MEDIATING ROLE OF CAREER SELF-EFFICACY BELIEF IN THE SELF-ESTEEM AND CAREER CHOICE BEHAVIOR RELATIONSHIP AMONG SECONDARY SCHOOL STUDENTS IN MIGORI SUB COUNTY, KENYA

BY

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DECLARATION

DECLARATION BY THE CANDIDATE

This thesis is my original work and has not been presented or produced for award of a degree in any other university.

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DEDICATION

This work is dedicated to my late father Philip Gor Nyaimbo, my mother Naomy Awiti Gor my wife Annet Owino and my two daughters Nomy Gracious Owino and Nina Grandy Owino.

ABSTRACT

Students' levels of decisiveness in career choices have generally been an issue of concern to many education stakeholders. Studies show that 63% of students who joined public universities in Kenya, through Kenya Universities and Colleges Central Placement Service (KUCCPS), were hardly admitted to pursue degree programmes of their choices. This situation is even worse in Migori Sub-county where records at the sub-county's examination's office show that averagely, only 7.5% of students chose their careers by filling the KUCCPS form at the end of Form Four. This is indicative of low career self-efficacy belief among students in Migori sub-county. The purpose of this study was to establish the mediating role of career self-efficacy belief in the relationship between self-esteem and career choice behavior among secondary school students in Migori sub-county. The objectives were; to establish the level of self-esteem of students, to establish the level of career choice behavior of students across gender, to establish the level of career self-efficacy belief of students, to determine the relationship between self-esteem and career choice behavior and to determine the ability of career self-efficacy belief to mediate in the relationship between self-esteem and career choice behavior among secondary school students in Migori sub-county. The study used a mediation model borrowed from Baron and Kenny (1986) which describes that the relationship between the independent variable (self-esteem) and the dependent variable (career choice behavior) can be enhanced if a third variable (mediator-career self-efficacy belief) reduces the initial relationship. Descriptive Survey research design and Correlation research design were used. From a target population of 2010 Form 3 students from the 34 secondary schools in the sub-county, purposive sampling based on set parameters of mixed day school, boys boarding school and girls boarding school was used to select 10 schools. Due to their high proportion, 8 schools were purposively sampled from mixed day school with 1 school each being purposively sampled from girls boarding and boys boarding respectively. Fisher et al. !1986) formula was used to arrive at a sample size of 322 students who were selected using simple random sampling whereas the 10 career counselors from these 10 purposively sampled schools were all used. Questionnaires were used to collect data from students whereas interview schedules were used to collect data from career counselors. A pilot study was done to establish the reliability of the instruments by subjecting the instruments to 32 students using a test-re-test method that yielded a Pearson Product Moment correlation coefficient of .82 for Rosenberg Self Esteem Scale, .80 for Career Decision Scale and .84 for Career Decision Self Efficacy Scale-Short Form and were deemed to be reliable as the Pearson Product Moment Correlation Coefficient of .70 and above was achieved for all the instruments. Experts from the department of Educational Psychology, Maseno University advised on content validity of instruments. Quantitative data was analyzed using Descriptive Statistics Correlation Analysis, and Structural Equation Model that included frequencies, means percentages, model fit estimates, correlations and regression estimates. Qualitative data from open ended questionnaire items and interviews were transcribed then reported. The study revealed that students in Migori sub-county had a high self-esteem, high career choice behavior and high career self-efficacy belief. It also revealed that self-esteem influences career choice behavior and that career self-efficacy belief mediates in the relationship between self-esteem and career choice behavior. It was concluded that self-esteem accounts for variation in career choice behavior and that this variation can be further enhanced with the introduction of career self-efficacy belief. It was however noted that career counselors had not been applying career self-efficacy belief in career counseling and therefore the study recommended organization of in-service training for career counselors to enlighten them on the role of career self-efficacy belief in the career choice process so that they can improve it to enhance students' career choice behavior. The findings are significant to the students, career counselors and government in improving on student career choice behavior for optimal human resource productivity.

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LIST OF ABBREVIATIONS AND ACRONYMS

AMOS	:	Analysis of Moment Structures
CCB	:	Career Choice Behavior
CDE	:	County Director of Education
CDMSE-SF	:	Career Decision Self-Efficacy Scale- Short Form
CDS	:	Career Decision Scale
CR	:	Critical Ratio
CSEB	:	Career Self-Efficacy Belief
DM	:	Decision Making
G&C	:	Guidance and Counseling
HIV/AIDS	:	Human Immunodeficiency Virus/Acquired Immune Deficiency Syndrome
KCSE	:	Kenya Certificate of Secondary Education
MOE	:	Ministry of Education
MUERC	:	Maseno University Ethics Review Committee
RSE	:	Rosenberg Self-Esteem Scale
SCSE	:	Sources of Career Self-Efficacy.
SD	:	Standard Deviation
SE	:	Self-Esteem
SER	:	Standard Error
SGS	:	School of Graduate Studies
UK	:	United Kingdom
USA	:	United States of America

DEFINITION OF OPERATIONAL TERMS

Career- A sequence of employment related positions, profession, occupation, vocation and line of business or calling.

Career certainty- The degree to which individuals feel decided about their occupational plans.

Career Choice Behavior: The level of student decidedness in making career choices.

Career counselling- The process where career counselors interact with students to assist them with their career development.

Career counselors: Are career masters in schools.

Career indecision- The inability to make a decision about the career that one wishes to pursue.

Career Self-Efficacy Belief: The level of confidence a student has in his/ her ability to successfully accomplish a given career task.

Career uncertainty- The degree to which one is not sure of having made a career choice or decision.

Mediating Role: Is the ability of a third variable to reduce the relationship that initially existed between the independent and the dependent variable. When this happens it implies that the third variable is an important factor that influences the dependent variable and therefore mediates the relationship.

Self-Esteem: Personal judgment of worthiness that an individual holds of him/herself.

Students: Are Form 3 secondary school students in Migori sub-county.

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CHAPTER ONE

INTRODUCTION

1.1 Introduction

This chapter contains background information presented in the following order: Background of the study, statement of the problem, purpose of the study, objectives of the study, research questions, scope of the study, limitations of the study, assumptions of the study, significance of the study, mediation model and definitions of operational terms.

1.2 Background of the Study

Okediji, Offiong, Umoh, Sanni, Ezeh and Afolabi (2009) define a career as that which covers a sequence of positions, jobs, vocations or occupations that one person engages in during his/her working life. Looking at it critically, a career is any sequence of task that one engages in during his or her working life. The decision that individuals make in the choice of a career inexorably makes or mars the individual in life. Once a bad irreversible decision is made, it takes its toll on the organizations in which they are employed. The overall effect of this is that the society suffers.

According to Gitonga (2013), giving young people the tools and knowledge to realistically plan for their future has generally been held to be a primary goal of education globally. Unfortunately, a general view of the dismal studies done on students' decisions on careers in secondary levels of education in Kenya portrays some major knowledge gaps. However, career development process is perceived as life-long; though choices made during secondary school are critical in laying the foundation for future vocations. Department for Education and Skills (2005) in its Education and Skills White Paper, in the United Kingdom, outlined the need for

young people to make their own career choices by encouraging the provision of quality and impartial advice to young people. The same paper noted that young people needed skills to make sound career decisions. Similarly, the National Institute for Careers Education and Counseling-NICEC (2004), which identified a need for careers' specialists to work with senior management in various professions for a number of reasons: namely, to set policy and resource priorities for careers education and guidance, to support those involved in its delivery, to constantly review the provision of careers education and to develop and evaluate careers work.

In Kenya, the education system require that students choose some examinable subjects before joining Form III class, two years before sitting for the national examinations (Kenya National Examination Council, KNEC, 2002). These subjects in turn, form a basis for students' growth and development in vocational skills. Further on, admissions in tertiary institutions have generally been pegged on among other criteria, the performances of these subjects in their final examinations- Kenya Certificate of Secondary Education (KCSE).

The result of this final examination determines who joins university since admissions into various careers are determined by grades obtained from the Kenya Certificate of Secondary Education (Kochung & Migunde, 2011). Since it is at the onset of the Form 3 class that a student is expected to do subject selection (Kenya National Examination, KNEC, 2002) in line with their future career prospects, this study therefore sought to establish whether the Form Three students had actually made their career choices at the subject selection process.

Subject selection, admittedly, has been noted to be a complex process, especially when viewed from a student adolescent's stage, where majority of Form Three students are believed to be in. This biological stage has been noted to be characterized by periods of instability, conflict,

anxiety and tension - manifesting through idealism, experimentation, risk taking, emotional instability and inner turmoil; all of which affect rational decision-making (Mann, Harmoni & Power, 1989). Trying to choose a subject from the various options presented in school syllabus in line with career is considered complex as a student is surrounded by competing time demands from a generally loaded school curriculum (Mwangi 2002).

Readiness of teachers in the careers' education has its equal share of issues of concern in the Student career choice readiness. Mwangi (2002) work on education and career aspirations in secondary schools, observed that teachers had heavy teaching workloads and many students to attend to, leaving little or no time to offer substantial careers' education. He noted that 65% of the students appeared not to have had specific orientation to careers, though, about half of them (career indecisiveness notwithstanding) dreamt of joining public universities.

Consequently, a study by Osoro, Amundson and Borgen (2000) on careers decision-making of high school students in Kenya, indicated that 85% of teachers were insufficiently prepared for career counselling work for students at secondary schools. This trickled down to a conclusion that most students at the university admissions point, may have had no thorough careers education and consequently may have lacked specific career choices. The current study therefore sought to establish the role of career counselors in the process of student career choice in Migori sub-county.

Gati, Krausz and Osipow (1996) in their work on difficulties in career decision making, observed that shifts in employment structures, high levels of unemployment and changes in the composition of the labor force demanded that students make appropriate career choices. Dynamics in the labour markets on the other hand, were noted to be contributing to the puzzle

of subject selection in the minds of students. In addition, fear of unemployment, especially with students at the brink of joining universities or tertiary institutions, seemed to compel the students to flock in the most marketable programs- at the expense of their own best-placed occupations. The current study was therefore an attempt to establish the readiness of students to make a career choice and to establish factors that influence their career choice in light of the fore mentioned scenario.

Kinai (2005) adds that the curriculum in secondary schools has core subjects for all students and a few elective subjects. To select subjects to study, students` abilities, interests and goals should be considered. A student may have many abilities and interests and hence have difficulties in deciding which subjects will be most useful for him/her in the long run. A student will need to understand his/her curricular choices to meet individual career objectives. Chances of being unrealistic are high especially when the interests require higher level of abilities (Kinai, 2005).

The USA National Centre for Education Statistics (2005) asserts that attitude for girls and boys in science is approximately the same. There is no significant difference between male and female science achievement scores for 4th, 8th, and 12th grades. Ceci, Williams, and Barnett (2009) followed 2,000 high school graduates in Michigan who had math scores to qualify for science majors as their primary subjects. It was found that 50% of male students and 16% of female students who had qualifying math scores declared themselves as science majors and in effect pursued careers related to this field. This is disquieting information as both groups of male and female students were highly qualified to do well in a science major. Likewise, they

found that females who had both high math and verbal scores were still more likely to not enter a math intensive field, such as, education or health, than male students with the same abilities.

It would appear from Ceci, Williams, and Barnett (2009) study that female students are opting out of science majors at greater rates than males, but not as the result of an absence of ability. Interests, choices, and aspirations differ significantly along gender lines (Ceci et al., 2009). Since this study was carried out among high school graduates, the current study however focuses on secondary school student's career choice behavior with the aim of determining the gender role in career choice among students in Migori sub-county.

Self-esteem is your opinion of yourself. Having a high self-esteem could help you be more confident, thus giving you self-efficacy in some tasks (Bandura, 1997). According to Robbins, Trzensniewski and Potter (2002) the level of self-esteem is subject to a number of factors. They carried out a study that covered the important life stages from childhood until old age. They found out that young children have a healthy level of self-esteem that decreases during school age as one interacts with peers and begins to compare with others. With the turbulence of adolescence, self-esteem continues to fall and remains unstable. Changes in the body, identity crisis and emotional changes are some of the causes of this very low self-esteem level at this stage. Their study used longitudinal survey design to get their data, the current study however used descriptive and correlation design to get its data with the aim of establishing the level of self-esteem of students at the form three level.

Self-esteem has been considered as an important aspect in the career choice process. Melgosa (2014) asserts that self-esteem is an important factor that leads to employment. This begins with career choice, for instance, those with high self-esteem will be very enthusiastic to make

a career choice whereas those with low self-esteem will doubt their worthiness towards accomplishing various career tasks and therefore shy away from making such choices During the job interview, candidates with healthy self-esteem have greater chances of being employed and once hired, this successful experience gives a boost to self-esteem.

According to Bardick, Bernes, Magnusson and Witko (2006) self-esteem has an effect on career choice behavior. They assert that self-esteem is quite instrumental in the career choice process as it is the element that pushes one to make a career decision. Students who commit to career jobs have an increased self-esteem on career choice behavior. Since their study used correlation analysis to establish the relationship between self-esteem and career choice behavior, the current study deviated from this by using Structural Equation Model to attempt to determine the level of relationship between these two variables among students in Migori sub-county.

