female accounting students regard the factors that influence their career choices differently.

Answers were thus sought to the following research questions:

1. To what extent is gender inequality an issue in undergraduate students' enrolment in Nigerian universities?
2. How do students perceive accounting and the accounting profession?
3. What are the factors that influence the career choices of female accounting students in Nigeria?

### 1.4 Limitations of the study

The study focuses on accounting students in 36 universities in Nigeria. It might therefore be difficult to generalise the findings of the study on enrolment and career choices of accounting students to all Nigerian universities. A sample including students from other universities might result in different outcomes. Considering the opinions of non-accounting students could also result in different responses. This does create opportunity for further research. This work could be extended to include more students from other disciplines in different universities.

## 2. Literature review

### 2.1 Nigeria and tertiary education

Nigeria is located in West Africa, bordered on the north by Niger, on the west by Benin, and on the east by Chad and Cameroon. It is the most populous nation in Africa and gained independence from Britain in 1960. Since then, there has been a drive towards economic development. The country has experienced a tremendous increase in its population and in its tertiary education institutions. At the time of independence, the population of Nigeria was estimated at 39.2 million but the last census conducted in 1996 revealed a figure of around 140 million (71.7 million males and 68.3 million females).

The first tertiary education institution, University of Ibadan, was established in 1948. At independence in 1960, Nigeria had only two universities. Substantial expansion of tertiary education in Nigeria has widened access, especially given the increased private sector participation. Presently, the country has 117 universities: 36 federal, 36 state and 45 private (NUC, 2011). Yet, an increasing number of students are demanding access to university education (Emodi, 2010).

The Nigerian Government has put policies in place to address the problem of inadequate access to university education. Admission to a higher education institution in Nigeria involves passing the Unified Tertiary Matriculation Examination (UTME) exam and post-UTME exam in the candidates' choice of institution. The cut-off mark for each discipline is based on the average performance of students in the exam, and JAMB, the central body in charge of admission to tertiary institutions in Nigeria, then produces the list of admitted candidates. JAMB recognises three criteria for admission to federal institutions: merit (45 per cent), catchment (35 per cent) and educationally less-developed states (20 per cent).

There are other means of gaining admission into tertiary institutions, which include obtaining a diploma, or pre-degree or direct entry. Admission through a diploma is at the discretion of the higher education institutions. Universities' individual admission procedures permit admission officers to admit students based on their compliance with the other entry requirements. However, university entry through a diploma is more expensive than admission through JAMB. Private and state-owned universities also have their own policy guidelines for admission (Asein and Lawal, 2007).

### 2.2 Women in Nigerian universities

In support of increased female enrolment, some African countries have adopted intervention mechanisms to ensure that females stand an equal chance of being admitted to tertiary institutions in the course of their choice. These interventions have included affirmative action in public universities to lower required admission scores by one point for women (Kwapong, 2007). Similarly, Bunyi (2004) discusses an intervention in African universities to lower admission cut-off points for female students since few females attain marks that are high enough to compete with their male counterparts.

Nigeria currently operates a quota system with respect to enrolment in undergraduate programmes in universities. Yet an observable gap in the admission policies mentioned above is that gender is not considered a priority in selection criteria. Gender could be factored into admission criteria for diploma courses, known as foundation courses in some Nigerian universities. However, as diploma admission is more costly than admission through JAMB, where female students have adequate financial support, enrolment through a diploma may not be a feasible option.

Omoike (2010), Adeyemi and Akpotu (2004), Onokala and Onwurah (2001) discuss gender equality in tertiary education enrolment in Nigeria and intervention strategies to deal with gender inequality.

According to Omoike (2010), there has been a growing belief that the rate of admission of candidates to universities through JAMB has been tilted in favour of males. As of 2005, the total female undergraduate enrolment in Nigerian universities was 285,179 out of 780,001 (National Bureau of Statistics, 2009). This has serious implications for policy-makers because it implies that only 36.6 per cent of the students enrolled in 2005 were female. Overall enrolment is guided by the limits approved by the National Universities Commission (NUC), which conforms to the 70:30 science/arts ratio recommended by the Federal Government (Asein and Lawal, 2007).

Onokala and Onwurah (2001) found that gender inequity is an issue in all faculties in Nigerian universities, implying that undergraduate student enrolment in Nigerian universities is not equally distributed between the sexes. They noted that in Nigerian universities, the highest percentages of female enrolments were in the faculties of Science, Arts, Education and Social Science. However, their study found that males dominated in scientific and technical fields, which were most likely to lead to high paying and powerful positions. On the other hand, more females were found in the education and arts faculties, which could be considered to follow the traditional conception of the role of women as mothers and wives. Similarly, in relation to public universities, Ahmad (2009) found that although female enrolment increased from the year 1995 through 2000, 2005 and 2007, females were more inclined to specialise in courses traditionally considered more suitable for women, such as arts and education.

Adeyemi and Akpotu (2004) examined gender disparity in university enrolment in selected disciplines according to geo-political zones. The findings revealed a gap between female and male students in the science-based disciplines and between northern and southern zones, with lower female enrolment in the north than in the south.

Fennema, Wolleat, Pedro and Becker (1981) identified the prerequisites for increasing opportunities for women in scientific and technological careers. Female students must obtain the high school mathematics requirement that prepare them for entry to mathematics-related occupations, as well as appropriate secondary school knowledge in book-keeping and accounting. They should also have guardians and counselors to shape their development. This implies a need for more qualified accounting teachers in secondary schools.

Bunyi (2003) argued that there are three dimensions to the problem of low enrolment for female students compared to males: overall low enrolment; even lower enrolment at higher degree levels; and low enrolment in science, mathematics and technology subjects. With respect to low overall enrolment, Fletcher (2006) proposed an intervention strategy to expand scholarship and loans programmes funded by the federal and state governments, or by individual colleges and universities to offer financial support to students.

Kwapong (2007) noted that the distance education mode, as proposed in Ghana, might enable more women to gain access to tertiary education through offering greater flexibility and solutions to time and other constraints that women typically struggle with. This study showed that, in Ghana, 63 per cent of distance learning students were female against 37 per cent males, implying that distance education favours the enrolment of females in tertiary institutions.

### **2.3 Accounting at tertiary level in Nigeria**

The Nigerian university system has aligned itself to wider demands of economic development (Omoike, 2010). This has led to the development of the accounting profession (Aruwa, 2008). Accounting as a discipline has a vital role to play in the economic development of any nation. During the colonial era, before the 1960s, Nigerian accountants were mostly based abroad; there were very few accountants within the country. Accountants were



in high demand by business organisations. Accounting did not appear as a university course until 1960 when the University of Nigeria, Nsukka, was established. Presently, a total of 53 universities are offering accounting courses in Nigeria. Polytechnic colleges also offer accounting courses.

Accounting is also a professional course. For this reason, there are educators outside tertiary institutions that train candidates in preparation for professional accountancy exams. In Nigeria there are two professional accounting bodies: the Institute of Chartered Accountants of Nigeria and the Association of National Accountants of Nigeria. Members of these bodies have tutored and trained many students even though they are not degree-awarding institutions. This group of institutions is not the focus of this research.

One of the challenges of accounting at tertiary level in Nigeria is that not every institution offers it as a course. Currently, accounting in tertiary institutions is a four-year course, during which students undertake studies in auditing, management accounting, financial accounting, public sector accounting, taxation and other special areas such as forensic accounting and oil and gas accounting.

#### **2.4 Students' perceptions of accounting as a career choice**

Simons, Lowe and Stout (2003) did a comprehensive study on research focusing on factors influencing students' choice to pursue accounting. They stated that several factors have been proposed in both theory-based and non-theory-based studies as influencing students' choice of accounting as a major. The results of this study revealed that the relative importance of factors affecting choice of major are mixed and somewhat difficult to compare because different studies used different terms for what appear to be the same or similar factors.

Students' perceptions of the accounting profession are myriad and diverse. These are classified according to several attributes using the following six categories (Sugahara and Boland, 2006): perceived skills needed for success in accounting professions; human influences; intrinsic value; career prospects; job market factor; and opportunity cost of becoming accountants.

These attributes and categories were mainly selected from previous literature regarding both career choice within the accounting profession and students' choice of majoring in accounting.

Applying Super's theories to accounting, DeCoster and Rhode (1971) and Buckley and McKenna (1973) discovered that accounting students regard accountants more positively and favourably than do the general public. However, Taylor and Dixon (1979) found that non-accounting business students have a generally less positive image toward the accounting profession compared to students who study accounting majors.

Cohen and Hanno (1993) used the theory of planned behaviour (TPB), which specifies the relationships between beliefs about outcomes, social pressures and behavioural control, and reported that these variables helped predict choice of major. They found that accounting students ranked high earnings and advancement, and having a career in an exciting field as the main motivating factors in choosing accounting as a major. Furthermore, having mathematical skills and being successful in accounting courses were identified by students as determinant factors in choosing accounting as a major.

Adams, Pryor and Adams (1994) conducted research on career choice among 238 accounting and non-accounting major students from a single institution. The results revealed that the most significant factors influencing the choices of students majoring in accounting included job opportunities, high earning potential, and genuine interest in the subject; while for students majoring in non-accounting subjects only genuine interest in the subject was selected as a primary influencing factor. Less emphasis was placed on earning and/or job opportunities.

Accounting professional bodies and academia have struggled to understand why the accounting profession remains unpopular among the brightest business students (Sugahara and Boland, 2006). Hermanson, Hermanson and Ivancevich (1995) investigated the effectiveness of influential factors on students' career choices and concluded that the greatest influential power basically derived from students' perceptions of the accounting profession.

In studies by Saemann and Crooker (1999), students were found to be more likely to find the accounting profession interesting when they did not perceive it to be rule-oriented, highly structured or solitary. Students were also much more likely to choose an accounting major when they considered accounting to be interesting. Mauldin, Crain and Mounce (2000) stated that the primary factors influencing choice of subject major are interest in the subject's career opportunities, instructor, parents and money. Of these factors, the instructor in principles of accounting was viewed as the most influential.