Bandura (1977) reckons that self-esteem and self-efficacy are correlated. For a person's self-esteem to influence his/her career choice behavior, it will do this by making him/her feel self-efficacious enough to successfully carry out the task in the chosen career.

Self-efficacy makes a difference in how people feel, think, and act. A low self-efficacy is associated with a low self-esteem. Individuals with a low self-esteem have pessimistic thoughts about their accomplishments (self-efficacy) and personal development. Self-esteem as such correlates with career self-efficacy belief (Bandura, 1977). Bandura did his study outside African environment. The current study therefore will test the plausibility of this assumption In Migori sub-county by correlating self-esteem and career self-efficacy belief.

Career self-efficacy belief level determines to a great extent the level of career choice behavior. Career decision-making process would be significantly different between high and low self-efficacy individuals. Those with high self-efficacy belief make better career choice behavior (Okediji et al., 2009: Nesdale & Pinter, 2000: Tella & Ayemi, 2007: Salami, 2010; Murugami, 2010: Kagume, 2010). As such they affirm that career self-efficacy belief plays a very key role in career choice of an individual. These studies were all conducted outside Migori sub-county environment, the current study therefore sought to determine the correlation between these two variables among students in Migori sub-county.

Bardick, Bernes, Magnusson and Witko (2006) studied the influence of self-esteem on career self-efficacy belief whereas Okediji et al. (2009): Nesdale and Pinter (2000): Tella and Ayemi (2007): Salami (2010): Murugami (2010): Kagume (2010) studied the influence of career self-efficacy belief on career choice behavior with none looking at a situation where career self-efficacy belief mediates in the relationship between self-esteem and career choice behavior. It is this gap that this study sought to fill by using career self-efficacy belief as a mediator in the relationship between self-esteem and career choice behavior among students in Migori sub-county with a view to improving career choice behavior.

1.3 Statement of the Problem

Students' levels of decisiveness in career choices have generally been an issue of concern to many education stakeholders. With studies showing that 63% of students who joined public universities in Kenya, through Kenya Universities and Colleges Central Placement Service (KUCCPS), were hardly admitted to pursue degree programmes of their choices, there seems to be a real problem with regard to career decisiveness. These numbers are quite disturbingly

high being that Career Guidance and Counselling have been on-going for over two decades in Kenya secondary schools with the government going a notch higher to provide career guide books through the Kenya Universities and Colleges Central Placement Services (KUCCPS) as well as organize career seminars for teachers.

A grim picture is equally painted by a study conducted in secondary schools in Kenya which noted that 65% of students in secondary schools appeared not to have had specific orientation to careers, though, about 50% (career indecisiveness notwithstanding) dreamt of joining universities. A study of ability of career counselors in Kenya to offer career counseling to students found that 85% of career guidance teachers admitted to be insufficiently prepared for career counselling work.

This situation could even be worse in Migori sub-county where records at the Sub-County Examination office show that on average, only 7.5% of students make their career choice by filling the KUCCPS form at the end of Form Four. This indeed affirm the position by Republic of Kenya (2010) report which lists Migori among sub-counties which have done poorly in producing skilled personnel. The lack of career guidance and counseling offices as records at Migori Sub-County Education Office indicate that out of the 34 schools in the sub-county, only 2 have guidance and counseling offices paint a very bad picture in terms career counseling. The inability by Migori students to make career choices at the point of filling KUCCPS form is a clear indication of low career self-efficacy belief. This study therefore sought to introduce the concept of career self-efficacy belief to try and determine whether it mediates in the relationship between self-esteem and career choice behavior with an aim of improving career choice behavior.

1.4 Purpose of the Study

The purpose of this study was to investigate the mediating role of career self-efficacy belief in the relationship between self-esteem and career choice behavior.

1.4.1 Objectives of the Study

The study was guided by the following objectives.

i. To establish the level of self-esteem of students in Migori sub-county.

ii. To establish the level of career choice behavior of students across gender in Migori sub-county.

iii. To establish the level of career self-efficacy belief of students in Migori sub-county.

iv. To determine the relationship between self-esteem and career choice behavior of students in Migori sub-county

v. To determine the ability of career self-efficacy belief to mediate in the relationship between self-esteem and career choice behavior of students in Migori sub-county.

1.4.2 Research Questions

The study was guided by the following research questions.

i. What is the level of self-esteem of students in Migori sub-county?

ii. What is the level of career choice behavior of students across gender in Migori sub-county?

iii. What is the level of career self-efficacy belief of students in Migori sub-county?

iv. What is the relationship between self-esteem and career choice behavior of students in Migori sub-county?

v. Does career self-efficacy belief mediate in the relationship between self-esteem and career choice behavior of students in Migori sub-county?

1.5 Scope of the Study

This study focused on Form 3 students in Migori sub-county. The Form 3 students were chosen since they have been taken through career guidance which is done at the onset of Form Three during subject selection. They would therefore respond appropriately as the issue of career choice is still fresh in their minds. The study specifically focused on self-esteem and career self-efficacy belief as factors that may influence career choice behavior.

1.6 Limitations of the Study

I. Most career counselors lacked knowledge of what career self-efficacy belief was and this threatened to lead to incomplete answering of the interview. To avoid this, the researcher explained the meaning of career self-efficacy belief first before proceeding to other questions. This could in effect lead to the career counselors giving socially desirable responses which could negatively affect the quality of data received.

1.7 Assumptions of the Study

The study made the assumptions that all students in Form Three in Migori sub-county have same entry behavior, age bracket (16-18 years) and have also successfully gone through career guidance. It also assumed that all the schools have career counselors who guide the students on career choice.

1.8 Significance of the Study

Since career choice has been a problem to many a student, this study sought to offer measures aimed at improving career choice behavior of students with a view to promoting appropriate career choice. It also sought to determine the role of career self-efficacy belief in the career choice process with the aim of introducing it in the career counseling process. This would be very important to education stakeholders such as the curriculum developers who would see its inclusion in the career books. The study would also provide career counselors and teachers with vital information on factors that influence career choice behavior of learners so that they use such factors to improve students' career choice behavior.

1.9 Mediation Model

According to Baron and Kenny (1986) mediation model, a variable is said to mediate in the relationship between the independent and dependent variable to the effect that it influences the strength of the initial relationship. That is to say, the independent variable influences the dependent variable by first influencing the mediator which in turn influences the dependent variable. Baron and Kenny (1986) assert that for us to say there is a mediating relationship, we must prove that there is a significant relationship between the independent and the dependent variable. Next, there must be a significant relationship between the independent and the mediator variable then lastly there has to be a significant relationship between mediator and the dependent variable.

Consider the diagram below.

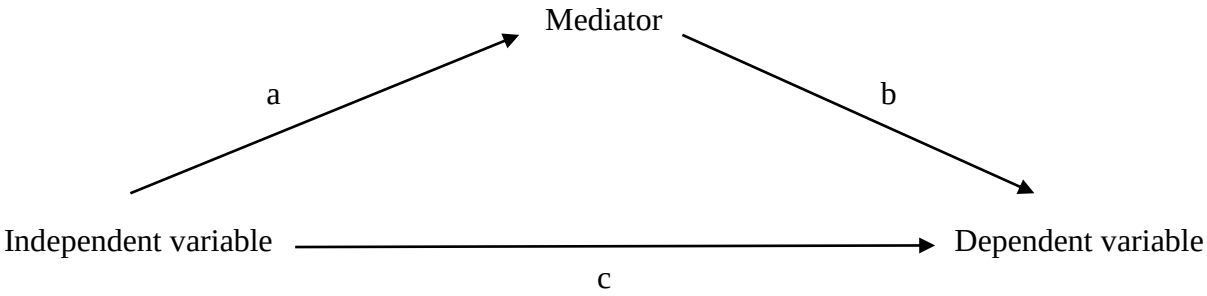

Figure 1.1. Mediator model. Source: Baron and Kenny (1986, p. 1176)

These three conditions require that the three paths (a, b, and c) are all individually significant. The final step consists of demonstrating that when the mediator and the independent variable are used simultaneously to predict the dependent variable, the previously significant path between the independent and dependent variables (c) is now reduced, if not non-significant. Maximum evidence for mediation would occur if c drops to 0.

The current study used the Baron and Kenny mediation model by fitting the data to it. Self-esteem was used as the independent variable in the current study while career choice behavior was used as the dependent variable. Career self-efficacy belief was used as the mediator variable.

The mediation model is as shown below;

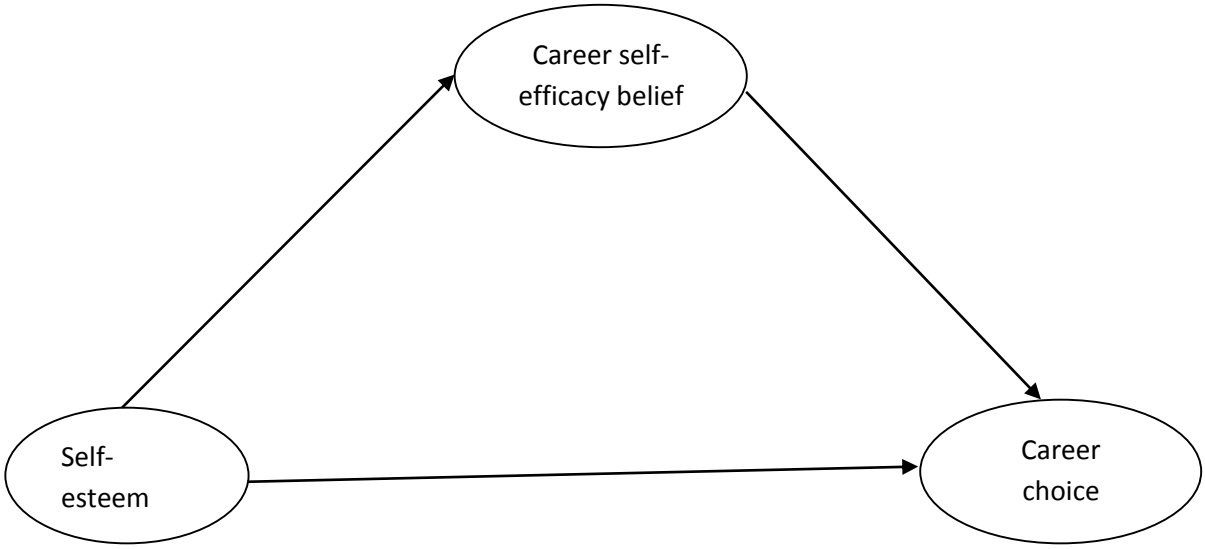

Figure 1.2. A Mediation Model showing the relationship among self-esteem, career self-efficacy belief and career choice behavior. Borrowed from Baron and Kenny (1986) Mediation Model.

Figure 1.2 represents the mediation model of the current study which is a modification of Baron and Kenny (1986) mediation model. It therefore stipulates that the relationship between self-esteem which is the independent variable and career choice behavior which is the dependent variable can be enhanced by the career self-efficacy belief which is the mediating variable. Therefore, for there to be a mediating relationship, self-esteem must be able to influence career choice behavior. Secondly, self-esteem must influence career self-efficacy belief and lastly career self-efficacy belief must influence career choice behavior. To determine whether career

self-efficacy belief mediates in the relationship between self-esteem and career choice behavior, its simultaneous use with self-esteem must reduce the initial level of relationship between self-esteem and career choice behavior. This study sought to test the plausibility of that assumption among students in Migori sub-county with a view to improving career choice behavior.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

The Literature Review is presented in 5 sub-headings based on the study objectives namely: Self-esteem, career choice behavior across gender, career self-efficacy belief, relationship between self-esteem and career choice behavior and career self-efficacy belief as a mediator.

2.2 Self-Esteem

An individual's self-esteem is one of the major factors in self-image or self-concepts and considered to be an important determinant in human behaviour. As such self-esteem has been conceptualized and examined in a variety of ways in the educational, sociological and psychological contexts. Self-esteem according to Ferkany (2008) is "how a person feels about him or herself, good or bad, and as manifested in a variety of ways, for example, in pride or shame, but especially in self-confidence". Possession of high self-esteem has positive behavioural benefits. These include independence, responsibility taking, and toleration of frustration, resistant to peer pressure, willingness to attempt new tasks and challenges, ability to handle positive and negative emotions, and willingness to offer assistance to others (Ferkany, 2008). Self-esteem can influence various aspects of human behaviour including the level of aspiration, learning and delinquency. In education, self-esteem has been considered as one of the most important factors in determining success and failure in schools. Conversely, there are negative aspects of self-esteem that can cause undesirable effects on behaviours. Donnellan, Trzesniewski, Robins, Moffitt and Caspi (2005) noted that individuals with low self-esteem are prone to real-world externalizing problems such as delinquency and antisocial behaviour. Their study sought to determine the correlation between self-esteem and academic

self-efficacy belief, the current study however sought to establish the influence of self-esteem on career choice behavior in Migori sub-county.