AICPA's Taylor Group Report (Taylor, 2000) identifies the factors causing a downturn in number of accounting majors and the need to devise means to reverse this trend. The study found that most students were ignorant of the career opportunities available to accounting majors and had limited knowledge of the work performed by accountants. It also found students' interest in accounting to be low. Students also had negative perceptions about the nature of accounting work itself. They viewed accountants as boring and tedious, and their work as monotonous, solitary number-crunching. Albrecht and Sack (2000) conducted research to determine what factors have affected enrolment in accounting programmes. They concluded that potential accounting candidates are usually misled by guidance counsellors and teachers, and that accounting courses should be blamed for shortages in accounting majors.

In a study carried out by Belski, Richmond and Brozovsky (2003), the lack of prestige attached to the accounting professions was considered to be a dissuading factor for students. However, prior education or greater information dissemination about accounting as a discipline might entice more students to show an interest.

### **2.5 Women and accounting**

Some of the studies mentioned above (Adams, Pryor and Adams, 1994; Saemann and Crooker, 1999; Mauldin et al., 2000; Taylor, 2000; Albrecht and Sack, 2000) lack theoretical basis and do not consider gender issues. Indeed, few studies have explored the influencing factors in relation to gender (Lowe, Lowe and Simons, 1994 and 1995; Lowe and Simons, 1997; Leppel, Williams and Waldauer, 2001; Thibodeau and Usoff, 2002; Heiat and Brown, 2007).

Lowe et al. (1994) investigated the role of gender in choosing a career in accounting. They found that the intrinsic rewards of the profession were more important to female accounting majors, while their male counterparts are more attracted by the extrinsic rewards. Lowe and Simons (1997) conducted a more elaborate survey among business students (accounting, marketing, finance and management majors). The factors influencing career choice included earning potential, association with others in the same professional field, parents, the cost of education, social status, job satisfaction, years of education, aptitude, teachers, peers, work experience and job availability. Accounting majors were distinctive in placing most emphasis on future earnings and career options. In addition, they found that female accounting majors ranked the inherent nature of the subject matter as more important than their male counterparts. These findings are in line with previous studies carried out by Lowe et al. (1995), who discovered that female accounting majors cited interesting subject matter as the paramount factor.

Heiat and Brown (2007), in their study on the underlying factors affecting the choice of major, found that students are most strongly influenced by a genuine interest in the subject matter regardless of both subject and gender. Both sexes were neutral regarding their perception of public accounting as an interesting profession. However, regarding availability of employment, males were more strongly influenced than females. This was attributed to the fact that society still tends to look upon males as the primary source of support in a family, and that more women leave the work force than men to bear and raise children.

Leppel et al. (2001) found that a professional father has more influence (in the sense of giving female students advice and direction) on female students than a professional mother, though the opposite was the case for males. Thibodeau and Usoff (2002) found that career opportunities were the top reason given by both male and female accounting students for choosing accounting as a career, but while males listed future earnings in second place, females cited interesting subject matter. These findings corroborate with those of Lowe et al. (1994) and Lowe and Simons (1997).

Belski, Richmond and Brozovsky (2003) found that female accounting students viewed accounting as a more prestigious profession than did their male counterparts.

They claimed that female students have developed a more favourable impression of the accounting profession over the past year than male students.

The common perception that accounting is demanding, boring, unimaginative, asocial and related to science and mathematics courses may discourage female candidates from choosing accounting as a career pathway (Shackleton, 1980). Some of the common beliefs about the difficulties that such a professional environment creates for women are undoubtedly true. For instance, the heavy workload can mean long hours during busy seasons, while increasing specialisation in areas including accountancy, management consultancy, audit and assurance services, tax consultant, forensic accounting and accounting information systems means increased travel, which is difficult and demanding, particularly for women with family obligations. Profitability issues are important to all firms, especially in light of reduced growth rates and legal liability pressures. This environment nurtures a work ethic, for which long working hours and heavy workloads have traditionally set the standard.

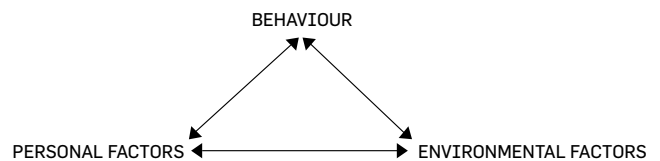
Thus, it has been concluded (Hooks and Cheramy,1994) that high turnover among women continues to be a result of their personal decision to withdraw from a demanding career environment. The authors further support this conclusion as gender parity seems solid at the entry level. The research was part of a study conducted by the Women and Family Issues Executive Committee of the American Institute of Certified Public Accountants (AICPA). Some partners perceived that one can assume that since women have constituted about half of the new recruits in public accounting in recent years, the problems that can be influenced by individual firms' behaviour have been resolved (Hooks and Cheramy,1994). However, many partners believed the primary remaining issues—turnover and retention—were beyond their control because it resulted from women's personal choices regarding their career and family. Survey data collected in another phase of the study suggested that this and other misperceptions actually might contribute to the remaining upward mobility problems. Such data are important because firm leaders who are misinformed about the status and attitudes of half of those entering the profession may not always be able to attract and retain some of the profession's most talented people.

### 3. Social cognitive theory of gender development

Canadian psychologist Albert Bandura pioneered social cognitive theory (SCT) in 1963. Social cognitive theory posits that individuals contribute to their self-development and social change through their agentive actions within the interrelated systems of influence (Bandura, 1977; 1986; 1997). It developed out of the social learning theory of Miller and Dollard (1941), which failed to take into account the creation of new responses or the processes of delayed and non-reinforced imitations.

SCT views human behaviour as a triadic, dynamic and reciprocal interaction of personal factors, behaviour and the environment (see Figure 2.3). These three factors are constantly influencing one another and all work together to create learning. SCT posits that individuals have a self-system that makes them exercise a measure of control over their thoughts and actions. This self-system houses individuals' affective and cognitive structures, which enable them to learn from others, plan alternative strategies, regulate their own behaviour and engage in self-reflection to achieve an expected outcome. It also explains how people acquire and maintain certain behavioural patterns while also providing the basis for intervention strategies (Bandura, 1997).

**Figure 2.3. A triadic reciprocity**

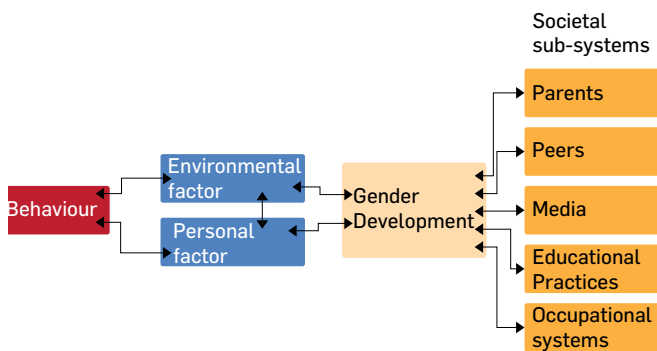


Adapted from Bandura, 1986.

The contribution of SCT as a relevant theoretical framework for understanding career development can be found in various studies (Lent, Brown and Hackett, 1994; Hackett, 1995; Lent and Maddux, 1997). Its contributions to gender development can also be found in the work of Bussey and Bandura (1999). Bandura's social cognitive approach to learning has formed the crux of this study's theoretical framework. Environmental and personal factors influence gender development, while societal sub-systems (parents, peers, media, educational practice and occupational systems) impact on gender development. The factors are as illustrated in Figure 2.4 and discussed thereafter.



**Figure 2.4. Conceptual model: Social cognitive theory, career choice and gender**



### 3.1 Environmental factors

Environment is one of the factors that can influence a person's behaviour. Bandura believes that people are both products and producers of their environment (Bandura, 1986). An individual's behaviour will determine the aspects of their environment to which they are exposed, and behaviour is, in turn, modified by that environment (Bandura, 1989). Bussey and Bandura (1999) expounded on the concept of environmental structures and gender development based on the distinction in SCT between three types of environmental structures, including the selected environment, the constructed environment and the imposed environment (Bandura, 1997). Selected environments are choices of activities, associates and educational pursuits (Lent, Brown and Hackett, 1994). Constructed environments are constructs of social and institutional systems through their generative efforts (Maccoby, 1990), while imposed environments are certain physical and socio-structural conditions, e.g. mandated academic curricula. These environments (selected, constructed and imposed) partly determine which forms of one's behaviour are developed and activated (Bandura, 1999).

In SCT, gender development in any environment is promoted by three major modes of influence and the way in which the information they convey is cognitively processed (Bussey and Bandura, 1999). These modes of influence are: (i) modelling; (ii) enactive experience; and (iii) direct tuition. These different modes of influence operate in complexly interactive ways and they are oriented toward promoting the traditional forms of gendered conduct.

A great deal of gender-linked information is illustrated by models in one's immediate environment, including

parents, peers, mass media, teachers, and other significant persons in social, educational and occupational contexts (Bussey and Bandura, 1999). SCT characterises learning from exemplars as modelling. Modelling is the most powerful and pervasive means of conveying thoughts, values, attitudes and patterns of behaviour (Bandura, 1986; Rosenthal and Zimmerman, 1978). Modelling serves a variety of functions in gender development. Most theories of gender development assign a major role to modelling in gender-role learning (Bandura, 1969; Kohlberg, 1966; Mischel, 1970). Under forced exposure to a single model, children attend to and learn equally the behaviour of same-gender and other-gender models. When children can select the models with which to associate themselves, the selective association produces even greater differences in what is learned observationally (Bandura, 1986).

Enactive experience is defined as learning gender-linked behaviour through certain situations. Enactive experience can also be seen as the process by which gender-linkage of conduct can be discerned from the outcomes resulting from one's actions (Bussey and Bandura, 1999). The range of enactive experience can vary from explicit reactions to less direct reactions. Gender-linked behaviour is heavily socially sanctioned in most societies. Evaluative social reactions act as important sources of information for constructing gender conceptions. People generally have views about what is appropriate conduct for boys and girls. The wider the type of people and social systems a person is exposed to and interacts with, the more diverse the types of outcomes he/she experiences for various types of gender-linked conduct (Zimmerman, 1989).

Direct tuition is a mode of influence on gender conceptions that is derived from the tutelage of persons in one's social environment. It is when a child about gender through a tutor. Gender roles and conduct can be affected positively or negatively by direct tutoring. It is a means of informing people about different styles of conduct and their linkage to gender. Direct tuition is most effective when it receives widespread social support and is based on shared values. Models, most of the time, do not practice what they preach. The impact of direct tuition is undermined when what is being taught is not in consonance with what is modelled (Rosenhan, Frederick and Burrows, 1968; Hildebrandt, Feldman and Ditricks, 1973).

### 3.2 Personal factors

Personal factors regulate attentional processes, schematic processing of experience, motivation, emotional activation, psychobiological functioning and the efficacy with which behavioural and cognitive competencies are executed in daily life transaction (Bandura, 1999). SCT posits that, in the course of development, the regulation of behaviour shifts from predominately external sanctions and mandates to gradual substitution of self-sanctions and self-direction grounded in personal standards (Bandura, 1986 and 1991a). To exercise self-influence, people have to monitor their behaviour and the situational circumstances in which they find themselves. As children become aware of the social significance attached to gender, they increasingly attend to this aspect of their behaviour (Serbin and Sprafkin, 1986). In mixed-sex groups, children are more likely to monitor behaviour according to its gender linkage. According to Martin (1993), girls monitor their behaviour on the gender dimension more closely than boys because they are more likely to be reproached for conduct that deviates from their gender.

From the agentic socio-cognitive point of view, 'people are self-organising, proactive, self-reflecting, and self-regulating not just reactive organisms shaped and shepherded by external events' (Bandura, 1999). According to Bandura (1997), human agency in social cognitive theory, people base their actions on self-efficacy in risky situations. People avoid potentially threatening situations and activities basically because they are of the opinion that they will not cope with the risky situation. Self-efficacy represents the confidence one has in exercising control over challenging situations such as resisting temptation, coping with stress, and mobilising the resources required to meet the situational demands.

According to Bussey and Bandura (1999), occupational pursuits are extensively gendered. Female students have efficacy for female-dominated occupations, but are less efficacious in educational and occupational pursuits traditionally male gendered. In contrast, male students have a comparable sense of efficacy for both traditionally male-dominated and female-dominated requirements and job pursuits (Betz and Hackett, 1981; Bussey and Bandura, 1999). According to Matsui, Ikeda and Ohnishi (1989), women that are highly feminine usually lack confidence in their quantitative capabilities

and believe that there are few thriving female models in traditionally male-dominated occupations. Perceived beliefs about gender-determined efficacy contribute more heavily to occupational preferences than beliefs about the benefits attainable by different pursuits. Wheeler (1983) commented that some women base their occupational preferences even more heavily on their perceived efficacy than on the potential benefits that the vocations yield. Women need to develop high efficacy in science-related and demanding careers such as accounting along with family responsibilities (Betz and Hackett, 1981).

Junge and Dretzke (1995) highlighted that gender differences disappear when women judge their effectiveness to perform the same activities as men in everyday situations in stereotypically feminine tasks rather than in male-dominated occupations. Women's beliefs about their capabilities and their career aspirations are shaped by undermining social practices within the family, the education system, peer relationships, the mass media, the occupational system and the culture at large (Bussey and Bandura, 1999). The practices of these societal sub-systems are further discussed in greater detail below.

### 3.3 Societal sub-systems

In this theoretical perspective, gender conceptions and roles are the products of a broad network of social influences operating interdependently in a variety of societal sub-systems. As children mature, they are cognitively adept at discerning the gender linkage of interests and activities as their social world expands. This section discusses the influential role played by each of the various societal sub-systems in the differentiation of gender attributes and roles. These sub-systems are parents, peers, media, educational and occupational practices.

#### 3.3.1 Impact of parents

Parents play an active role in setting the course of their children's gender development by structuring, channelling, modelling and reacting to gender-linked conduct. Parents are primarily children's role models. As children develop, parents instruct their children in gender-linked conduct and roles. Thomas and Neal (1978) emphasised that parents and gender influence the choice of career and occupation of their children. Some parents judge school to be more difficult for their

daughters than for their sons, even though they do not differ in actual academic achievement (Phillips and Zimmerman, 1990). Steinberg (1996) emphasised that family plays an influential role in children's success in school. Children's beliefs in their efficacy, their academic aspirations and perceived occupational capabilities are influenced by their parents' sense of efficacy to promote their children's development. Eccles (1989) found that parents generally subscribe to the cultural stereotype that boys are more naturally endowed than girls for quantitative subjects.

### 3.3.2 *Impact of peers*

Peers are sources of much social learning. As children's social world expands outside the home, peer groups become another agent of gender development. In social cognitive theory, the peer group functions as an interdependent sub-system in gender differentiation, not a socially disembodied one (Bandura, 1986). Peers are both the product and the contributing producers of gender differentiation. They model and sanction styles of conduct and serve as comparative references for appraisal and validation of personal efficacy (Schunk, 1987; Bandura, 1997). In the social structuring of activities, children selectively associate with same-sex playmates and pursue gender-typed career interests and activities (Huston, 1983). Bussey and Bandura (1999) concur that it is socially instilled orientations that lead peers to instate gender differentiation by favouring same-sex playmates and making sure that their peers conform to the conduct expected of their gender.

### 3.3.3 *Impact of the media*

The media is another primary setting for developing gender orientation. Thomson and Zerbinos (1997) claimed that children are continually exposed to models of gender-linked behaviour in readers, storybooks, video games and representations of society on television. Males are generally portrayed as directive, adventurous, enterprising and individuals that pursue engaging occupations and recreational activities. In contrast, women are usually shown as acting in dependent, unambitious and emotional ways (Bassegy and Bandura, 1999). Male and female televised characters are also portrayed as differing in agentic capabilities. Men are more likely to be shown exercising control over events and pursuing careers of high status, in contrast to women who tend to be more at the mercy of others and are largely confined to domestic roles or employed in low status jobs (Durkin, 1985). For both sexes, these

occupational representations neither fit the common vocations of most men nor the heavy involvement of women in the workplace in real life (Seggar and Wheeler, 1973).

### 3.3.4 *Impact of educational practices*

The school is the place where children expand their knowledge and competencies and form their sense of intellectual efficacy, which is essential for effective participation in the larger society. The self-beliefs and competencies acquired during this formative period carry especially heavy weight because they shape the course of career choices and development. Even as early as in secondary school, children's beliefs in their occupational efficacy are rooted in their patterns of perceived efficacy (Bandura et al., 1999). Stereotypic gender occupational orientations are very closely linked to the structure of efficacy beliefs. Boys perceive themselves to be more apt for careers in science-related courses, while girls judge their occupational efficacy to be more for service, clerical, nursing and teaching jobs.

### 3.3.5 *Impact of occupational systems*

The gendered practices are also exhibited in organisational structures and practices. These include extensive segregation of jobs along gender lines, concentration of women in lower-level positions, inequitable wages, limited opportunities for upper-level mobility and glass ceiling barriers (Stockard and Johnson, 1992). Women are entering the workforce in large numbers, not merely for economic reasons but as a matter of personal satisfaction and identity. Many have the personal efficacy, competencies and interests to achieve distinguished careers in occupations traditionally dominated by men. However, women are also represented in the informal sector. While the constraints to gaining entry into such careers have loosened, women still face obstacles in their professional progression (Jacobs, 1989). Women in traditionally male-dominated occupations are evaluated more negatively than women in traditional occupations or men in female-dominated occupations (Pfof and Fiore, 1990). They are not viewed as positively or as competent as men of comparable skill in the same positions (Alban-Metcalf and West, 1991). The challenge in changing gender roles lies in how to strike a balance between family and professional demands for women who enter the workforce. More equitable systems require personal as well as socio-structural changes. Given the pervasive negative sanctions for males performing domestic activities

from the symbolic play in childhood to adulthood, these gender socialisation practices produce males with low perceived efficacy to manage the combined demands of paid work and parenthood (Stickel and Bonett, 1991). Most elude the difficulties of juggling these roles by staying clear of housework and childcare.

## 4. Research methodology

### 4.1 Research design

The study used a combination of quantitative (survey) and qualitative (focus group discussions) approaches. The sampling for the survey was done using a purposive approach under the framework of the stratified random sampling technique. The sampling frame for this study consisted of 117 universities divided into 36 federal universities, 36 state universities and 45 private universities. The selection was made based on the geo-political zones in Nigeria, type of university (federal, state and private) and age of the university – i.e. universities of five years or over. Nigeria is made up of six geo-political zones, each of which is taken as a stratum. The geo-political zones in the north are north-east, north-west and north-central, while those in the south are south-south, south-east and south-west. Thirty-six universities were selected for data collection, while seven were randomly selected in the north and south for the fieldwork – four federal, two state and one private.