Robins et al. (2002) carried out a study on self-esteem that covered the important life stages from childhood until old age. They found out that young children have a healthy level of self-esteem that decreases during school age as one interacts with peers and begins to compare with others. With the turbulence of adolescence, self-esteem continues to fall and remains unstable. Changes in the body, identity crisis and emotional changes are some of the causes of this very low self-esteem level at this stage. Once a person reaches adulthood, the quality of self-esteem begins to grow and continue to rise over the decades reaching its zenith around the age of 65 or 70 as one learns who he/she is and appreciates themselves for what they are. Self-esteem then again begins to decrease slowly until reaching the end of life as one begins to suffer from physical deterioration. Robbins et al. (2002) graph reveals that a man's self-esteem runs higher but is parallel to that of a woman throughout life. Only at the end of life, at very advanced ages such as 80 years does a woman's self-esteem overtake and slightly surpass that of men. Since Robbins et al. (2002) used longitudinal survey design to get their data, this study deviated from this by using descriptive survey design to get their data on the level of student self-esteem.

Self-esteem is found to be associated with some of the personality variables. Zhang and Postiglione (2001) explored the relationships between self-esteem, thinking styles, and socio-economic status in Hong Kong. The study was conducted with 694 students in a university in Hong Kong using Thinking Style Inventory (Sternberg & Wagner, 1992) and RSES for self-esteem measures. They found that those who are from higher socio-economic status tend to have higher self-esteem. They also found a relation between the thinking styles and socio-

economic status. They noted that there is a significant body of evidence and opinion that knowledge and understanding is constructed from prior (learner) knowledge and experience. While there is still debate as to how this process of construction occurs and as to what are optimal conditions for learner construction, it is agreed that learning is not a passive endeavor and that the process of learning is influenced not only by prior knowledge – as facts or data – but prior knowledge and experience, including a learner's self- evaluation of success or failure.

Following on from this, it can be argued that it is within the social dimension that an individual's self-esteem is constructed, in that esteem is an act of comparison with others from within the same social group or learning culture, and it is upon reflection of one's performance within each learning culture that one determines and evaluates one's performance and albeit confidence and or (self) worth within this social frame of reference (Zhang & Postiglione, 2001). Their study looked at the role of environment and culture in determining self-esteem level, the current study however did not focus on causes of variations in the level of self-esteem but on the variations self-esteem causes on the level of career choice behavior and career self-efficacy belief.

Arguably, one's self esteem is a relevant outcome of the process of evaluating one's performance over a variety of applications and the subsequent learning experience associated with that. It can be argued that if a learner has experienced success and its related positive connotations, then it is to be expected that that learner will have enhanced confidence and an expectation of further success – their esteem levels would be expected to be high. If, however, a learner is constantly failing to meet their own or their learning community's expectations one would expect them to lack confidence within the given situation and that they would possibly

exhibit symptoms related to low self-esteem (Zhang & Postiglione, 2001). Their study indicates the role of external environment determining one's level of self-esteem, the current study however focused on establishing students' level of self-esteem and how this level relates with other variables of career self-efficacy belief and career choice behavior.

Past research has indicated that self-esteem is associated with changes in self-efficacy (Lane, Jones & Steven, 2002). These results also reflect past studies in which positive self-esteem was a significant predictor of self-efficacy scores. The magnitude of self-esteem to a great extent influences the level of self-efficacy. An increase in the level of self-esteem will lead to a corresponding increase in level of self-efficacy (Ang, Neubronner, Oh & Leong. 2006). Since these studies were conducted among college students, the current study however focused on secondary school students to try and establish the relationship between the two variables of self-esteem and career self-efficacy belief.

FAWE (2000) in a study in Uganda reckon that a parent has a very important role in determining a child's self-esteem. The level of a mother's education determines to a great extent the level of a child's self-esteem. The more educated the mother is, the higher the level of a child's self-esteem. The finding of this study is in agreement with Khaulou (2004) who showed that there was a positive correlation between the mother's level of education and self-esteem in her adolescent children. The study included 550 adolescent boys and girls in Canada. She interpreted the results of her findings by saying that it was not only the educational level completed by the parents but also the positive and favourable attitude produced by culture and education. This study brings the parental role in a student's level of self-esteem. The study

used self-generated questionnaire to get the data, the current study however used the standardized RSE scale to get the level of self-esteem of students.

Okoko (2013) asserts that factors that influence an individual's self-esteem and academic performance include and not limited to school environment, teachers, peers, and the hidden curriculums as well as demographic factors such as parents' background affect learner's self-esteem as well as performance. The result of his findings showed that age and gender have an influence on self-esteem with 58.33% of the students who performed well feeling proud of their performance, more boys (50%) than girls (48%) aspiring to obtain a first degree and nearly all the students saying that they were proud of those teachers whom they felt made them perform well. This study brings out the causal effects of self-esteem without necessarily looking at how the level of self-esteem influence other behavioral aspects. It is this gap that the current study sought to fill by looking at how self-esteem influences career choice behavior.

Kanus (2013) in a study in Nandi North sub-county in Kenya agrees with these findings. She examined the difference in self-esteem based on gender. In her findings the mean of self-esteem score for boys and girls indicated a significant difference. She therefore concluded that gender has a significant influence on self-esteem with boys showing a higher level of self-esteem than girls. Since this study used a survey questionnaire to get its data, the current study deviated from this by using the standardized instrument for measuring self-esteem which is Rosenberg self-esteem scale to get its data with a view to finding out the level of students' self-esteem in Migori sub-county.

2.3 Career Choice Behavior across Gender

A study done by Peng (2001) on a sample of female college seniors experiencing career indecision revealed the role of career counseling in career choice process. The participants participated in a career group counselling, a wait-list control group, and an additional career-counselling group. The Career Decision Scale and the State-Trait Anxiety Inventory were administered to participants at pre-test and post-test. Analysis of covariance of state anxiety scores and career indecision scores yielded significant main effects for treatment. Participants in the career-counselling groups showed a decrease in scores on state anxiety and career indecision. Since this study brought the key role of career counseling in career choice, the current study therefore sought to seek the role of career guidance given at the onset of Form Three by establishing the level of career choice behavior of students at Form Three level.

Gaffner, David, Hazler and Richard (2002) study on factors related to indecisiveness and career indecision in undecided college students, proposed that proper interventions, which are more personal and intense, might result from a better understanding of what factors have strong relationships with student's level of indecisiveness. In a study by Perrone et al. (2001) on role model influence on the level of career decisiveness of college students, it was found that role model supportiveness, and quality of relationship contributed to the career choice of students. The same study indicated that majority of the students selected same gender role models. Since their study focused on college students, the current study however focused on secondary school students with a view to determining whether same gender role model influences level of students' career choice behavior in Migori sub-county.

According to the USA National Centre for Education Statistics (2005), 55% of male 12th grade students like Science, compared to only 46% of females. Additionally, 45% of male 12th grade

students think they are good at Science, while only 34% of females are confident in Science (NCES, 2005). These findings illustrate that although female students may have the aptitude to do well in Science classes, they do not demonstrate interest in them as much as other fields of study. In fact, there has been little or no change in the percentage of women entering into Science and Math careers between 1982 and 2000 (Taylor, 2001). This is significant in light of the immense changes in the job market over the past decade.

Careers in Computer Science and Engineering are increasing exponentially as the world is becoming more technology driven (Ceci, Williams, and Barnett, 2009). Consequently, girls who opt out of Science related majors would have even fewer options in the future. These studies focused on 12^{th} grade graduates who had a high Math score and found out that gender plays a key role in career decision making process, the current study however focused on all Form Three students in Migori sub-county regardless of their subject performance to try and find out whether there is career choice behavior disparity in terms of gender.

Harpur and Quirke (2011) in their report reckon that thousands of school leavers are missing out on suitable college or career choices because of poor planning. They say that the career guidance received by students is patchy and choices are distorted by overall points' race. Students are often making course choices for the wrong reasons as some students want to go to a particular college or university because of the social life and choose subjects because a friend has done so. Part of the problem is that students are not finding out enough knowledge about the courses before they go into them. Their findings revealed that only 5% of students receive career guidance while in the junior school and that career guidance is confined towards

the end of their senior schooling therefore leaving many of them regretting not having taken the subjects or subject levels necessary to access their preferred destinations.

Harpur and Quirke (2011) study also revealed that too much emphasis is placed on points and gaining entry to prestigious college courses and that, students were feeling "overwhelmed" and rushed by the importance of the decision they faced in their leaving certificate year. There was lack of one-to-one sessions to tease out each individual situations and that, many students choose colleges because they are close to their homes This study was carried out among university/ college students, the current study however focused on secondary school students by seeking to find out what their career choice behavior is.

Career self-efficacy, which refers to believe on oneself to perform a career task successfully, is found significantly explaining the difference in level of career choice (Kothari & Patra, 2016). Kothari and Patra (2016) study reckon that a person with belief on abilities to start and control a business, technical skills, business exposure, and sound business knowledge is more likely to opt for an entrepreneurial career. They used Pearson's chi-square test to examine the relationship between self-efficacy and entrepreneurial career choice and found that the relationship between self-efficacy and entrepreneurial career choice was statistically significant. Since Kothari and Patra (2016) study used Pearson's chi-square in establishing relationship between self-efficacy and career choice, the current study will however use linear regression to determine the relationship between career self-efficacy belief and career choice behavior.

Consequently, robust research in the field of entrepreneurship has explicitly investigated the relationship between entrepreneurial self-efficacy and entrepreneurial career choice.

Individuals with higher entrepreneurial self-efficacy have higher entrepreneurial levels of career choice (Krueger, Reilly, & Carsrud, 2000; Segal, Borgia, & Schoenfeld, 2002; Wang, Wong, & Lu, 2002). Respondents with high entrepreneurial self-efficacy also have higher degrees of belief that they possess a viable idea for a new business or pursuing a career path in the field of entrepreneurship. This therefore brings to focus the role of self-efficacy in the level of career decidedness. The higher the level of self-efficacy the higher the level of career decidedness (Wang et al., 2002) Their study focused on the role of entrepreneurial self-efficacy in the level of career decidedness, the current study however focused on the role of career self-efficacy belief determining the level of career choice behavior.

A Study on career choice in Ethiopia by Stebleton (2007) indicated that the students had an external locus of control and believes that there are numerous external factors which influence their career choices. These external factors include; political and economic considerations, previous work experience and the influence of key individuals in a person's life. This therefore brings to focus, the fact that career choice is not necessarily an individual's own decision, but a decision which is subject to many other factors. The current study in an attempt to investigate the role of external factors in student career choice therefore sought information on the role of other important people to a student in their career choice. Readiness of teachers in the careers' education has its equal share of issues of concern in the student career choice readiness.

Mwangi (2002) work on education and career aspirations in secondary schools, observed that teachers had heavy teaching workloads and many students to attend to, leaving little or no time to offer substantial careers' education. He noted that 65% of the students appeared not to have

had specific orientation to careers, though, about half of them (career indecisiveness notwithstanding) dreamt of joining public universities.

Consequently, a study by Osoro, Amundson and Borgen (2000) on careers decision-making of high school students in Kenya, indicated that 85% of teachers were insufficiently prepared for career counselling work for students at secondary schools. This trickled down to a conclusion that most students at the university admissions point, may have had no thorough careers education and consequently may have lacked specific career choices. The current study therefore sought to establish the role of career counselors in the process of student career choice in Migori sub-county.

According to Oyamo and Amoth (2008), rural students tend to seek help from parents more than urban students and that parents more than teachers play a major role in the career choice of students. Generally, the choice of a career is influenced by parents, friends, and counselors however variations occur from one population to the other. The current study as such investigated how other important people in a student's life influenced their career choice.

Kochung and Migunde (2011) reckon that as an individual makes career choice, there are often certain benefits that one expects to come with from the career chosen. These benefits are referred to in their study as outcome expectations. The results of their study indicated that a high number of students 47.3% strongly agreed that availability of jobs influenced their career choice, 24.3% agreed while 11.7% were neutral. Since their study was conducted in Kisumu municipality which is an urban set up, the current study sought to find the level of career choice behavior in the fairly rural set up of Migori Sub-county.

2.4 Career Self-Efficacy Belief

More than three decades ago, Bandura (1977) theorized that a potent influence on student behaviour is the beliefs that they hold about their capabilities. According to social cognitive theory, students are more likely to have an incentive to learn if they believe that they can produce the desired outcomes (Bandura, 1986). Hence, self-efficacy beliefs are powerful predictors of the choices that students make, the effort that they expend and their persistence in facing difficulties. Furthermore, aside from task value, a major motivational component of expectancy-value theory is self-efficacy beliefs.

Bassi, Steca, Fave and Caprara (2007) has noted that in academic settings, students' perceived self-efficacy affects their academic interest and motivation, management of academic stress. Researchers have been successful in demonstrating that self-efficacy beliefs are positively related to and influence academic achievement and that these beliefs mediate the effect of skills, previous experience, mental ability, or other self-beliefs on subsequent achievement (Pajares & Schunk, 2001). Since self-efficacy beliefs have been shown to have the power to mediate in the relationship between various related psychological concepts, the current study focused on this premise by attempting to determine the mediating role of career self-efficacy belief in the relationship between self-esteem and career choice behavior.

In social situations, individuals have varying perceptions of their ability to successfully interact with others. In other words, their self-efficacy beliefs reflect their level of social confidence (Bandura, 1977). The possession of strong self-efficacy beliefs has been related to positive outcomes in academic achievement (Bandura, Pastorelli, Barbaranelli, & Caprara, 1999) and career choice (Betz & Hackett, 1997). Self-efficacy beliefs regarding competence have

important implications for improving student outcomes (Aldridge & Fraser, 2008). These studies point to the power of career self-efficacy belief to influence outcomes without focusing on a specific outcome, the current study, however focused specifically on the influence of career self-efficacy belief on career choice behavior among students.