**Table 2.8. List of sampled universities and their abbreviations**

AAU	Ambrose Alli University
AKSUTECH	AkwaIbom State University of Science and Technology
AL-HIKMAH	Al-Hikmah University
BABCOCK	Babcock University
BAYERO	Bayero University
BELLS	Bells University of Technology
BINGHAM	Bingham University
BIU	Benson Iadahasosa University
BOWEN	Bowen University
BSU	Benue State University
CARITAS	Caritas University
COVENANT	Covenant University
DELSU	Delta State University
ESUTECH	Enugu State University of Technology
GSU	Gombe State University
IMSU	Imo State University
KASU	Kaduna State University

LASU	Lagos State University
NDU	Niger Delta University
NOVENA	Novena University
NSU	Nasarawa State University
OAU	ObafemiAwolowo University
OOU	OnabisiOnabanjo University
RSUST	Rivers State University of Science and Technology
RUN	Redeemers University
UDU	UsmanuDanfodio University
UNAD	University of Ado-Ekiti
UNIABUJA	University of Abuja
UNIBEN	University of Benin
UNILLORIN	University of Illorin
UNILAG	University of Lagos
UNIMAID	University of Maiduguri
UNIPORT	University of Port Harcourt
UNIUYO	University of Uyo
UNN	University of Nigeria
WUKARI	Wukari Jubilee University

### 4.2 Study instruments and sources of data

Primary data was collected through three study instruments – two designed questionnaires and a field guide containing open-ended questions for the focus group discussions (FGDs). The first questionnaire was completed by the registry department or academic planning unit at each of the universities. The second questionnaire was completed by undergraduate students in the department of accounting in 2010/2011 across all academic levels. The second questionnaire was designed to determine the factors that affect students' choice of accounting as a career. One section consisted of students' biodata, while the other consisted of enrolment numbers from academic years 2004/2005 to 2009/2010. The questionnaire also featured sub-sections capturing factors related to perceptions regarding the characteristics of accounting as a discipline; the benefits of a career in accounting; the constraints of a career in accounting; discrimination in the accounting profession; and career choice motivation; as well as career aspirations after graduation. Respondents were asked to rate these factors or attributes on a five point likert scale.

The field guide was used to facilitate two focus group discussions consisting of female students in two of the seven selected universities – in the south-south and south-west geo-political zones at the University of Benin (UNIBEN) and Covenant University. The

research team had intended to conduct an FGD session in three universities, this became very difficult as a result of political upheaval in the geo-political zones in the northern part of Nigeria during the fieldwork. The FGDs featured questions pertaining to the perceptions of accounting as a discipline, the perceived benefits of accounting as a career, the perceived constraints of accounting as a career, the perceived discriminations within the accounting profession, factors influencing students' choice to pursue a career in accounting and career aspirations after graduation.

Secondary data for academic years 2004/2005 to 2009/2010 on the gender pattern of undergraduate students' enrolment in Nigerian universities was collected from the NUC and JAMB headquarters in Abuja; the registrar's office, academic planning unit and accounting departmental student file in each of the seven universities studied; and the Federal Ministry of Education in Abuja. Enrolment data was collected from these multiple sources to ensure data validity, while the focus group discussions were also used to improve the external validity.

## 5. Findings of the study

This section is divided into three parts—the first presents data on enrolment; the second presents findings on career choice; while the last part presents a summary of findings.

### 5.1 Enrolment by geo-political zone, gender, university type and institution

Table 2.9 shows the enrolment of female students in accounting programmes in 36 Nigerian universities between the 2004/2005 and 2009/2010 academic sessions. In the 2004/2005 academic session, eleven

institutions had over 50 per cent female enrolment in their accounting programmes. Of these, three had more than 70 per cent female enrolment in accounting. The following academic year, the number of institutions with over 50 per cent female enrolment in accounting programmes rose to 13, with two of these admitting more than 70 per cent female to their accounting programmes. For the 2006/2007 academic session, only one university had more than 70 per cent females enrolled in accounting programmes, while a further 13 had 50 per cent or more female accounting students. In 2007/2008, the number of institutions with over 50 per cent female enrolment in accounting studies reached 22, with five of these recording more than 70 per cent female students in accounting programmes. The following academic session – 2008/2009 – the number of universities with women representing 50 per cent or more of enrolments in accounting dropped to 14, with just one of these reaching over 70 per cent of female enrolment. In 2009/2010, a total of 23 universities had at least 50 per cent female enrolment in accountings programmes, with four of these reaching more than 70 per cent female enrolment.

The data show a gender gap in favour of male students in enrolment of accounting students in universities in the northern part of Nigeria. This may be due to some religious and cultural restrictions against girls in certain parts of the north, especially among the Muslims population, which in some cases is quite resistant to western education, particularly for girls. In addition, the data reveals that more females enrolled in accounting programmes in private universities. This could be because private universities provide better infrastructure, regular academic sessions, and conducive learning environments, among other advantages, and therefore girls find them more attractive.

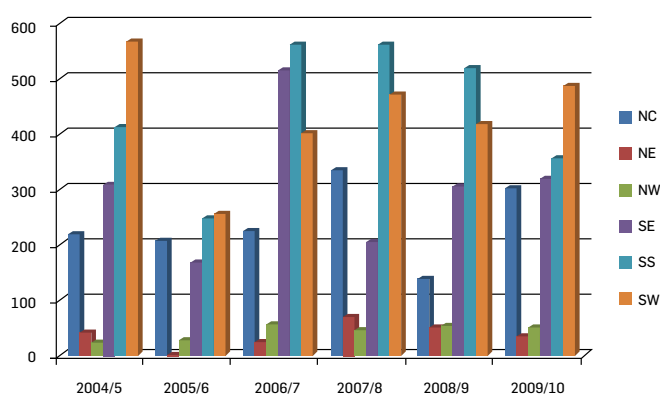


Table 2.9. Enrolment by geo-political zone, gender, university type and institution, 2004/05-2009/10

Type	2004/2005			2005/2006			2006/2007			2007/2008			2008/2009			2009/2010			Grand total				
	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T		
<b>North - central</b>																							
1	BSU	S	37	138	175	55	96	151	26	95	121	56	126	182	60	126	186	69	171	240	303	752	1,055
2	UNILLORIN	F	55	62	117	38	31	69	143	166	309	77	86	163	5	8	13	43	58	101	361	411	772
3	NSU	S	23	65	88	19	46	65	N/A	N/A	N/A	37	58	95	13	42	55	57	97	154	149	308	457
4	UNIABUJA	F	105	106	211	94	149	243	38	56	94	124	142	266	12	18	30	123	132	255	496	603	1,099
5	BINGHAM	P	N/A	N/A	N/A	2	3	5	8	7	15	18	17	35	32	29	61	5	5	10	65	61	126
6	AL-HIKMAH	P	N/A	N/A	N/A	N/A	N/A	N/A	10	8	18	24	30	54	37	30	67	6	9	15	77	77	154
<b>North - east</b>																							
7	UNIMMAID	F	43	114	157	N/A	N/A	N/A	20	39	59	62	112	174	46	82	128	17	18	35	188	365	553
8	GSU	S	N/A	N/A	N/A	N/A	N/A	N/A	4	12	16	5	14	19	5	44	49	17	36	53	31	106	137
9	WUKARI	P	N/A	N/A	N/A	N/A	N/A	N/A	1	3	4	4	15	19	0	3	3	N/A	N/A	N/A	5	21	26
<b>North - west</b>																							
10	KASU	S	N/A	N/A	N/A	5	22	27	6	13	19	9	9	18	13	46	59	8	42	50	41	132	173
11	BAYERO	F	18	64	82	19	63	82	20	76	96	28	95	123	34	95	129	38	84	122	157	477	634
12	UDU	F	6	17	23	5	22	27	11	24	35	10	33	43	7	36	43	5	27	32	44	159	203
<b>South - east</b>																							
13	ESUTECH	S	129	82	211	58	40	98	124	76	200	120	52	172	83	46	129	139	80	219	653	376	1,029
14	CARITAS	P	52	21	73	22	16	38	33	24	57	42	20	62	14	5	19	3	3	6	166	89	255
15	UNN	F	N/A	N/A	N/A	30	48	78	75	101	176	12	14	26	58	62	120	107	96	203	282	321	603
16	MSU	S	129	46	175	58	49	107	84	66	150	34	18	52	151	78	229	71	38	109	527	295	822
<b>South - south</b>																							
17	UNIUYO	F	96	75	171	19	12	31	34	56	90	45	65	110	22	43	65	32	36	68	248	287	535
18	AKSUTECH	S	78	73	151	100	69	169	167	91	258	154	78	232	67	33	100	69	48	117	635	392	1,027
19	NDU	S	76	112	188	21	60	81	33	48	81	46	70	116	53	59	112	N/A	N/A	N/A	229	349	578
20	DELSU	S	59	74	133	17	43	60	23	36	59	17	16	33	41	43	84	16	18	34	173	230	403
21	AAU	S	26	30	56	27	49	76	91	100	191	66	71	137	145	145	290	N/A	N/A	N/A	355	395	750
22	UNIBEN	F	N/A	N/A	N/A	52	88	140	63	90	153	68	70	138	70	76	146	108	115	223	361	439	800
23	UNIPIPORT	F	51	53	104	64	66	130	54	48	102	55	45	100	52	41	93	61	43	104	337	296	633
24	RSUST	S	25	30	55	37	35	72	81	70	151	36	36	72	44	59	103	33	35	68	256	265	521
25	NOVENA	P	3	3	6	12	6	18	N/A	N/A	0	34	21	55	12	8	20	6	2	8	67	40	107
26	BIU	P	N/A	N/A	N/A	N/A	N/A	N/A	17	18	35	44	24	68	15	18	33	35	25	60	111	85	196
<b>South - west</b>																							
27	OAU	F	26	14	40	1	1	2	34	57	91	96	119	215	41	83	124	72	112	184	270	386	656
28	UNILAG	F	57	78	135	30	37	67	61	77	138	30	63	93	32	51	83	47	57	104	257	363	620
29	COVENANT	P	66	79	145	44	15	59	88	37	125	71	33	104	78	50	128	81	40	121	428	254	682
30	UNAD	F	189	206	395	68	61	129	59	90	149	59	95	154	53	50	103	107	112	219	535	614	1,149
31	LASU	S	131	170	301	76	110	186	52	109	161	64	62	126	N/A	N/A	N/A	N/A	N/A	N/A	323	451	774
32	BABCOCK	P	59	37	96	N/A	N/A	N/A	33	34	67	28	34	62	73	68	141	55	60	115	248	233	481
33	BOWEN	P	37	23	60	20	15	35	54	30	84	70	52	122	104	59	163	50	33	83	335	212	547
34	RUN	P	6	2	8	18	19	37	22	27	49	21	17	38	N/A	N/A	N/A	36	16	52	103	81	184
35	BELLS	P	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	24	18	42	20	16	36	5	6	11	49	40	89
36	CALEB	P	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	11	12	23	20	19	39	34	23	57	65	54	119
			1,582	1,774	3,356	1,011	1,271	2,282	1,569	1,784	3,353	1,701	1,842	3,543	1,512	1,671	3,183	1,555	1,677	3,232	8,930	10,019	18,949

Table 2.10 depicts enrolment by geo-political zone and gender from 2004/2005 to 2009/2010 while Figure 2.5 shows enrolment of female students in the seven zones for the same period. The south-east consistently had more than 50 per cent female accounting students over the entire period, with a high point of 67.5 per cent female students in 2004/2005. The south-south and south-west zones fluctuated between 45 and 53 per cent female enrolment over the period, with the other geo-political zones well below the 50 per cent mark and, in many cases, below 30 per cent. The enrolment data indicate that female students are marginalised in the north-central, north-east and north-west zones, while males are disadvantaged in the south-east, south-west and south-south zones.

**Figure 2.5. Female enrolment by geo-political zone, 2004/05-2009/10**



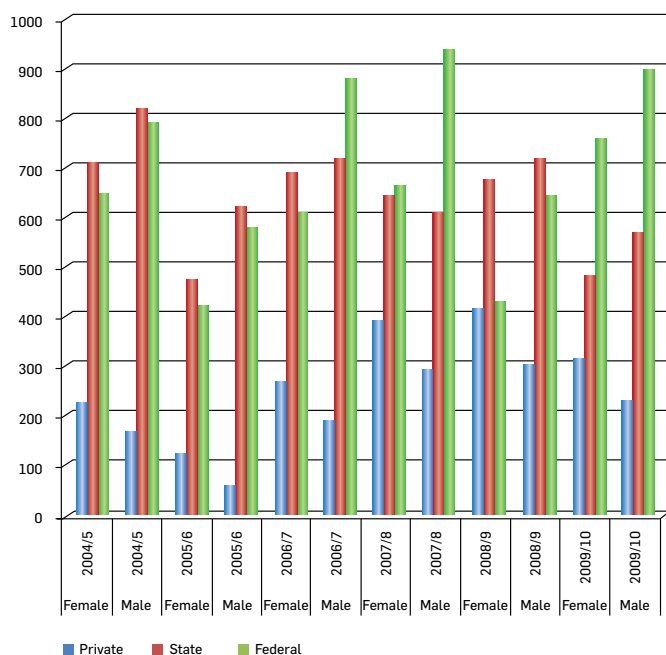
**Table 2.10. Enrolment by geo-political zone and gender, 2004/05-2009/10**

GEOPOLITICAL ZONE	2004/05						2005/06						2006/07						2007/08						2008/09						2009/10						Grand Total					
	F		M		T		F		M		T		F		M		T		F		M		T		F		M		T		F		M		T							
	F/F	M/M	F/T	M/T	F/T	M/T	F/F	M/M	F/T	M/T	F/T	M/T	F/F	M/M	F/T	M/T	F/T	M/T	F/F	M/M	F/T	M/T	F/T	M/T	F/F	M/M	F/T	M/T	F/T	M/T	F/T	M/T										
North-central	220	371	591	208	325	533	225	332	557	336	459	795	336	459	795	336	459	795	336	459	795	336	459	795	336	459	795	336	459	795	336	459	795	336	459	795						
%	13.91	20.9	37.2	20.6	25.6	39	14.3	18.6	40.4	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3	19.8	24.9	42.3						
North-east	43	114	157	0	0	0	25	54	79	71	141	212	71	141	212	71	141	212	71	141	212	71	141	212	71	141	212	71	141	212	71	141	212	71	141	212						
%	2.718	6.43	27.4	0	0	0	1.59	3.03	31.6	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5	4.17	7.65	33.5						
North-west	24	81	105	29	107	136	37	113	150	47	137	184	47	137	184	47	137	184	47	137	184	47	137	184	47	137	184	47	137	184	47	137	184	47	137	184						
%	1.517	4.57	22.9	2.87	8.42	21.3	2.36	6.33	24.7	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5	2.76	7.44	25.5						
South-east	310	149	459	168	153	321	316	267	583	208	104	312	208	104	312	208	104	312	208	104	312	208	104	312	208	104	312	208	104	312	208	104	312	208	104	312						
%	19.6	8.4	67.5	16.6	12	52.3	20.1	15	54.2	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7	12.2	5.65	66.7						
South-south	414	450	864	349	428	777	563	557	1,120	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061	565	496	1,061						
%	26.17	25.4	47.9	34.5	33.7	44.9	35.9	31.2	50.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3	33.2	27.4	53.3						
South-west	571	609	1,180	257	258	515	403	461	864	474	505	979	474	505	979	474	505	979	474	505	979	474	505	979	474	505	979	474	505	979	474	505	979	474	505	979						
%	36.09	34.3	48.4	25.4	20.3	49.9	25.7	25.8	46.6	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4	27.9	27.4	48.4						
Grand total	1,582	1,774	3,356	1,011	1,271	2,282	1,569	1,784	3,353	1,701	1,842	3,543	1,512	1,671	3,183	1,555	1,677	3,232	8,930	10,019	18,949																					

Source: JAMB; university academic planning records

Enrolment in accounting programmes by university type and gender for the period 2004/2005 to 2009/2010 is shown in Table 2.11 and Figure 2.6. In four out of the six academic sessions under study, enrolment in accounting programmes was highest in state universities for both male and female students, although federal institutions took the lion's share of enrolment in the 2009/2010 session. However, while total enrolment in accounting programmes was lowest in private universities for the entire period under study, there were more female than male accounting students at these institutions in each of the academic years. Federal universities systematically enrolled more male students in accounting programmes than female students.

**Figure 2.6. Enrolment by university type and gender, 2004/05-2009/10**



**Table 2.11. Enrolment by university type and gender, 2004/05-2009/10**

UNIVERSITY TYPE	YEAR												Grand Total								
	2004/05			2005/06			2006/07			2007/08			2008/09			2009/10					
	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T	F	M	T
%	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T	F/ F	M/ M	F/ T
Private	223	165	388	118	74	192	266	188	454	391	293	684	405	305	710	316	222	538	1,719	1,247	2,966
%	14.1	9.3	57.4	11.7	5.8	61.5	16.95	10.54	58.6	22.99	15.9	57.2	26.79	18.3	57.0	20.3	13.2	58.7	19.2	12.4	58
State	713	820	1,553	473	619	1,092	691	716	1,407	644	610	1,254	675	721	1,396	479	565	1,044	3,675	4,051	7,726
%	45.1	46.2	45.9	46.8	48.7	43.3	44.04	40.13	49.1	37.86	33.11	51.4	44.64	43.1	48.4	30.8	33.7	45.9	41.2	40.4	47.6
Federal	646	789	1,435	420	578	998	612	880	1,492	666	939	1,605	432	645	1,077	760	890	1,650	3,536	4,721	8,257
%	40.8	44.5	45.01	41.54	45.5	42.08	39.01	49.33	41.0	39.15	50.98	41.5	28.57	38.6	40.1	48.9	53.1	46.1	39.6	47.1	42.8
<b>Total</b>	<b>1,582</b>	<b>1,774</b>	<b>3,376</b>	<b>1,011</b>	<b>1,271</b>	<b>2,282</b>	<b>1,569</b>	<b>1,784</b>	<b>3,353</b>	<b>1,701</b>	<b>1,842</b>	<b>3,543</b>	<b>1,512</b>	<b>1,671</b>	<b>3,183</b>	<b>1,555</b>	<b>1,677</b>	<b>3,232</b>	<b>8,930</b>	<b>10,019</b>	<b>18,949</b>

Source: JAMB; university academic planning records

## 5.2 Perception and career choice

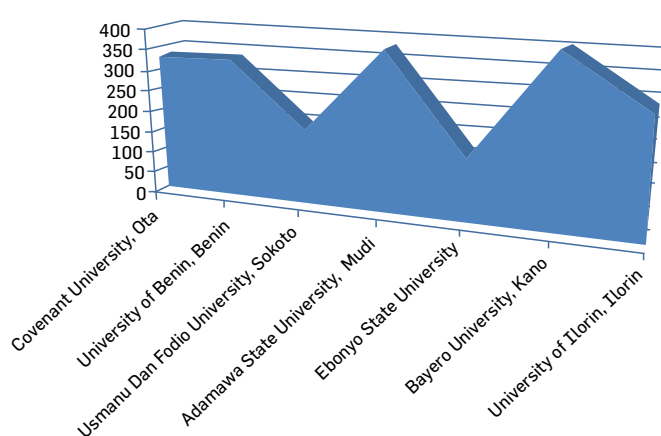
A total of 400 questionnaires were distributed to each of the seven universities chosen as primary data sites. The response rate per university is shown in Table 5.12 and Figure 2.7. Out of the 2,800 questionnaires

administered in total, 2,047 were returned completed and found usable for the analysis. This amounts to an overall response rate of 73.1 per cent. In addition, FGDs were conducted at University of Benin and Covenant University to gather additional qualitative data.

**Table 2.12. Response rate of respondents at seven selected universities**

University	Geo-political zone	Type of university	No.questionnaires distributed	No.questionnaires retrieved	Response rate
Covenant University, Ota	South-west	Private	400	329	82.25%
University of Benin, Benin	South-south	Federal	400	333	83.25%
Usmanu Dan Fodio University, Sokoto	North-west	Federal	400	179	44.75%
Adamawa State University, Mudi	North-east	State	400	379	94.75%
Ebonyi State University	South-east	State	400	146	36.5%
BayeroUniversity,Kano	North-west	Federal	400	400	100%
University of Ilorin, Ilorin	North-central	Federal	400	281	70.25%
<b>TOTAL</b>			<b>2,800</b>	<b>2,047</b>	<b>73.1%</b>

**Figure 2.7. Response rate of respondents at seven selected universities**



The gender mix of respondents was 44 per cent female and 56 per cent male accounting students. Within this overall female to male ratio of 44:56, data revealed that in southern Nigeria accounting students are predominantly female, while the reverse is the case in northern Nigeria. The highest female participation was in Covenant University in the south-west zone with 26.3 per cent females, while the lowest was from Usmanu Dan Fodio University in the north-west zone with 31 (3.5 per cent). This may be due to the religious and cultural beliefs of the people.