Over the past few decades, increased attention has been paid to the process by which career decisions are made (Miller, Roy, Thomas & McDaniel, 2009). The potential importance of the self-concept and self-esteem to vocational behaviour has long been recognized (Leong & Barak, 2001). More recently research has focused on the construct of self-efficacy, which refers to an individual‘s belief in their ability to perform a particular behaviour. Self-efficacy expectations refer to a person‘s belief concerning his or her ability to successfully perform a given task or behavior and were perceived to be major mediators of behaviour and behaviour change (Bandura, 1977). Low self-efficacy expectations regarding a particular behaviour could lead to avoidance of those behaviours, whereas stronger self-efficacy expectations would more likely lead individuals to approach behaviour. The current study therefore looked at the level of students’ career self-efficacy belief with a view to determining its role in career choice behavior.

According to Schwarzer and Schmitz, (2005) low self-efficacy is associated with depression, anxiety and helplessness. A person with low self-efficacy has low self-esteem and may harbor pessimistic thoughts about their accomplishment and personal development. The current study therefore looked at the relationship between these two constructs: self-esteem and career self-efficacy belief with a view to finding out how this relationship impacts on career choice behavior.

Fenci and Scheel, (2005) state that it is particularly exciting to note that teaching strategies used in the classroom can and do make a difference to students' self-efficacy. The type of learning environment and teaching method can improve self-efficacy in classroom. In their study, collaborative learning and the use of electronic applications showed a positive correlation with increased self-efficacy in their student sample. Consequently, teachers with a high sense of efficacy about their teaching capabilities may have an easier time motivating their students and enhancing their cognitive development. These teachers may also be able to rebound from setbacks and more willing to experiment with new ideas and techniques. Low efficacious teachers may rely on controlling teaching style and may be more critical of students (Woolfolk, 2003). Whereas these studies focused on the self-efficacy of both teachers and students the current study only focused on the career self-efficacy belief of students in a bid to find how it influences career choice behaviour.

Adio (2010) affirms that most investigations of self-efficacy in academic settings have sought to determine the predictive value of self-efficacy on performance. He notes that academic achievement and general performance depend heavily on students' personal conviction of being in charge of their own fate. In his study of the self-efficacy of librarians he notes that the difference in career self-efficacy of librarians may be due to the ability of librarians to overcome difficult situations rather than accepting failure in their area of work. This is in accordance with research by Helsin and Klehe (2006) who affirmed that self-efficacy helps employees collect relevant information, make sound decisions and take appropriate actions particularly when they are under pressure. These studies focused on employees at work places. However, the current study focused on secondary school students by looking at how their level of self-efficacy belief influences their career choice behaviour.

Salami (2010) in his work brings out the idea of the need by everyone to participate in improving the self-efficacy of students. He notes that to achieve the required objectives set out for students, counselors and lecturers with the cooperation of college managements and parents, should design appropriate interventions strategies to enhance emotional intelligence and self-efficacy factors related to students' behaviours and attitudes. This study focused on college students, the current study however focused on secondary students. Consequently, the current study did not focus on the role of managers or other stakeholders but only looked at how career counselors aid in improving career self-efficacy belief of students during their career guidance and counseling.

Murugami (2010) brings out the role of academic environment in determining level of career self-efficacy belief. She states that the educational institution which one attended significantly affected vocational concept which was found to be having a significant positive relationship which could be described by means of linear regression equation with decision making self-efficacy. It was evident that learners in schools with higher standing had a more developed self-concept than those in schools with lower standing. This study was carried out among learners with visual impairment, the current study however focused on all types of learners. Since Migori sub-county is predominantly composed of schools with low standing (mixed day schools) one would expect a low level of career self-efficacy belief according to Murugami (2010). The current study therefore sought to test this assertion.

2.5 Relationship between Self-Esteem and Career Choice Behavior

Melgosa (2014) asserts that self-esteem is an important factor from the first steps leading to employment. This begins with career choice, for instance, those with high self-esteem will be

very enthusiastic to make a career choice whereas those with low self-esteem will doubt their worthiness towards accomplishing various career tasks and therefore shy away from making such choices During the job interview, candidates with healthy self-esteem have greater chances of being employed and once hired, this successful experience gives a boost to self-esteem. This therefore brings the central place of self-esteem in career choice.

In Davidson et al. (2012), self-esteem was the independent variable, it was hypothesized that University students with a high self-esteem will directly enter the labour market after graduation. Although there was no direct relationship between these two variables, there was a positive relationship between self-esteem and the labour market, meaning those that had a higher self-esteem believed that the outlook of the labour market was positive. There was also a negative relationship between self-esteem and taking time off, so those who had a lower self-esteem were more likely to take time off after graduation. This implies that high self-esteem translates to positive career decision making while low self-esteem creates indecisiveness. Davidson et al. (2012) did their study among university students. However, the current study focused on secondary school students to find out whether their level of self-esteem influences their level of career choice behavior.

The famous Bandura (1977) expressed the concepts of how the person's self is relatable; self-efficacy coveys a person's perception of their ability to reach a goal, similar to self-esteem which is related to a person's sense of self-worth. Research has shown that students who commit to career jobs have an increased self-esteem (Bardick, Bernes, Magnusson, & Witko, 2006). According to Judge and Hurst (2008) having a positive mental attitude and a high self-esteem can literally double the chances of career success. According to their study, they found that participants who scored high on self-evaluation enjoyed success earlier in their career,

engaged in continued higher education and advanced more quickly than those who scored lower on self-evaluation. Moreover, the advantages gained by having a positive self-image compounded over the 25 year period were strongly correlated with overall career satisfaction, higher pay and better health. They conclude by asserting that believing in oneself is more than just a motivational slogan, it can strongly influence long term career advancement and overall health. Since Judge and Hurst used a longitudinal survey design this study deviated from this by using a correlation design to find the relationship between self-esteem and career choice behavior.

Consequently, Wilkinson (2010) notes that low self-esteem is something that permeates every aspect of your life, making it difficult for you to interact with others and to get close to people as you are convinced you are not good enough. It also affects your life chances, as you believe that you are incompetent and useless at whatever you try your hand at as you automatically assume that you will fail. Clearly, then, low self-esteem is bound to impact on your choice of job, since you have such little belief in yourself that you will probably stop yourself from reaching your full potential. When you have low self-esteem, it is easier to stick with the jobs that you know you can do without much difficulty than to apply for jobs which demand more of you. This study focused on individuals with low self-esteem, the current study however focused on self-esteem by determining the relationship between level of self-esteem and level of career choice behavior.

2.6 Career Self-Efficacy Belief as a Mediator

Wengener and Fabrigar (2000) note that mediation is a causal model that explains the process of why and how a cause-effect relationship happens. Hence, a mediation analysis attempts to

'identify the intermediary process that leads from the independent variable to the dependent variable' (Muller, Judd & Yzerbyt, 2005). In other words, in a simple mediation model, the independent variable is presumed to cause the mediator, and in turn, the mediator causes the dependent variable. For this reason, a mediation effect is also termed an indirect effect, surrogate effect, intermediate effect, or intervening effect (MacKinnon, Warsi & Dwyer, 2002). In the current study, self-esteem was the independent variable, career self-efficacy belief, the mediator and career choice behavior, the dependent variable. It was therefore believed that self-esteem would influence the mediator which is career self-efficacy belief which in turn would influence career choice behavior.

Baron and Kenny, (1986) argued that for us to claim a mediating relationship, we need to first show that there is a significant relationship between the independent variable and the mediator. The next step is to show that there is a significant relationship between the mediator and the dependent variable. Then we need to show that there is a significant relationship between the independent and dependent variable. In the current study we therefore proved that self-esteem (Independent variable) has a relationship with career self-efficacy belief (Mediator) which in turn showed a relationship with career choice behavior (Dependent variable).

Three main approaches are commonly employed for analysis of the statistical mediation model. These approaches are: 1) causal (first) step; 2) difference in coefficients (second step); and 3) product of coefficients (third step). The required data used in these three approaches is mainly obtained from the three regression equations, displayed below (Baron & Kenny, 1986).

$$Y = \alpha_1 + \beta_1 X + \varepsilon_1 \qquad (1)$$

$$Y = \alpha_2 + \beta_2 X + \beta_M M + \varepsilon_2 \quad (2)$$

$$M = \alpha_3 + \beta_3 X + \varepsilon_3 \quad (3)$$

Baron and Kenny (1986) state that in the above equations, Y is considered as the dependent variable;α_1, α_2 and α_3 are intercepts; and M indicates the mediator; X represents the independent variable;β_1 indicates the coefficient related to the dependent and independent variables;β_2 shows the coefficient connecting the dependent variable to the independent one, and, ultimately, adjusting them for the mediator;β_M represents the coefficient linking the mediator indicator to the dependent variable adjusted for the independent one;β_3 indicates the coefficient connecting the independent to the mediator variable; and, finally,ε_1, ε_2, and ε_3 indicate the residual terms. Nevertheless, it is noteworthy to mention that the mediation functions can be modified to produce both nonlinear and linear effects as well as M and X interactions in Equation (2).

The statistical analysis tool mostly used in mediation relationship is Structural Equation Model. Structural equation modeling (SEM) is a statistical method used in order to test and estimate causal relationships by using causal assumptions and statistical data (Bartholomew, 1999). Both confirmatory and exploratory modeling can be used by SEM. In other words, SEM is suitable for both theory extension and theory testing. In confirmatory modeling, which begins with a hypothesis as a causal model representative, the model concepts must be operationalized in order to permit testing of the relations of concepts in the model. Then the model will be tested against gathered measurement data to specify whether the model fits the data or not (Bartholomew, 1999). In the current study, an already theorized model of the three constructs was used in SEM and consequently subjected to various model fit tests.

Career self-efficacy has a strong ability to mediate in relationships involving various behavioral factors (Pajeres, 2002). Bandura's (1986) Social Cognitive Theory of human development postulates that human functioning is determined by personal, behavioral, and environmental factors. According to Pajares (2002) this perspective views human functioning as the "product of a dynamic interplay of personal, behavioral, and environmental influences. Pajares (2002) explained that people interpret the results of their own behavior in a way that "informs and alters their environments and the personal factors they possess which, in turn, inform and alter subsequent behavior". Furthermore, Bandura (1986) suggested that individuals be viewed as pro-active, self-organizing, self-reflective, and self-regulating beings, assigning a central role to the cognitive processes involved in human adaptation.

Pajares (2002) proposed that career self-efficacy beliefs are "the very core of social cognitive theory". The construct of career self-efficacy is defined as one's belief regarding the capability to accomplish a goal that exerts influence over one's life. Bandura (1994) further suggested that self-efficacy beliefs are integral to how individuals think, feel, behave, and motivate themselves. Individuals with strong self-efficacy beliefs tend to set higher goals and persist toward achieving those goals. Bandura believed that "humans, who engage in considerable self-reflective thought, boost or undermine their efforts by beliefs about their capabilities" (Bandura, 1986). Since these studies were conducted in a different environment, the current study was conducted in the local environment by determining the relationship that exists among career self-efficacy belief self-esteem and career choice behavior.

Furthermore, Bandura (1986) also postulated that career self-efficacy plays a mediational role in the judgments of self-efficacy beliefs. He posited that performance constraints and

disincentives might limit performance in highly skilled and self-efficacious individuals. His belief is that these individuals may choose to produce at a level of which they are capable due to a lack of "incentive to do so, because they lack the necessary resources, or because they perceive social constraints in their envisioned path or outcome" (Pajares, 2002).

Lent, Brown, and Hackett (2002) developed the Social Cognitive Career Theory (SCCT) based on Bandura's (1986) self-efficacy theory This theory postulates that self-efficacy influences career development and outcome expectations. The authors proposed a positive relationship between self-efficacy, work adjustment, job satisfaction, and stress reduction (Lent, Brown, & Hackett, 2002). The theory postulates that performance is directly influenced by self-efficacy and outcome expectations (Lent, Brown, & Hackett, 2002). The authors believe that critical to success is the extent to which one views the endeavor as successful. If the person perceives few barriers, the likelihood of success reinforces the career choice, but if the barriers are viewed as significant there is less interest. The current study as such attempted to establish the influence of career self-efficacy belief factor in impacting on the relationship between self-esteem and career choice behavior in Migori sub-county.

According to Lian, Pan, Gai and Zhan (2017) career self-efficacy can be explained as a self-recognition of doing a decent job. Career self-efficacy is in the reciprocal process between the self and job. In this process, many factors such as society, environment, education and one's own quality show their influence to career self-efficacy and evaluation. A person will feel more positive about its future career if it has high career self-efficacy, as the same time, it hunts the job more proactively (Lian et al., 2017). At the beginning of the 21st century, many researchers wanted to know which factors can affect the career self-efficacy. On the one hand, some

researchers summarized the influence factors of career self-efficacy. Nauta (2004) summarized the five generalized effects on career self-efficacy. The study of Betz and Hartman (2007) showed that, the impact of self-efficacy could be summarized as three types of effects (e.g. neuroticism, aesthesia and extraversion). On the other hand, some researchers used the validation of the model to identify influencing factors.