The respondents were accounting students from all academic levels – from 100 level to 400 level. This was

broken down as follows: 23.8 per cent of respondents were level 100 students; 27.4 per cent were level 200; 24.6 per cent were level 300; and 24.2 per cent were level 400 students. Thirty three per cent of the respondents were aged 15 to 20 years, 48.2 per cent were aged 21 to 25, 18.8 per cent were aged 25 and over. Most of the female respondents (442) were aged 15 to 20 years.

Ethnicity data show that 15.8 per cent of the respondents were Ibo, 27.2 per cent were Yoruba and 16.6 per cent were Hausa. The remaining 40.4 per cent included Fulani, Margi, Edo and Ibibio minority groups. The ethnic group with the highest number of female respondents was the Yoruba tribe, while that with the least number of female participants was the Hausa tribe.

### 5.2.1 Perceived characteristics of accounting as a discipline

Respondents were asked to score 20 variables related to the perceived characteristics of accounting as a discipline. The Mann-Whitney U tests revealed significant differences in seven of the 20 variables – interesting, verbal, imagination, practical, dynamic, not stressful and new ideas. The most important characteristics indicated by female students are established rules (49.5 per cent strongly agreed, 41.6 per cent agreed), mathematical (42.5 per cent strongly agreed, 49.1 per cent agreed), and practical (47.9 per cent strongly

agreed, 36.6 per cent agreed). For male students, the most important factors were practical (54.6 per cent strongly agreed, 36 per cent agreed), established rules (50 per cent strongly agreed, 41.3 per cent agreed), and interesting (50.3 per cent strongly agreed, 41.6 per cent agreed). Female respondents at the University of Ilorin, Usmanu Dan Fodio University, and Bayero University, all in the northern zones of Nigeria, also indicated that accounting as a discipline was demanding. This may be one reason why the accounting programme is dominated by men. Neither female nor male perceive accounting not to be boring or unimaginative, but both considered it to be stressful.

Conversely, however, the focus group discussions conducted in two selected universities revealed that nearly all participants perceived accounting as boring, demanding, narrow, quantitative, rules-based, and lacking in room for creativity and innovation.

### **5.2.2 Perceived benefits of a career in accounting**

As regards the perceived benefits of accounting as a career, Mann-Whitney U tests reveal significant differences in three of the variables – short-term earnings, social status and ability to specialise. However, female and male students' perceptions did not differ significantly as regards other career benefits. The most important perceived benefit for both the female and male respondents was job security, with a mean score of 4.60 and 4.57 respectively. The result is in line with the studies of Chagelosi et al. (1995) and Bundy and Norris (1992), who identified job security as the most important benefit that influenced the choice of accounting as a career. Other highly perceived benefits by female and male students were job availability (female mean = 4.45, male mean = 4.38), high earnings (female mean = 4.39, male mean = 4.32) and ability to specialise (female mean = 4.47, male mean = 4.48). The least influential factor for female and male respondents was short-term earnings (female mean = 3.32, male mean = 3.20).

### **5.2.3 Perceived constraints of a career in accounting**

Significant differences were noted in the responses of male and female respondents for five of the nine variables related to the perceived constraints of a career in accounting. These were the cost of qualifying as a chartered accountant, low earnings, job inadequacy, cumbersome work activities and family responsibilities.

No significant differences occurred for the other four variables. The factor having the greatest negative influence in the choice of a career in accounting for both female and male respondents was the time required to qualify as a chartered accountant (female mean = 4.37, male mean = 4.33). The second strongest negative influence for females and males alike was the financial cost of qualifying as a chartered accountant (female mean = 4.333, male mean = 4.20), while the third strongest negative factor was principled career (F mean = 4.16, M mean = 4.12).

In the FGDs conducted in two selected universities, the perceived constraints affecting women within the accounting profession included a rigid work system and conditions.

### **5.2.4 Perceived discrimination in the accounting profession**

As regards perceived discrimination in the accounting profession, significant differences occurred between female and male responses in two out of the four variables. Neither female nor male respondents strongly believed that there is discrimination in the accounting profession. The mean of the four variables for both sexes ranged between 2.36 and 2.85. However, a higher proportion of females strongly agreed that women are less preferred by employers than men (female = 17.9 per cent, male = 14.5 per cent); that women are not promoted as quickly as men in the work place (female = 12.3 per cent, male = 8.3 per cent); and that women are refused benefits and other privileges that their male counterparts receive (female = 11.5 per cent, male = 7 per cent).

During the FGDs conducted at University of Benin and Covenant University, the perceived discrimination affecting women in the accounting profession included the traditional belief that women are meant to stay at home, marital responsibility and recruitment policies that favour male accountants over their female counterparts.

### **5.2.5 Career choice motivation**

As regards factors influencing career choice, Mann-Whitney U tests revealed significant differences between male and female respondents in all the variables except for self-interest, which emerged as the most influential career choice factor for both female and male respondents, with means of 4.29 and



4.24 respectively. The majority of respondents gave affirmative responses regarding this variable (female = 84.6 per cent; male = 84.8 per cent). The second and third most influential factors for both male and female respondents were the chance to make a contribution and awareness of professional bodies. The three least influential factors for female respondents were culture, peer pressure, and friends of family, with the average for the sample standing at 2.17, 2.19 and 2.41 respectively. Similarly, culture, peer pressure, and parental pressure were least influential for male respondents, with average responses of 2.72, 2.83 and 2.92 respectively.

During the two FGDs, participants cited prestige, affluence of the profession, job availability, self-interest, parents' advice and teacher or career counsellors as the major factors that influenced their career choice.

### 5.2.6 Career aspirations after graduation

The factor most frequently chosen by female and male respondents in relation to career aspirations after graduation was the desire to become a chartered accountant (female = 96.4 per cent, male = 95.7 per cent). The other mostly frequently chosen factors were the desire to start an accounting career when they graduated and the desire to reach their peak in the accounting profession. The least popular aspiration among both male and female respondents (female mean = 1.70) was to teach accounting. Other less popular accounting specialisations included insolvency (male mean = 2.00), forensic investigation (female mean = 1.82, male mean = 2.08), and taxation (female mean = 1.82, male mean = 2.09). A significant difference between responses from female and male students was noted for 10 out of the 15 variables. It was also noted that more female respondents than males desired to work as accountants in the industry, whereas more males than females desired to specialise as auditors. This suggests that accounting professional bodies should advocate for programmes that encourage female students by informing them of the benefits that accrue to various areas of specialisation, particularly auditing, bankruptcy, forensic accounting and taxation, which are distinctive areas of specialisation in the accounting profession in Nigeria.

The FGDs at University of Benin and Covenant University also revealed that almost all female participants had the desire to continue to pursue a career in accounting.

### 5.3 Summary of findings

The study found that the universities owned by private investors and state governments enjoy the highest female enrolment in accounting in Nigeria.

According to the primary data, accounting students in southern Nigeria (south-east, south-west and south-south) are predominantly female, while the reverse is the case for northern Nigeria (north-central, north-east and north-west). This is in line with the findings of the secondary data on enrolment. Universities in the country's north-east and north-west geo-political zones in particular are characterised by low enrolment of female students in accounting. The north-central zone is where Abuja, the federal capital, is located. This may explain why this zone does not suffer from the same low level of female enrolment affecting the north-east and north-west noted above. As observed earlier, girls in the northern zones experience religious and cultural restrictions, especially among those Muslim communities that reject western education, particularly for girls.

Female accounting students perceived the discipline to be rules-based, mathematical, boring, unimaginative and stressful. Accounting was also perceived as demanding, narrow, quantitative and rules-based. Nevertheless, the most important benefit of a career in accounting for female respondents was cited as job security. Other perceived benefits were job availability and high earnings, while perceived constraints were the length of time required to qualify as a chartered accountant and the cost implication of qualifying. As regards factors influencing career choice, the most influential factor for female respondents was self-interest, followed by the chance to raise awareness among professional bodies. Other factors influencing career choice were cited as prestige, affluence of the profession, parents' advice and teacher or career counsellor. Most female respondents desired to become chartered accountants and work as accountants in the industry. However, they did not want to teach accounting.

## 6. Conclusion and recommendations

Despite the gradual increase in female enrolment in accounting programmes in Nigerian universities, it was observed that enrolment of female students varied for private, state and federal universities. Private investors and state governments have the highest

female enrolment in accounting in Nigerian universities whereas federal universities have the lowest female enrolment. Universities in the north-east and north-west geo-political zones are predominantly responsible for this low enrolment. There is no substantial gender difference in the perception of female and male accounting students towards accounting. Most of the females perceive accounting to be rules-based, boring, unimaginative, stressful and narrow. They prefer to work in the industry as accountants rather than in the professional practice of accountancy. These responses can be linked to students' self-efficacy, self-concept and environment, as advocated by Bandura (1986).

Empirical evidence shows that gender disparity is an issue in tertiary education enrolment in Nigeria. Strategies are required to increase women's participation in higher education in Nigeria and for the achievement of EFA and MDGs by 2015. In addition, policies must enable the less privileged to have access to quality education provided by national and state education authorities as the tuition fees at private universities are very high and thus unaffordable for many.

1. A comprehensive national gender policy in tertiary education that supports female enrolment, particularly in the northern zones, should be established in Nigeria to complement the existing National Gender Policy for basic education as follows:
  - i. Increase opportunities for female students through the provision of an admission quota system, particularly in favour of female accounting candidates. Since JAMB, which is the central body in charge of admission to tertiary institutions in Nigeria, has recognised educationally disadvantaged states and groups, with 20 per cent of the candidates admitted in each session to

belong to these groups, 5 per cent of this should go to female and male applicants in the north and the east zones, as they constitute a disadvantaged group due to cultural and religious factors, among others.