Nota, Ferrari, Soresi, Wehmeyer (2007) have shown that students who attended college preparatory high schools experience higher levels of decision-making and career self-efficacy. Career self-efficacy plays an important role in the relationship between career decision-making and family support by using a sample of Italian high school youth (Lent et al., 2003). Since these studies indicate influence of career self-efficacy on career choice, among college students and employees, the current study focused on influence of career self-efficacy belief on career choice behavior among secondary school students in Migori sub-county.

Lin and Flores (2011) tested the mediation effect of career self-efficacy in the relationship between effectiveness source variables and job search behavior. And career self-efficacy widely used to do as a mediator in many research models. Kounenou (2012) found that the mediating role of career decision self-efficacy is significant in determining behavior outcome.

Bardick, Bernes, Magnusson and Witko (2006) studied the influence of self-esteem on career self-efficacy belief whereas Okediji et al. (2009): Nesdale and Pinter (2000): Tella and Ayemi (2007): Salami (2010): Murugami (2010): Kagume (2010) studied the influence of career self-efficacy belief on career choice behavior with none looking at a situation where career self-efficacy belief mediates in the relationship between self-esteem and career choice behavior. It is this gap that this study sought to fill by using career self-efficacy belief as a mediator in the

relationship between self-esteem and career choice behavior among students in Migori sub-county with a view to improving career choice behavior.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This section described the research procedure beginning with: Research design, area of study, study population, sampling technique and sample size, research instruments, pilot study, reliability of the instruments, validity of the instruments, data collection procedure, methods of data analysis, and ethical considerations.

3.2 Research Design

A mixed model research design, which includes both quantitative and qualitative components, was adopted in the study to best describe components in the study. The designs embraced here are Descriptive Survey design and Correlation research design. Descriptive Survey is a method of collecting information by interviewing or administering a questionnaire to a sample of individuals (Orodho, 2003). Correlational research design on the other hand involves collection of data or searching out of records of a specific population and ascertaining the relationship among the variables of interest (Orodho, 2004). This study used descriptive survey design to test objectives 1, 2 and 3 while correlational design was used to test objectives 4 and 5. Data obtained from questionnaires were able to give levels required for objectives 1, 2 and 3. These levels were subjected to correlation tests to ascertain the relationships in objectives 4 and 5.

Descriptive survey design was used since it is quick and practical in terms of financial aspects and allows a flexible approach, thus when important new issues and questions arise during the duration of the study, further investigation may be conducted (Orodho,2003).This method also gave the researcher a greater option in selecting instruments to analyze the primary data got

through interview and questionnaire and secondary data got through reading of literatures on self-esteem, career self-efficacy belief and career choice behavior (Orodho, 2004).

Correlation design on the other hand was used since it has a predictive value as when we know the correlation between two measures, we are able to predict one form of behavior from knowledge of the other. For example, correlation between self-esteem and career choice behavior can be predicted once one the level of self-esteem has been established. It is also important when studying the effects of events which cannot be simply studied in a laboratory setting and may be the only available method when ethical considerations prevent manipulating the phenomenon for example abortion (Orodho, 2004).

3.3 Area of the Study

The study was carried out in Migori sub-county of Migori county–Kenya. Migori sub-county boarder's kuria West Sub-county to the South, Uriri sub-county to the North Nyatike sub-county to the West, Narok and Kisii County to the East. It lies between $0^0$40'and 0^0 South longitude 34^0 50' East. Main features here include, River Migori and gold mines around Nyarongi and Mikei villages (Suna). It has a total population of about 46,000 people as per 2009 population census, with 49% being between 0-14 years, 33% being between 15 – 34 years 14% between 35 – 64 years and 3% being above 64 years. It has a tarmac road covering 72 km, murram covering 32.4 km and earth covering 51.4 km. There is electricity covering most parts of the sub-county and adequate telecommunication network. Economic activities here include fishing in River Migori, mining of gold at Mikei and Nyarongi and sand mining at the bank of River Migori. There is also manufacturing at B.A.T Company, Alliance One and Mastermind Company. Agricultural products include tobacco, maize, millet, sugarcane and

vegetables. There is a National cereals board depot in Migori town. The sub-county also sees some limited commercial activity, mainly small and micro-enterprises in the jua kali sector. These include auto mechanics, furniture works, tailoring, welding, trade and Agriculture. It has adequate rainfall with 2 rainy seasons with temperatures being between 21 – 35^{o}c. It has 43% of the entire population living below the poverty line (Republic of Kenya, 2010).

Only 15% of Migori sub-county residents have secondary level of education. Suna Central ward has the highest share of residents with a secondary level of education or above at 31%. This is five times Wasimbete ward, which has the lowest share of residents with a secondary level of education or above. A total of 65% of Migori sub-county residents have a primary level of education only. Some 20% of Migori sub-county residents have no formal education.

The rate of unemployment in Migori sub-county is quite high. Only 9% of the residents with no formal education, 9% of those with a primary education and 22% of those with a secondary level of education or above are working for pay. The rest are dependent on peasant farming and micro businesses. In general, Migori sub-county has 86% of its population dependent on Agriculture, 6^% on self-employment, 4 % on informal employment and a dismal 4 % on formal employment (Republic of Kenya, 2010). This presents an acute lack of career development in the sub-county necessitating the study. Consequently, the sub-county only has 2 functional guidance and counseling offices which implies that students lack opportunity of having one to one talk with career counselors on their career choice. The key variables in this study were self-esteem, career choice behavior and career self-efficacy belief.

3.4 Study Population

Population for this study consisted of Form three students of 2015 and career counselors. The total population of form 3 students in Migori sub-county is 2010, that is, 1205 boys and 805 girls whereas the number of career counselors is 34. The Form 3 students were chosen since they have gone through career guidance from their respective career counselors during subject selection process and have henceforth selected subjects of study based on the requirements for the chosen careers.

3.5 Sampling Technique and Sample Size

The study used purposive sampling to determine the number of schools to be selected out of the 34 schools in the sub-county. Purposive sampling must have a sampling plan describing the sampling parameters, that is, the participants, setting and events (Dornyei, 2007). This study considered these parameters when selecting the 10 schools with regard to category such as mixed day school, boy's boarding school, girls boarding school. This was used to obtain maximum variation sampling which aims at capturing the central theme that cuts across participant variations (Kombo & Tromp, 2006).

The researcher purposively decided to use 10 schools as that would provide a good representation. Since there were 30 mixed day secondary schools, a higher proportion of 8 schools were randomly selected from this category. There were 2 boys boarding schools and 2 girls boarding schools. Again 1 school was randomly selected from each category. The ten career counselors from these schools were all used.

According to Fisher et al. (1991) where the study population is less than 10,000, sample size is calculated by the formula

$n_f=n/1+(n/N)$

Where n_f is the sample size, n is the desired sample size when the study population is less than 10 000 and N is the estimated population size.

$n= z^2pq/d^2$

Where p is the proportion having desired characteristics =0.50, q= (1-p)=0.5, z is the Z score which is the recommended confidence interval= 1.96 (95%), d= 1-(95/100)=0.05.

$n= 1.96^2 \text{ X } 0.50 \text{ X } 0.50/0.50^2$

n= 384

Thus

$n_f=384/1+(384/2010)$

$n_f=322$

Therefore, the sample size was set at 322.

Simple random sampling was used to select 322 students which was established as the sample size. Simple random sampling is where people, places or things are randomly selected and was used as the sample yield research data that can be generalized to a large population (Kombo & Tromp, 2006). To do this, the names of 900 students from schools sampled were written in different sheets of papers then placed in an urn then well mixed. 322 names were then picked with replacement randomly noting all the names already selected to avoid repetition.

3.6 Research Instruments

The researcher employed both qualitative and quantitative data collection techniques by administering questionnaires to students and interview schedules to career counselors. The instruments that were used are Rosenberg Self-Esteem Scale Career Decision Self-Efficacy Scale-Short Form, Career Decision Scale and Career Counselors Interview Schedule. Of the four, only Career Counselors Interview Schedule was developed by the study. The other three were standardized instruments that were adapted to fit the local/ cultural environment.

3.6.1 Rosenberg Self-Esteem Scale (RSE)

To measure self-esteem of students, the Rosenberg Self-Esteem Scale was used (see Appendix C1). The Rosenberg Self-Esteem scale (Rosenberg, 1965) is the most widely used measure of global self-esteem (Demo, 1985). Rosenberg Self-Esteem Scale has questions related to overall feelings of self-worth or self-acceptance. The scale has ten items on a 5-point Likert-type scale requiring responses of Strongly Agree (4), Agree (3), Undecided (2), Disagree (1) and Strongly Disagree (0). The items are of two categories, that is, positive self-view and negative self-view. For the items with negative self-view, the scoring is reversed; (0 = 4, 1 = 3, 2 = 2, 3=1 4=0). For those items with positive self-view, the scores are simply added. The scale has 2 sub-scales of self-competence and self-liking. The first 5 items measure self-competence while the last 5 items measure self-liking. Rosenberg Self-Esteem Scale has demonstrated good reliability and validity across a large number of different sample groups (Demo, 1985). Studies such as Rosenberg (1965); Silber and Tippett (1965); Shorkey and Whiteman (1978) have all given a high rating of reliability of above .77.

3.6.2 Career Decision Scale (CDS)

In studying career choice behavior, the Career Decision Scale was used (see Appendix C2). The CDS by Osipow (1987) is an instrument used to assess career decisiveness. The instrument contains 19 items. The scale is divided into two sub-scales: certainty and uncertainty sub-scales. The first 2 items measure career certainty and the next 16 items measure career uncertainties and one free response item, which allows respondents to list other barriers, not reported in the scale items. Responses are recorded on a 5-point Likert-type scale ranging from 0 - "not at all like me" to 4 - "exactly like me." Scores on the Certainty Scale can range from 2 to 10 with higher scores indicating greater certainty. Scores on the Indecision Scale can range from 16 to 80 with higher scores indicating greater indecision. The negatively worded statements (item 2 – item 18) are reversed during scoring. The Career Decision Scale has been employed in a large number of studies which have examined its validity and have found it to be a valid instrument (Osipow, 1987). Consequently, studies such as Brown and Brooks (1996); Super (1990); Westbrook (1997) have all given test re test reliability coefficients of above .80

3.6.3 Career Decision Self-Efficacy Scale-Short Form (CDMSE-SF)

To study career self-efficacy belief, Career Decision Self-Efficacy Scale-Short Form (CDMSE-SF) was used (see Appendix C3). The Career Decision Self-Efficacy Scale (Betz, Klein & Taylor, 1996) measures an individual's confidence that they can successfully complete career tasks and consists of a total of 25 questions. The responses are scored on a 5-point interval Likert-type scale, and are; (0) No Confidence at All (1) Very Little Confidence (2) Moderate Confidence (3) Much Confidence (4) Complete Confidence. The Career Decision Self-Efficacy Scale Short Form contains five subscales of: Self-Appraisal, Occupational

Information, Problem Solving, Planning and Goal Selection. CDMSE-SF was used for this study because research has shown that the 25-item scale is as highly reliable and valid as the longer 50-item scale (Betz & Taylor, 2001).

3.6.4 Career Counselors Interview Schedule

To get data on the role of career self-efficacy belief on career counseling, the career counselors interview schedule was used (see Appendix D). Career counselors interview schedule consists of a set of structured questions that require the input of career counselors on their opinion on the role played by career self-efficacy belief in career choice behavior. The researcher asked the respondents questions then the researcher wrote down the verbal responses given. The career counselors interview schedule was used since it received a high validity rating from the experts in the Department of Psychology, Maseno University..

3.7 Pilot Study

A pilot study was conducted to pre-test the instruments in order to ascertain their reliability and validity in Migori sub-county setting. The pilot study was conducted in different schools that were not sampled in the main study to prevent contamination error. The pilot study comprised of 10% of the sampled population (Connelly, 2008) that formulated a sub-sample of 32 participants. These participants for the pilot study were selected using the same parameters employed in sampling of schools for the main study. 24 students were randomly sampled from 8 mixed day secondary schools with 3 students taken from each school. 8 students were randomly sampled from girls' boarding school and boys' boarding school with 4 students taken from each school respectively.

3.7.1 Reliability of the Instruments

Reliability is a measure of how consistent a measuring instrument is (Kombo & Tromp, 2006). Test-re-test technique was used to test the reliability of the research instruments. This method involves administering the same questionnaire to the same set of respondents within a period of about 2 weeks.

Reliability of the questionnaires was therefore established through test-re-test method. The instruments were administered twice at an interval of 2 weeks. Mean score for each item answered by each respondent in the first test and second test were worked out. Pearson Product Moment Correlation coefficient (r) was worked out between the mean scores of the two tests to establish the reliability of the instruments at a set significance level of .05. A Pearson r of .82 was found for RSE, .80 was found for CDS and 84 was found for CDMSE-SF Since all the 3 instruments obtained a coefficient of more than .70, which is acceptable, the instruments were considered reliable (see Appendix G).

3.7.2 Validity of the Instruments

Validity is concerned with how well a measuring instrument measures what it is supposed to measure (Kombo & Tromp, 2006). The research instruments were validated beforehand by the education psychology experts at Maseno University. They reviewed and analyzed the contents of the questionnaires and interview schedules in order to ascertain that the instruments were suitable for the purpose for which they were designed. They offered suggestions which the researcher used in introducing the necessary corrections and improvements to the instruments.

3.8 Data collection Procedure

The researcher sought permission for data collection through the Maseno University School of Graduate Studies (SGS) which gave an introductory letter. An application was then made to the Maseno University Ethics Review Committee which then gave the authority to collect data. The researcher then visited the Migori County Director of Education (CDE) and the Migori Sub-County Education Office (SCEO) to give information about the intended study. The researcher then visited the schools sampled for the study to seek permission from the principal to conduct the study and then requested the principal to seek permission from the Parents Teacher Association (PTA) to allow students participate in the study. The researcher then made appointment to go back for actual data collection which was done through administering questionnaires. Appointments were made with the career counselors and a date appropriate to each was used to collect data from them. The administration time varied between 30-40 minutes. The researcher put down the responses in the case of interview schedule while responses from the questionnaires were collected immediately after being completed by the respondents. The researcher was assisted by one trained research assistant in collecting data.

3.9 Methods of Data Analysis

According to Seliger and Shohamy (2011) data analysis involves sifting, organizing, summarizing and synthesizing the data so as to arrive at the results and conclusions of the research. Descriptive Statistics, Correlation Analysis and Structural Equation Model were used to analyze the data. Once the data has been collected qualitative data obtained from interview schedules were transcribed and reported. Quantitative data obtained from closed ended questionnaires were tabulated and analyzed using Descriptive Statistics such as percentages, graphs, averages and charts. Descriptive Statistics was used to analyze objectives 1,2 and 3.

Correlation Analysis was used to measure the extent of relationship between two given variables. Variables were as such regressed against each other to obtain the strength of the relationships using correlation coefficients. Correlation analysis was used to analyze the relationship between self-esteem and career self-efficacy belief in objective 3 and the relationship between career self-efficacy belief and career choice behavior in objective 2.

Analysis of Moment Structure was used to measure relationships. This was first done by running Confirmatory Factor Analysis (CFA) to test the conformity between the observed variables and the corresponding latent variables. To assess the significance of factor loadings, the regression weights of observed variables were established and were deemed significant at a Critical Ratio Test of 1.96 or higher (or -1.96 or lower) and a p-value of .05 and below.

Estimation of model fit was then done to assess whether the model perfectly fits the data using various indices which have varied model fit ranges of significance. The fit index statistic tests the consistency between the predicted and observed data matrix with a view of finding out whether the observed actually measure the latent. Due to the sensitivity level of chi-square fit index especially, towards the multivariate normality assumption violations (Garson, 2007), the researcher therefore used various indices enlisted below to test the model fit. These indices have varied criterion that must be met for a model to be considered to have a good fit index.

The first Index used was Normal chi-square fit index (CMIN/DF),

$$\chi 2/df$$

CMIN/DF serves to adjust the testing of chi-square according to the sample size. Statistics

take 5 as an adequate fit value, while more conservative researchers believe that chi-square values larger than 2 or 3 are not acceptable.

Root Mean Square Residual (RMR) was also used to determine the model fit. It shows the mean squared amount's square root, which distinguishes the sample variances and covariance from the corresponding predicted variances and covariances. The assessment relies on an assumption that considers the model correct. The smaller the RMR, the more optimal the fit is.

The other index used was Goodness of Fit Index (GFI). It is used for gauging the discrepancy level between the estimated or predicted covariances and resulted or observed ones.

$$\text{GFI}=1-\left\{\frac{\max\left[\left(\chi^2-df\right)/n,0\right]}{\max\left[\left(\chi^2_{null}-df_{null}\right)/n,0\right]}\right\}$$

The allowable range for GFI is between 0 and 1, where 1 indicates a perfect fit, which demonstrates that measures equal to or larger than 0.90 signify a 'good' fit. Consequently, the Adjusted Goodness-of-Fit Index (AGFI) which is utilized for adjustment of the GFI relating the complexity of the model was used to test the model fit.

$$\text{AGFI}=1-\left\{\left(1-GF\right)\frac{d_{null}}{d}\right\}$$

The measuring of AGFI is between 0 and 1, in which 1 or over 1 (AGFI>1.0) signifies a perfect fit, nevertheless, it cannot be bounded below 0, i.e., (AGFI<0). As in the case of GFI, AGFI values equal to or bigger than 0.90 signify a 'good' fit.

The other index used was Root Mean Square Error of Approximation (RMSEA). It is employed to gauge the approximation error in the population.

$$\text{RMSEA}=\left\{\frac{\left(\chi^2-df\right)}{(n-1)df}\right\}^{1/2}$$

In cases where the RMSEA value is small, the approximation is believed to be optimal. An approximately 0.05 or smaller value of RMSEA means a more appropriate and closer model fit in connection with the degrees of freedom. Nevertheless, between 0.05 and 0.08 displays the most preferable status and the more optimal fit results.

The study also used Normed Fit Index or Bentler Bonett Index or NFI. This index is applicable to contrast and compare the fit of a suggested model against a null model.

$$\text{NFI}=\left[\chi^2/df_{(NullMode)}/\chi^2/df_{(ProposedMode)}\right]\Big/\left[\chi^2/df_{(NullMode)}\right]$$

This index defines all the observed variables as uncorrelated. The values of NFI range between 0 and 1, where 0.90 signifies an optimal fit.

Tucker Lewis Index or Non-Normed Fit Index the TLI or NNFI index which is used to gauge parsimony, which is applicable through the evaluation and assessment of the degrees of freedom of the suggested model to the degrees of freedom of the null model was also used.

$$\text{NFI}=\left[\chi^2/df_{(NullMode)}/\chi^2/df_{(ProposedMode)}\right]\Big/\left[\chi^2/df_{(NullMode)}-1\right]$$

A TLI that is larger than 0.90 is considered a good fit. The last index that was used to assess model fit was Comparative Fit Index. A (CFI) is not only less affected by the sample size, but also based on comparison of the hypothesized model to the null model**.**

$$\text{CFI}=1-\left\{\frac{\max\left[\left(\chi^2-df\right),0\right]}{\max\left[\left(\chi^2-df\right),\left(\chi^2_{null}-df_{null}\right),0\right]}\right\}$$

The values of CFI range between 0 and 1. However, its values need to be a minimum of 0.90 to be usable for a model fit.

Structural Equation Model was then used to determine the relationship between self-esteem and career choice behavior. SEM was developed as a superior model to the first-generation methods. The first-generation methods such as multiple regressions were suitable for assessing constructs and relations between constructs. The first purpose of regression analysis is prediction while the intent of a correlation is to evaluate the relationship between the dependent and independent variables (Tabachnick, 2001).

According tom Tabachnick (2001) the main reason for choosing SEM in the current research over the first-generation research is the ability of evaluating model constructs relationships simultaneously. Whereas first generation methods look at both the indicators and the factors as observed, SEM considers observed variables as manifests of the latent. Consequently, analysis of all the variables in the same time would be possible by SEM as compared with the first generations, which performed analysis separately.

In addition, measurement error is not accumulated in a residual error term. Structural Equation Modeling (SEM) or path analysis is a very powerful multivariate technique that is specialized versions of other analysis methods and enables researchers in measurement of direct and indirect effects and performing test models with multiple dependent variables and also using of several regression equations simultaneously. This is in addition to enabling statistical analysts to handle difficult data including; time series with auto-correlated error, non-normal data and even incomplete data (Fornell, 1984).

SEM was therefore used to determine the relationship between self-esteem and career choice behavior by regressing career choice behavior on self-esteem. SEM was also used to find the mediating role of career self-efficacy belief on the relationship between self-esteem and career choice behavior. This was done by first checking the model fit for the relationship between self-esteem and career choice behavior, then secondly, checking the model fit for a situation where both self-esteem and career self-efficacy belief are combined as the exogenous variable and career choice behavior as the endogenous variable. If the second model fit is more parsimonious than the first model fit, then CSEB is said to mediate in the relationship between SE and CCB.

3.10 Ethical Considerations

The researcher first explained to the respondents the nature of the study and the reason why he is collecting the data. This included the importance of the study both to the respondent and the researcher. The respondents were also made aware that their participation in the study is purely voluntary and failure to take part would not attract any penalty whatsoever. The results of the findings remained confidential as individual responses were not known in any way since the respondents did not put down their names. The result of the study was provided to the school administration of the schools where the study was conducted so that the respondents could get a report of the study.

A copy of consent form was provided to respondents and the researcher took them through the contents of the form and they only signed for consent to participate once they felt that they were comfortable with the conditions provided (see APPENDIX A). A copy of information sheet containing all ethical considerations was also availed to each respondent taking part in the study by attaching it to the questionnaires for them to only proceed after agreeing with the

issues presented (see APPENDIX B). For the cases of interview, the researcher read out the information on this sheet to the respondents and he only proceeded when the respondents were in agreement. In case of any queries or complaints that could arise later, the respondents were in a position to channel them to either the university or the researcher through the addresses given in the information sheet which never occurred.

Data was collected using the 3 questionnaires provided to each learner and through interviews for career counselors. This data remained anonymous and confidential as no identification detail was put on either the questionnaires or the interviews except the detail in the consent form that was provided to the students. As such a coding only known to the researcher and the research assistant was made on the questionnaire that corresponds with the one on the consent form associated with it. The questionnaires were then kept separately from the consent forms in locked cabinet files whose keys were held either by the researcher or the research assistant and therefore no other person would be able to gain access to the copies.

The collected data was then coded into the computer and saved in the researcher's laptop, flash disk and in the researcher's e-mail account. In all these cases a password only known to the researcher and his assistant was created to protect the data.

CHAPTER FOUR

RESULTS AND DISCUSSION

4.1 Introduction

This chapter presents the results, analysis and discussion of the data collected In the current study, data was analyzed and discussed according to the stated objectives of, To: Establish the level of self-esteem of students in Migori sub-county, Establish career choice behavior across gender of students in Migori sub-county, Establish the level of career self-efficacy belief of students in Migori sub-county, Determine the relationship between self-esteem and career choice behavior and Determine the ability of career self-efficacy belief to mediate in the relationship between self-esteem and career choice behavior.

The findings of this section were presented in the following sub-headings of: Demographic information, level of student self-esteem, student career choice across gender, role of other people in students' career choice, level of student career choice behavior across gender, level of student career self-efficacy belief, relationship between self-esteem and career choice behavior and mediating role of career self-efficacy belief.

4.1 Demographic Information

Background information on Form 3 students who took part in this study was analyzed in terms of school type, age and gender. The results are presented in Table 4.1 below.

Table 4.1: Demographic Data

School Type	16-17 Years				18 Years and Above				Total	%
	Male		Female		Male		Female			
	F	%	F	%	F	%	F	%		
Boys	11	3.4			5	1.6			16	5
Girls			8	2.5			3	0.9	11	3.4
Mixed	74	23	59	18.2	96	30	66	20.4	295	91.6
Total	85	26.4	67	20.7	101	31.6	69	21.3	322	100

Key: F-frequency, %-percentage

From Table 4.1, a total of 186 (57.8%) boys and 136 (42.2%) girls took part in the study. This is reflective of the situation on the ground as rural schools (Migori sub-county being predominantly rural) generally have a higher percentage of boys than girls (United Nations Educational, Scientific and Cultural Organization, UNESCO, 2012). From this population, a dismal 11 girls (3.4%) and 16 boys (5%) came from schools with one gender whereas 295 (91.6%) came from mixed gender schools. The higher percentage of those from mixed gender was attributed to the fact that that Migori sub-county has 30 mixed gender schools and only 4 single gender schools. The sample for this study was as such mainly composed of students with low academic achievement at the KCPE level as those who join mixed day schools are those who to a greater percentage score 300 marks and below (Kenya National Examination Council, KNEC, 2002). As evident above in table 4.1 students aged 18 years above were more

(162; 50.3%) than those below 18 years (133; 41.3%) in the mixed gender category. This is the converse in the single gender schools where the boys who were aged below 18 years (11; 3.4%) were more than those who were aged 18 years and above (5; 1.6%). Since the sample for the study was 91.6% from mixed day secondary school, the participants for this study were much older. This is typical for rural schools (United Nations Educational, Scientific and Cultural Organization, UNESCO, 2012). This therefore reflects the scenario in the ground quite well as Migori sub-county is fairly rural.

4.2 Level of Student Self-Esteem

The objective being addressed here is: To establish the level of self-esteem of students in Migori sub-county. In this objective the researcher focused on the level of student self-esteem in Migori Sub-county. According to RSE scores on strongly disagree and disagree are categorized as low self-esteem score whereas those of agree and strongly agree are categorized under high self-esteem scores. Scores on undecided are categorized as medium self-esteem. The frequencies for respondents who strongly disagreed was therefore added to that of disagreed to get low SE whereas frequencies for agreed and strongly agreed was added to get high SE score with undecided remaining as medium self-esteem. The result is shown in Table 4.2.