- ii. Government at all levels should develop strategic plans for gender in tertiary education.
- iii. Programmes such as mentoring and counselling, which can help female students to make informed career choices consistent with their self-image, should be established

The Federal Ministry of Education, JAMB and the Nigeria University Commission would be the vehicles for the delivery of this policy. Its implementation should be premised on existing related policies and on the Nigerian Constitution.

2. A quota system should be introduced that will favour female candidates in gaining admission into federal universities in Nigeria.
3. Tertiary institution teaching staff should make accounting more interesting for students. Accounting courses should be taught practically, and case studies should be used.
4. The accounting departments in Nigerian universities should amend the accounting curriculum to make room for innovation and creativity.
5. Professional accounting bodies in Nigeria should sensitise students on various specialisations in accounting practice. This will enable the students to know the various directions in which they could go after graduation and tailor their aspirations appropriately.

## REFERENCES

- Adams, S.J.; Pryor, L.J.; Adams, S.L. (1994)**, 'Attraction and retention of high-aptitude students in accounting: An exploratory longitudinal study'. In :Issues in Accounting Education, 9, 45-58.
- Adeyemi, K.; Akpotu, N. (2004)**, 'Gender analysis of students' enrolment in Nigerian Universities'. In: Higher Education, 48(3), 361-378.
- Alban-Metcalf, B.; West, M.A. (1991)**, 'Women managers'. In: J. Firth-Cozens M.A. West (eds.), Women at work: Psychological and organizational perspectives (pp. 154-171). Milton Keynes, UK: Open University Press.
- Albrecht, W. S., and Sack, R. J. (2000)**, 'Accounting education: Charting the course through a perilous future'. In: Accounting Education Series, 16. Sarasota, FL: American Accounting Association
- ArdafioSchandorf, E. (1995)**, 'African universities day-panelists discuss gender equity in African universities'. In: Association of African Universities Newsletter, No. 33, p. 11-12.
- Asein, J.E.; Lawal, Y (2007)**, Admission into tertiary institutions in Nigeria. Retrieved 17 March 2011 from [http://www.iaea.info/documents/paper\\_1162b25a66.pdf](http://www.iaea.info/documents/paper_1162b25a66.pdf)
- Assie-Lumumba, N. (2006a)**, Higher education in Africa: Crises, reforms and transformation. CODESRIA working paper series. Retrieved 5/11/2010, from [http://www.codesria.org/IMG/pdf/Ndri\\_lumumba.pdf](http://www.codesria.org/IMG/pdf/Ndri_lumumba.pdf)
- Assie-Lumumba, N. (2006b)**, Empowerment of women in higher education in Africa: The role and mission of research. UNESCO Forum Occasional Paper Series Paper no. 11. Cape Town: University of Cape Town.
- Bandura, A. (1977)**, 'Self-efficacy: Toward a unifying theory of behavioral change'. In: Psychological Review, 84, 191-215.
- Bandura, A. (1986)**, Social foundations of thought and action: A social cognitive theory. Englewood Cliffs, NJ: Prentice Hall.
- Bandura, A. (1997)**, Self-efficacy: The exercise of control. New York: W.H. Freeman & Co.
- Bandura, A. (1999)**, 'Social cognitive theory of personality'. In: L. Pervin and O. John (eds.), Handbook of personality (2nd ed.). New York: Guilford Publications.
- Bandura, A. (2001)**, 'Social cognitive theory: An agentic perspective'. In: Annual Review of Psychology, 52, 1-26.
- Belski, W.H.; Richmond, K.A.; Brozovsky, J.A. (2003)**, 'A few bad apples in the bunch? A post-enron examination of the business student's perception of the prestige of the accounting profession'. In: The New Accountant, No.709.
- Betz, N.E.; Hackett, G. (1981)**, 'The relationship of career-related self-efficacy: Expectations to perceived career options in college women and men'. In: Journal of Counseling Psychology, 28, 399-410.
- Bundy, P.; Norris, D. (1992)**. 'What accounting students consider important in the job selection process'. In: Journal of Applied Business Research, 8(2), 1-8.
- Bunyi, G.W. (2003)**, Interventions that increase enrollment of women in African tertiary institutions. Case study prepared for a regional training conference on Improving Tertiary Education in Sub-Saharan Africa: Things That Work, Accra, September 23-25.
- Bunyi, G. W. (2004)**, 'Gender disparities in higher education in Kenya: nature, extent and the way forward'. In: The African Symposium, 4(1), 43-61.
- Bussey, K.; Bandura, A. (1999)**, 'Social cognitive theory of gender development and differentiation'. In: Psychological Review, 106, 676-713.
- Cohen, J.; Hanno, D.M. (1993)**, 'An analysis of underlying constructs the choice of accounting as a major'. In: Issues in Accounting Education, 8, 219-238.
- DeCoster, D.T.; Rhode, J.G. (1971)**, 'The accountant's stereotype: Real or imagined, deserved or unwarranted'. In: The Accounting Review, 46(4), 651-664.
- Durkin, K. (1985)**, 'Television and sex-role acquisition 1: Content'. In: British Journal of Social Psychology, 24, 101-113.
- Eccles, J. S. (1989)**, 'Bringing young women to math and science'. In: M. Crawford and M. Gentry (eds.), Gender and thought. New York: Springer-Verlag (pp. 36-58).

- Emodi, J.I. (2010)**, Issues in global competitiveness in university education: The Nigerian university system in competition for relevance. Retrieved 22 March 2011 from [http://senatorjoyemodi.info/documents/UNAAB%20-Senator%20\(Dr.\)%20Joy%20Emodi%20Convocation%20Lecture.pdf](http://senatorjoyemodi.info/documents/UNAAB%20-Senator%20(Dr.)%20Joy%20Emodi%20Convocation%20Lecture.pdf)
- Eshun, V. (1995)**, 'African universities day-panelists discuss gender equity in African universities'. In: AAU Newsletter, No. 33, p. 13-14.
- Felton, S., Dimnik, T., and Northey, M. (1995)**. A theory of reasoned action model of the chartered accountant career choice. *Journal of Accounting Education*, 13 (1), 1-19.
- Fennema, E.; Wolleat, P.; Pedro, J.D.; Becker, A.D. (1981)**, 'Increasing women's participation in mathematics: An intervention study'. In: *Journal for research in Mathematical Education*, 12(1). Retrieved 9 March 2011 from <http://www.jstor.org/pss/748654>
- Fletcher, J. (2006)**, Evaluating economic and social interventions that increase college enrollment. Retrieved 10 March 2011 from [http://www.aeaweb.org/annual\\_mtg\\_papers/2007/0106\\_0800\\_0503.pdf](http://www.aeaweb.org/annual_mtg_papers/2007/0106_0800_0503.pdf)
- Hackett, G. (1995)**, 'Self-efficacy in career choice and development'. In: A. Bandura (ed.), *Self-efficacy in changing societies*. Cambridge, UK. Cambridge University Press (pp. 232-258).
- Hermanson, D.H.; R.H. Hermanson; Ivancevich S.H. (1995)**, 'Are America's top business students steering clear of accounting?'. In: *Ohio CPA Journal*, 54(2), 26-30.
- Hooks, K.L.; Cheramy, S.J. (1994)**, 'Facts and myths about women CPAs'. In: *Journal of Accountancy*, 178, 97-85.
- Huston, A.C. (1983)**, 'Sex typing'. In: P.H. Mussen (series ed.) and E.M. Hetherington (volume ed.), *Handbook of Child Psychology: Socialization, personality, and social development* (4th ed.) New York: Wiley (pp. 387-467)
- Jacobs, J.A. (1989)**, *Revolving doors: Sex segregation and women's careers*. Stanford, CA: Stanford University Press.
- Junge, M.E.; Dretzke, B.J. (1995)**, 'Mathematical self-efficacy gender differences in gifted/talented adolescents'. In: *Gifted Child Quarterly*, 39, 22-28.
- Kohlberg, L. (1966)**, 'A cognitive-developmental analysis of children's sex-role concepts and attitudes'. In: E.E. Maccoby (ed.), *The development of sex differences*. Stanford, CA: Stanford University Press (pp. 82-173).
- Kwapong, O.A.T.F. (2007)**, 'Widening access to tertiary education for women in Ghana through distance education'. In: *Turkish Online Journal of Distance Education*, 8,(4), Article 5. Retrieved 9/3/2011, from [http://tojde.anadolu.edu.tr/tojde28/pdf/article\\_5.pdf](http://tojde.anadolu.edu.tr/tojde28/pdf/article_5.pdf)
- Lent, R.W.; Brown, S.D.; Hackett, C. (1994)**, 'Toward a unifying social cognitive theory of career and academic interest, choice and performance (Monograph)'. In: *Journal of Vocational Behaviour*, 45, 79-122.
- Lent, R.W.; Maddux, J.E. (1997)**, 'Self-efficacy: Building a sociocognitive bridge between social and counselling psychology'. In: *The Counselling Psychologist*, 25(2), 246-255.
- Leppel, K.; Williams, M.L.; Waldauer, C. (2001)**, 'The impact of parental occupation and socioeconomic status on choice of college major'. In: *Journal of Family and Economic Issues*, 22, 373-394.
- Lowe, D.R.; Lowe, L.S.; Simons, K. (1994)**, 'Criteria for selection of an academic major: Accounting and gender differences'. In: *Psychological Reports*, 75, 1169-1170.
- Lowe, D.R.; Lowe, L.S.; Simons, K. (1995)**, 'Look who's coming to the profession: A stereotype partially shattered'. In: *New Accountant*, 8-10.
- Lowe, D.R.; Simons, K. (1997)**, 'Factors influencing choice of business majors – some additional evidence: a research note'. In: *Accounting Education: An International Journal*, 6, 39-45.
- Matsui, T.; Ikeda, H.; Ohnishi, R. (1989)**, 'Relations of sex-typed socializations to career self-efficacy expectations of college students'. In: *Journal of Vocational Behavior*, 35, 1-16.
- Mischel, W. (1970)**, 'A social learning view of sex differences in behavior'. In: P.H. Mussen (ed.), *Carmichael's manual of child psychology*, Vol. 2. New York: Wiley (pp. 3-72)
- NUC (2011), List of Nigerian, Public, State and Private Universities. Retrieved on 22 March from [www.nuc.edu.ng](http://www.nuc.edu.ng)
- Nyaigotti-Chacha, C. (2004)**, *Reforming higher education in Kenya: Challenges, lessons and opportunities*. State University of New York Workshop with the Parliamentary Committee on Education, Science and Technology, Naivasha, Kenya. Retrieved 9 March 2011 from [http://www.iucea.org/downloads/Reforming\\_HE.pdf](http://www.iucea.org/downloads/Reforming_HE.pdf)

- Omoike, D. (2010)**, 'Sensitizing the female in university admission in south-south geo-political zone for assurance of sustainable development in Nigeria'. In: International Journal of Educational Administration and Policy Studies, 2(8). Retrieved 9/3/2011 from <http://www.academicjournals.org/IJEAPS/PDF/Pdf2010/Dec/Omoike.pdf>
- Onokala, P.C.; Onwurah, C.U. (2001)**, Gender equity in students' enrolment in the universities in Nigeria. Report submitted to the Association of African Universities (AAU), August. Retrieved on 13 May 2010 from <http://www.aau.org/studyprogram/reports/onokala.pdf>
- Pfost, K.S.; Fiore, M. (1990)**, 'Pursuit of nontraditional occupations: Fear of success or fear of not being chosen?'. In: Sex Roles, 23, 15-24.
- Phillips, D.A.; Zimmerman, M. (1990)**, 'The developmental course of perceived competence and incompetence among competent children'. In: R.J. Sternberg and J. Kolligian Jr. (eds.), Competence considered. New Haven, Conn: Yale University Press (pp.41-66).
- Randell, S.K.; Gergel, D.R (2009)**, The education of girls in Africa. Opening address presented at the Federation of University Women of Africa Conference, Lagos, Nigeria.
- Rosenhan, D.; Frederick, F.; Burrows, A. (1968)**, 'Preaching and practicing: Effects of channel discrepancy on norm internalization'. In: Child Development, 39, 291-301.
- Saemann, G.P.; Crooker, K.J. (1999)**, 'Student perceptions of the profession and its effects on decisions to major'. In: Journal of Accounting Education, 17, 1-22.
- Schunk, D.H. (1987)**, 'Peer models and children's behavioral change'. In: Review of Educational Research, 57, 149-174.
- Serbin, L. A.; Sprafkin, C. (1986)**, 'The salience of gender and the process of sex-typing in three- to seven-year-old children'. Child Development, 57, 1188-1199.
- Seggar, J.F.; Wheeler, P. (1973)**, 'World of work on TV: Ethnic and sex representation in TV drama'. In: Journal of Broadcasting, 17, 201-214.
- Shackleton, V. (1980)**, 'The accountant stereotype: myth or reality?'. In: Accountancy, 91(1047), 122.
- Simons, K.A.; Lowe, D.R.; Stout, D.E. (2003)**, 'Comprehensive literature review: factors influencing choice of accounting as a major'. In: Proceedings of the 2003 Academy of Business Education Conference.
- Steinberg, L. (1996)**, Beyond the classroom. New York: Simon-Schuster.
- Stockard, J.; Johnson, M.M. (1992)**, Sex and gender in society. Englewood Cliffs, NJ: Prentice-Hall.
- S.A.; Bonett, R.M. (1991)**, 'Gender differences in career self-efficacy: Combining a career with home and family'. In: Journal of College Student Development, 32, 297-301.
- Sugahara, S.G.; Boland, G. (2006)**, The role of perceptions toward the accounting profession by Japanese tertiary business students in the process of career choice. Retrieved 10 March 2011 from <http://www.ob.shudo-u.ac.jp/jimuhp/souken/web/magazine/pdf/com/shou47-2sugahara.pdf>.
- Taylor (2000)**, Final Quantitative Report. Taylor Research and Consulting Group, Inc. AICPA Student and Academic Research Study.
- Taylor, D.B.; Dixon B.R. (1979)**, 'Accountants and accounting: A student perspective'. In: Accounting and Finance, 19(2), pp. 51-62.
- Thomas, M.B.; Neal, P.A. (1978)**, 'Collaborating careers: The differential effects of race'. In: Journal of Vocational Behavior, 12, 33-42.
- United Nations (1975)**, Report of the World Conference of the International Women's Year. Retrieved 27 February 2011 from <http://dwww.un.org/womenwatch/daw/beijing/otherconferences/Mexico/Mexico%20conference%20report%20optimized.pdf>
- United Nations (1980)**, Report of the World Conference of the United Nations Decade for Women: Equality, development and peace. Retrieved on 27 February 2011 from <http://www.un.org/womenwatch/daw/beijing/otherconferences/Copenhagen/Copenhagen%20Full%20Optimized.pdf>



**United Nations (1985)**, Report of the World Conference to Review and Appraise the Achievements of the United Nations Decade for Women: Equality, development and peace. Retrieved on 27 February, 2011 from <http://www.un.org/womenwatch/daw/beijing/otherconferences/Nairobi/Nairobi%20Full%20Optimized.pdf>

**United Nations (1995)**, Report of the fourth World Conference on Women. Retrieved on 27 February 2011 from <http://www.un.org/womenwatch/daw/beijing/pdf/Beijing%20full%20report%20E.pdf>

**Walkerdine, V. (1989)**. Counting girls out. London: Virago Press.

Wikipedia, the free encyclopedia. Retrieved 09/03/2011, from <http://en.wikipedia.org/wiki/Enrollment>

**Zimmerman, B.J (1989)**, 'A social cognitive view of self-regulated academic learning'. In: Journal of Educational Psychology, 81(3), 329-339.

## Conclusion and recommendations for policy and practice

The research in this volume provides clear evidence that it is possible to improve gender equality in education if the right policies and interventions are put in place, and if the interventions are evaluated on the basis of gender-disaggregated data.

Evidence generated from this body of research also supports FAWE's mission to create positive societal attitudes, policies and practices that promote equity for girls in terms of access, retention, performance and quality by influencing the transformation of African education systems.

### Gender-responsive schooling practices

What happens in teaching and learning processes in the classroom plays a big role in determining how well girls and boys participate in education, and whether they stay in school and do well in their studies. Because teachers are central to the teaching and learning processes, their understanding and awareness of gender-responsiveness is key to the effective participation of girls and boys in learning processes.

The research in this volume builds on this notion by addressing gender-responsiveness in selected formal schools in three African countries, and highlights the hurdles that continue to stand in the way of girls' full inclusion in formal schooling institutions.

In Liberia, an examination of the barriers that dissuade women from becoming teachers highlights the patrilineal assumptions woven into the cultural fabric of society. Such assumptions that girls are more resourceful in the home than in public institutional roles lead to fewer girls completing education, and thus fewer girls being available to become teachers. Policies that make schools more gender-sensitive will increase the number of female students in schools, and by extension the number of potential female teaching professionals.

In the same vein, the two analyses on the impact of child-friendly schools argue that girls' achievement in school is not only highly dependent on the quality and sensitivity of teachers, but is also highly influenced by the presence of women in leadership positions. There is now, more than ever, a need to sensitise key stakeholders, to articulate the needs of female students, and to create educational avenues to allow women to take up leadership positions within their various communities.

### Higher education, a site for knowledge production

Higher education systems have been characterised by deeply ingrained gender inequality, yet they are one of the most important sectors of resource formation. While higher education plays a vital role in knowledge production and information dissemination for developmental purposes, the lack of adequate female representation and participation in tertiary education accounts for the absence of women in positions of leadership within their various communities. While African women are key contributors to economic and social production, they have limited opportunities to contribute to or make major decisions. The research papers in this series challenge policy-makers to re-think and re-conceptualise higher education based on a policy of inclusiveness. They do this by developing strategic plans for gender mainstreaming at all levels, and in particular for providing gender-responsive environments to allow full participation of girls in tertiary education. In order for women to play an active role in the social and scientific development of their nations, specific measures have to be implemented to redress the glaring under-representation of women in higher education institutions. Such measures could include instituting gender mentoring and counselling programmes for support and guidance, making the curriculum more gender-responsive to attract and retain female students, and providing safe learning spaces for women to allow them to develop a sense of belonging in these institutional environments.

To influence more inclusive education policies that cater to the needs of girls, FAWE intends to use such evidence in its continuous engagement and dialogue with national governments, institutions of learning, and stakeholders in education. Gender equality matters as an instrument for development. Because education is the engine that drives development, it is critical that women be given adequate space and resources to enable them to reach their full potential to contribute both to their individual development and to that of their societies.

Gender equality in education is an integral instrument for economic growth. In global and national discourses, education is framed as an engine of growth that fuels national economies and sustainable development. Yet gender gaps in education persist as girls continue to lag behind their male counterparts in access, opportunities, and achievements.

This second volume of the FAWE Research Series unpacks issues in girls' education in Africa, and highlights the need to remove barriers that prevent girls from reaching their full potential. In shedding light on some of the hurdles that stand in the way of girls' education, the research looks at gender parity issues from multiple perspectives.

Using the child-friendly/girl-friendly school models, the research focuses on select institutions and their efforts in making formal schooling environments gender-responsive. While it investigates the extent to which schools are endowed with appropriate infrastructure, the research also looks at the policies and support programmes in place that make for safe, nurturing and gender-responsive learning environments.

This volume of the FAWE Research Series also highlights gender-responsive practices in institutions of higher education. Universities serve as sites where knowledge for economic growth and development is generated. How inclusive of women are these institutions that play a crucial role in generating new ideas and in accumulating and transmitting knowledge for sustainable development?

In its continuous dialogues and engagements with governments, policy-makers, and development partners, FAWE hopes to generate research that not only adds to the scant research on girls' education but supports policy and advocacy efforts aimed at narrowing gender gaps in education and contributing towards gender equality in education and development.