Table 4.2: Level of Student Self-Esteem

Level of self-esteem	F	%
High	278	86.3
Medium	14	4.3
Low	30	9.3

Key: F-frequency, %-percentage

The self-esteem level of students was quite high with 86.3% of students having high SE. With only 9.3% of the students having low self-esteem, Students from Migori sub-county can be said to be having high self-esteem levels. This finding is quite in contrast with those of Okoko, (2013) which found out that 137 out of 142 (74%) of students from sub-county schools had low self-esteem with only 7% having high self-esteem. On the other hand, students from national and extra-county schools had a high self-esteem rating of 89.6% and 77.5%. They assert that self-esteem is determined by school type since in Kenya admissions into various school types is based on level of performance at KCPE level. Hence the higher marks a student gets the higher the level of self-esteem. This view contradicts with the findings of the current study since despite majority of sampled students coming from sub-county schools (70%) the self-esteem rating remained high at signifying that self-esteem is not determined by level of performance or school type for that matter.

Robins et al. (2002) also found self-esteem to be low during the adolescent stage. They note that with the turbulence of adolescence, self-esteem continues to fall and remains unstable. Changes in the body, identity crisis and emotional changes are some of the causes of this very low self-esteem level at this stage. Since the Form Three students are assumed to be in the adolescent stage, it would imply that their self-esteem is expected to be low. However, both

the studies look at self-esteem as a concept that is not dependent on several environmental factors surrounding a student at a particular time.

Self-esteem is indeed dependent on several factors that surround a person's life at a particular time (Khaulou, 2004). Khaulou (2014) study included 550 adolescent boys and girls in Canada. She interpreted the results of her findings by saying that it was not only the educational level completed by the parents but also the positive and favourable attitude produced by culture and education. Self-esteem levels cannot be described by one single concept. Consequently, Wylie (1979) notes that research indicate persistent relationship between various aspects of self-perceptions and variety of school related variables including perceived social status among peers, pro-social behavior, emotional status, school administration, teachers, counselors and overall school achievement. All these factors influence a student's self-esteem and therefore one cannot single out a particular variable to be the main factor.

The high level of self-esteem in the current study could be as a result of interchange of various factors listed above. Also based on the fact that form these students have just done subject selection based on their preferred careers they are as such having a enthusiasm about the entire process which could possibly raise their level of feelings of self-worth.

4.3 Level of Career Choice Behavior across Gender

The objective addressed by this section is: To establish the career choice behavior of students across gender in Migori sub-county. Career Decision Scale was used to collect data on this objective. Based on this, the researcher focused his analysis on four main areas of: student career choice across gender, role of other people in student career choice, the level of students' career choice behavior across gender and influence of career self-efficacy belief on career

choice behavior.

4.3.1 Students Career Choice across Gender

The CDS provides respondents with an opportunity of stating their career choice in item 3 which reads: If I had the skills or the opportunity, I know I would be a __ _but this choice is really not possible for me. The researcher as such analyzed data for item 3. This presented the career choices that the students had made. The result for item 3 is as follows.

Table 4.3: Students Career Choice across Gender

	Males		Females		Total	
Career	**F**	**%**	**F**	**%**	**F**	**%**
Doctor	41	22.04	23	16.91	64	19.88
Lawyer	33	17.74	19	13.97	52	16.15
Engineer	35	18.82	5	3.68	40	12.42
Teacher	16	8.60	21	15.44	37	11.49
Nurse	2	1.08	26	19.11	28	8.70
Pilot	13	6.99	3	2.21	16	4.97
Police	7	3.76	3	2.21	10	3.11
Soldier	6	3.23	2	1.47	8	2.48
Chef	4	2.15	3	2.21	7	2.17
Secretary	0	0	6	4.41	6	1.86
Lecturer	5	2.69	1	0.74	6	1.86
Musician	3	1.61	3	2.21	6	1.86
Air hostess	0	0	5	3.68	5	1.55
Artist	3	1.61	0	0	3	0.93
Model	0	0	3	2.21	3	0.93
Scientist	1	0.54	0	0	1	0.31
Unstated	17	9.14	13	9.56	30	9.32
Total	**186**		**136**		**322**	**100**

Key: F-frequency, %-percentage

From the above table, only 30 students (9.32%) had not made their career choices implying that a greater majority had made their career choices. It is evident that the choice of being a doctor ranked highest with 64 students (19.88) choosing it. The number of males (41) who chose this career almost doubled that of females (23). The choice of being a lawyer followed

closely with 52 students (16.15%) choosing it. Again, more males (33) than females (19) chose it. Engineering attracted 40 students (12.42%) but it looked like a male career with only 5 females (3.68%) out of the 40 choosing it. However, this trend changes when it comes to careers perceived to be feminine in nature. Out of the 28 who chose nursing, a whopping 26 were females as compared to the 2 males. This was replicated in the case of secretarial air hostess and modeling choice where all the 6, 5 and 3 respectively who chose them respectively were females. Gender therefore comes out as a major factor in career choice as students in this study tended to choose careers that are in line with their respective gender.

More females chose nursing, secretarial, modeling and air hostess whereas more males chose police, soldier, chef and artist due to historical stereotyping of these careers as belonging to one particular gender. Students as such choose them by looking at same gender role models in their environment thus agreeing with Perrone et al. (2001) study on role model influence on the career decisiveness of college students, they found that role model supportiveness, and quality of relationship contributed to the career choice of students. The same study indicated that majority of the students selected same gender role models.

Consequently, the choices of doctor, lawyer, engineer, and pilot were highly chosen perhaps due to their prestigious and high level of wages associated with them together with job availability. This agrees with Kochung and Migunde (2011) who reckon that as an individual makes career choice, there are often certain benefits that one expects to come with the career chosen. These benefits are referred to in this study as outcome expectations. On the same note though not highly salaried, teaching and nursing ranked high due to easy job availability. The findings of the current study are in agreement with the results of Kochung and Migunde (2011)

study, which indicated that a high number of students (71.6%) agreed that availability of jobs influenced their career choice.

4.3.2 Role of Other People in Student Career Choice

The CDS provides the respondents with an opportunity of stating career choices which they would have made had it not been that they go against the wishes of important people around them. This brings to effect the role of other people in a student's career choice. Statement 6 of the CDS which reads: I'd like to be a _____, but I'd be going against the wishes of someone who is important to me if I did so. Because of this, it's difficult for me to make a career decision right now. I hope I can find a way to please them and myself**,** addressed the. The result of this is as shown in the table below.

Table 4.4: Influence of others in Student Career Choice across Gender

	Males		**Females**		**Total**	
Career	**F**	**%**	**F**	**%**	**F**	**%**
Police	6	3.23	3	2.21	9	2.80
Musician	4	2.15	5	3.68	9	2.80
Teacher	4	2.15	4	2.80	8	2.48
Dancer	2	1.08	2	1.47	4	1.24
Unstated	**170**	**91.40**	**125**	**91.91**	**295**	**91.61**

Key: F-frequency, %-percentage

With 91.40% of males and 91.61% of females un stating their career choices here, it therefore signifies that they had made their career choices and were not being limited by anyone in the choices they made. A dismal 8.6% of males and 8.31%of females were the only ones who

stated their choices here showing that they had made career choices but could not pursue them since they went against the wishes of important people in their lives. From the above table, it can be seen that society plays a role in one's career choice. The careers chosen here are generally those that have negative perception or receive condemnation as musician and dancing. Again, same gender role model is seen to play a role in this area as well as the number of males who choose police double that of females at 3. This could be due to the fact that it is a masculine job and therefore females shy away from it.

This category of students could not make a career decision explicitly though they had these careers as their careers of preference. This brings the important role played by "important others" around our lives. This is in consistency with Oyamo and Amoth (2008) findings that studies in Kenya show that rural students tend to rely on parents more than urban students and that parents more than teachers play a major role in the career choice of students. Generally, the choice of a career is influenced by parents, friends, and counselors however, variations occur from one population to the other. Since our study was conducted on a largely rural set up the students' choice was dependent more on parents and those around them. They could therefore not explicitly state their career choices due to fear of disapproval from those important people in their lives especially if these important people had either chosen for them a career or had openly shown disapproval of what they may have had in mind as their preferred choice.

Moreover, career choices such as musician and dancer, went against spiritual and social values and as such they feared condemnation from others around them. This is in line with Daffy and Dick (2009) research on the role of spirituality and religion in career development. They affirm

that although limited in scope, it has suggested that such factors relate positively to desirable career development outcomes such as career decisions. For many people with spiritual or religious commitment faith plays a critical role in the career decision making process.

4.3.3 Level of Student Career Choice Behavior across Gender

The researcher analyzed the level of student career choice behavior across gender by looking at levels of the two genders as well as looking at the overall level for both of them. Responses for not at all like me and only slightly like me were added to give low level of CCB whereas responses for very much like me and exactly like me were added to give high level of CCB. Moderately like me remained as medium level of CCB (see Appendix D2). The result is as shown below in Table 4.5.

Table 4.5: Level of student CCB across Gender

CCB level	Males		Females		Total	
	F	%	F	%	F	%
High	154	82.8	101	74.3	255	79.2
Medium	31	16.7	31	22.8	62	19.3
Low	1	0.5	4	2.9	05	1.6

Key: F-frequency, %-percentage

Table 4.5 shows that the level of career choice behavior of students was high with 79.2% of students having high CCB and only 1.6% having low CCB. In terms of gender, the level of CCB is slightly higher in males than females with a margin of 8.5% among students with high

CCB and 2.4 among those with low. This high level of CCB could be attributed to the fact that Form Three students have just gone through career counseling during subject selection process and are as such enthusiastic about career choice.

The finding of this study is in agreement with the results of Gitonga (2013) study findings in Kiambu West District which stated that, percentage of those students below average was 36% and those above average was 64%. Those who were very certain about their career choice were 61 out of 170 (36%) thus presenting high level of career choice. The finding also concurs with Pulliam, Kara and Larry (2017) study which indicated that 48.1% reported being sure about their current career choice, 34% reported having somewhat of an idea, and 17.9% reported having no idea. They asserted that the level of career certainty of pre-freshmen college students was as such high. Oral face to face interview with the career counselors also revealed the same. One career counselor when asked how often he does career counseling and how effective it is, responded that:

> Due to the huge load I have in my teaching subjects, I do career guidance and counseling when students join Form Three class as we have to enlighten them on subjects that are required for various careers. In terms of its effectiveness, I can say it is effective as learners become very excited about their career choice and indeed you even see an effort being made to redouble effort in terms of hard work to achieve the requirements of their chosen careers.

All the career counselors interviewed were in agreement that career counseling that was done at the onset of Form Three was effective as it greatly brought interest in students to choose their careers. This is in line with Oyamo and Amoth (2008) who in their study brought the important role of career counseling to help improve career choice behavior.

4.3.4 Influence of Career Self-Efficacy Belief on Career Choice Behavior

In order to establish the power of career self-efficacy belief to influence the level of career choice behavior, a linear regression analysis of career elf-efficacy belief and career choice behavior was conducted. The results are s shown below in Table 4.6

Table 4.6: Regression Analysis of Career Self-Efficacy Belief and Career Choice Behavior

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.249[a]	.062	.059	.627

a. Predictors: (Constant), Career Self-efficacy Belief

According to the model summary above, the estimation between career self-efficacy belief and career choice behavior revealed that there is a relationship given by the magnitude of the regression coefficient of 0.062. This indicates that changes in career self-efficacy belief gives rise to 6.2% in career choice behavior. This is in agreement with Pulliam, Kara and Larry (2017) study among pre-freshmen college students who asserted that career self-efficacy, as measured by the Career Decision Self-Efficacy Scale-SF (Betz & Taylor, 2006), will significantly predict certainty of initial career as measured by a Likert-type question on the demographic form. They conducted a linear regression to test this. Based on the results from the linear regression, career decision self-efficacy predicted career certainty based on the R^2 value of .069 which implied that career decision self-efficacy explained 6.9% of the variance in the variable of career certainty.

4.3.4.1 Significance of the Relationship between Career Self-Efficacy Belief and Career Choice Behavior

To be able to establish the significance of the relationship between career self-efficacy belief and career choice behavior, ANOVA was run on the data. The significance level is set at a p-value of .05 and below. The results are as shown in Table 4.7 below.

Table 4.7: ANOVA (Career Self-Efficacy Belief and Career Choice Behavior)

Model 1	Sum of Squares	Df	Mean Square	F	Sig.
Regression	8.344	1	8.344	21.215	.000[b]
Residual	125.867	320	.393		
Total	134.211	321			

a. Dependent Variable: Career choice behavior

b. Predictors: (Constant), Career self-efficacy belief

ANOVA table above revealed that the relationship is significant i.e. (F=21.215; p = 0.000) since the p-value is below the significance set level of a p-value of .05 and below. This concurs with Pulliam, Kara and Larry (2017) who in testing the hypothesis of their study found that career self-efficacy belief significantly influences career certainty at F (1, 103) = 7.61, p = .007. This is again in congruence with Betz and Taylor (2006) who asserted that since the p-value of the relationship between career self-efficacy belief and career decidedness is way below the customary level of .05, the relationship is quite significant.

4.3.4.2 Effects of Variations on Independent Variable

To get the level of response of the dependent variable whenever there is a variation in the independent variable coefficient was run and results shown below in Table 4.8.

Table 4.8: Coefficients (Career Self-Efficacy Belief and Career Choice Behavior)

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	1.523	.185		8.221	.000
Career self-efficacy belief	.248	.054	.249	4.606	.000

a. Dependent Variable: Career choice behavior

From the coefficient table above, any unit increase in the level of career self-efficacy belief results into a positive and significant increase in the career choice behavior by 0.248 (p=0.000). This implies that career self-efficacy belief variations lead to a positive and significant variations in career choice belief and therefore there is a meaningful relationship between the two variables. This corroborates with the finding of Kothari and Patra (2016) study on the relationship between self-efficacy and entrepreneurial career choice. They established that an increase in level of self-efficacy would lead to increase in level of entrepreneurial career choice by 3.488 (p=0.001).

The current study findings have affirmed Betz and Taylor (2006) assertion in their study between career self-efficacy belief and career decidedness that career self-efficacy belief is an important factor in the career choice process as the higher it is the higher the level of career decidedness. Wang et al. (2002) agrees with this position by noting that self-efficacy would greatly influence entrepreneurial career choice decidedness. A move to boost self-efficacy would automatically lead to an increase in entrepreneurial career choice.

4.4 Career Self-Efficacy Belief

This sub section addressed objective 3 which reads: To determine the level of career self-efficacy belief of students in Migori sub-county. Data for this section was analyzed under two sub sections of: level of career self-efficacy belief and influence of self-esteem on career self-efficacy belief.

4.4.1 Level of Career Self-Efficacy Belief

The level of career self-efficacy belief was analyzed by categorizing responses into 3 different sections of high CSEB, medium CSEB and low CSEB. High CSEB was got by adding responses for much confidence and complete confidence whereas low CSEB was got by adding responses for very little confidence and no confidence at all. Responses for Moderate confidence remained as medium CSEB (see Appendix C3). The result is in Table 4.9.

Table 4.9: Level of Career Self-Efficacy Belief

Level of CSEB	F	%
High	272	84.5
Medium	41	12.7
Low	9	2.8

Key: F-frequency, %-percentage

From Table 4.8 the level of CSEB of students in Migori Sub-county is quite high with 84.5% having high CSEB and only 2.8% having low CSEB. The high level of CSEB could be as a result of the fact that students had just gone through the career counseling process during subject selection process and were as such still confident in their ability to perform the career tasks in their careers of choice. Oral face to face interview with the career counselors also revealed the same. One career counselor when asked how effective career counseling is, responded that:

> Career counseling at the Form Three entry level is quite effective. It may look as a mere exercise involving subject selection, but I tell you it goes a long way in shaping a student's career choice. Learners at that level become quite confident in undertaking the tasks in their career of choice. You even notice them seek to undertake tasks in their careers of choice during their leisure time. This period is a period of heightened self-confidence.

This concurs with the findings of Ochieng (2015) study whose findings show a high level of self-efficacy among learners with an overall self-efficacy of 3.7. The findings of this study could have registered a higher score due to the higher score of self-esteem as indicated below.

4.4.2 Influence of Self-Esteem on Career Self-Efficacy Belief

In order to determine the relationship between level of self-esteem and level of career self-efficacy belief, a linear regression analysis was conducted between self-esteem and career self-efficacy belief. The results are as shown below in Table 4.10.

Table 4.10: Regression Analysis for Self-Esteem and Career Self-Efficacy Belief

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.273[a]	.065	.062	.620

a. Predictors: (Constant), Self esteem

According to the model summary above, the estimation between self-esteem and career self-efficacy belief revealed that there is a relationship given by the magnitude of the regression coefficient of 0.065. This indicates that changes in self-esteem gives rise to 6.5% in career self-efficacy belief. This implies that the two variables are related to each other. This finding is in agreement with Sogh and Zerei (2016) study which established that self-esteem influence career self-efficacy belief. The relationship in his study had a regression coefficient of 0.12. They asserted that variations in self-esteem gave rise to 12% in career self-efficacy belief.

Other studies have also shown correlation between these two constructs of self-esteem and self-efficacy belief meaning that individuals with higher self-esteem also tend to report higher levels of social self-efficacy Wulff and Steitz (1999) identified a correlation of r = .38 between generalized self-efficacy and self-esteem and Betz and Klein (1996) found a correlation of r = .53 for males and r = .43 for females between generalized self-efficacy and self-esteem. These

studies demonstrate a moderate relationship between the constructs of generalized self-efficacy and self-esteem.

This is also in agreement with past studies done between self-esteem and academic self-efficacy. Afari, Ward and Khine (2011) established that the positive self-esteem and the academic self-efficacy had a slightly strong relationship ($r = 0.44$). The relationship was statistically significant at the $p<.001$ level. Past research has reported significant positive impact of self-esteem and academic self-efficacy (Ang, Neubronner, Oh, & Leong, 2006; Smith, Walker, Fields, Brookins & Seay, 1999).

Other studies have also concurred with these findings by asserting that self-esteem is associated with changes in self-efficacy (Dodgson & Wood, 1998; Lane, Jones & Steven, 2002). These results also reflect past studies in which positive self-esteem was a significant predictor of self-efficacy scores (Ang et al. 2006).

4.4.2.1 Significance of Relationship between Self-Esteem and career Self-Efficacy Belief

To be able to establish the significance of relationship that exists between self-esteem and career self-efficacy belief, ANOVA test was run on the data and the results indicated in Table 4. 11.

Table 4.11: ANOVA (Self-Esteem and Career Self-Efficacy Belief)

Model		m of Squares	Df	Mean Square	F	Sig.
	Regression	8.721	1	8.721	23.472	.000[b]
1	Residual	118.316	320	.382		
	Total	124.183	321			

a. Dependent Variable: Efficacy

b. Predictors: (Constant), Self esteem

Given the ANOVA table above, the relationship is significant i.e. (F=23.472; p = .000) since the p-value falls within the recommended range of .05 and below. This is in agreement with Sogh and Zerei (2016) study where they were able to determine that the relationship between self-esteem and career self-efficacy belief is a significant one. They asserted that with an F-value of 8.5 and a p-value of 0.0001 the relationship was significant as the p-value of 0.001 was below the standard value of 0.05.

4.4.2.2 Effects of Variations on Independent Variable

To get the level of response of the dependent variable whenever there is a variation in the independent variable, coefficient test was run and results shown below in Table 4.12.

Table 4.12 Coefficient Table

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	1.387	.172		8.144	.000
	Self esteem	.261	.068	.271	4.812	.000

a. Dependent Variable: Efficacy

From the coefficient table above, any unit increase in the level of self-esteem results into a positive and significant increase in the career self-efficacy belief by 0.261 (p=0.000). This is in concurrence with Sogh and Zerei (2016) study where they found that an increase in self-esteem level resulted to positive and significant increase in career self-efficacy belief by 0.307 at a p-value of 0.001.

Results from studies indicate that a high level of self-esteem translates to a high level of career self-efficacy belief. The higher the self-esteem, the higher the career self-efficacy belief and vice versa. This view is supported by Sherer et al. (1982) who studied the relationship between self-esteem and self-efficacy. They discussed that high scores of self-esteem are associated with increase in general and social self-efficacy.

4.5 Relationship between Self-Esteem and Career Choice Behavior

This sub section addressed objective 4 which reads: To determine the relationship between self-esteem and career choice behavior. To assess the relationship between self-esteem and

career choice behavior, Structural Equation Model (SEM) was used. This was done by using Analysis of Moment Structures (AMOS) program.

4.5.1 Confirmatory Factor Analysis

Confirmatory factor Analysis was done as the initial step in Structural Equation Model to test the significance of the factor loadings. The essence of the CFA was to determine whether the 2 sub-scales of self-esteem (self-competence and self-liking) and the two sub-scales of career choice behavior (certainty and uncertainty) are actual indicators of self-esteem and career choice behavior respectively. This was done by establishing the regression weight of the observed variable on the latent variable. The results were extracted from AMOS and presented as shown in the table 4.13 below.

Table 4.13: Standardized and Unstandardized Coefficients for CFA

Observed variable	Latent Construct	B	B	SE	CR	P
Self-competence	Self-esteem	.146	.699	.032	4.545	.0006
Self-liking	Self-esteem	.144	.809	.060	2.408	.016
Certainty	Career choice behavior	.225	.670	.050	4.472	.0005
Uncertainty	Career choice behavior	.217	.635	.041	5.247	.0004

Note: CFA is Confirmatory Factor Analysis

From Table 4.12 it is evident that self-liking has the highest standard loading for self-esteem at .809 followed by self-competence for self-esteem at .699. Uncertainty's loading for career

choice comes last at .635. To establish the significance of these loadings, regression weights of various observed variables was obtained. Regression estimate for all the observed variables are below .3 with all their SE being below .1. All their CR is above 1.96 and all their p-values are below .05. Based on the Critical Ratio Test which states that a Critical Ratio of 1.96 or higher and (-1.96 or lower) indicate two sided significance at the customary 5% level, all these factors significantly load on the latent as all their CRs are above 1.96 and their p-values are below .05. As such the CFA test is significantly proven thereby implying that the observed are actual indicators of the latent.

4.5.2 Estimation of Model Fit

To determine whether the theorized model actually fits the data in this study, a number of fit indices were conducted to ascertain this. The results are as presented in table 4.14 below.

Table 4.14: Model Fit Result and Criterion for Significance

	Normal Chi-square Fit Index (CMIN/DF)	Root Mean Square Residual (RMR)	Goodness of Fit Index (GFI)	Adjusted Goodness of Fit Index (AGFI)	Root Mean Square Error of Approximation (RMSEA)	Normed Fit Index (NFI)	Tucker Lewis Index (TLI)	Comparative Fit Index (CFI)
Default model	.109	.001	1.000	.998	.000	.999	1.026	1.000
Criterion for model fit	<2	Small as to approach 0	Between 0 and 1 with 1 indicating perfect fit	Between 0 and 1 with 1 or >1 indicating perfect fit	Approximately 0.05 or smaller	Between 0 and 1 with values close to 1 indicating perfect fit	Larger than 0.90	Between 0 and 1 with a minimum of .90
Outcome	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit

Since the model meets the criterion limits set for all the indices, the model is therefore said to fit the data perfectly and as such a good model for measuring the relationship between the two latent variables of self-esteem and career choice behavior.

4.5.3 Structural Model

Using an already theorized model of 2 latent variables and corresponding 2 observed variables for each latent variable, Self-esteem was drawn as the independent variable having two observed variables of self-competence and self-liking while career choice behavior was drawn as the dependent variable having 2 observed variables of certainty and uncertainty. A structural model was drawn and extracted from AMOS as shown in the Figure 4.1 below.

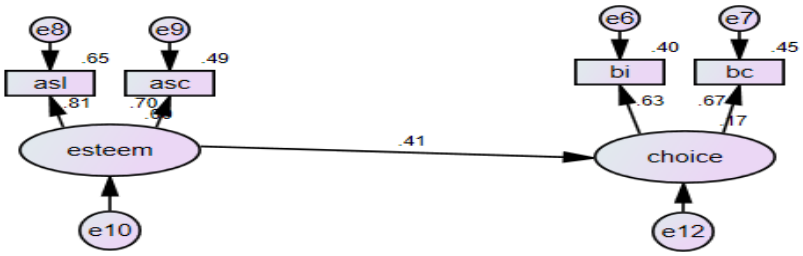

Figure 4.1. A Two Factor Structural Model of self-esteem and career choice behavior extracted from AMOS

Key: asl-self-liking sub scale, asc – self-competence sub scale, esteem-self-esteem, bi-uncertainty sub scale, bc- certainty sub scale, choice-career choice behavior

The model in Figure 4.1 is a structural model for the data collected for this study extracted from AMOS. The two hypothesized factors of self-esteem and career choice are drawn as latents, which are assumed to be the manifest of the four observed variables. The arrows from the factors to the variables represent linear regression coefficient or factor loadings. We do not

assume that the latent factors completely explain observed variations; each observed variable is associated with a residual error.

The Regression estimate for the relationship between self-esteem and career choice behavior as seen in Figure 4.1 is .41. To be able to ascertain the significance of this relationship, regression weight for the relationship was worked out as shown in Table 4.15.

Table 4.15: Structural Equation Model Result

Independent variable	**Dependent variable**	**B**	**β**	**SE**	**CR**	**P**
Self-esteem	Career choice behavior	.41	.065	.019	3.500	.0003

From Table 4.14 above, the regression estimate for self-esteem and career choice behavior is .41. This is significant considering the fact that the relationship had a CR test of 3.500 and a p-value of .0003. The significance level set is a CR greater than 1.96 and a p-value less than .05 significance level signifying that the two factors correlate favorably. This therefore implies that self-esteem does relate with career choice behavior significantly. This finding is in consistent with Judge and Hurst (2008) who found out that self-esteem does have an effect on the career choice process. They assert that having a positive mental attitude and a high self-esteem can literally double the chances of career success. According to their study, they found that participants who scored high on self-evaluation and self-esteem enjoyed success earlier in their career, engaged in continued higher education and advanced more quickly than those who

scored lower on self-evaluation. Moreover, the advantages gained by having a positive self-image compounded over the 25 year period were strongly correlated with overall career satisfaction, higher pay and better health.

This view is echoed by Wilkinson (2010) who notes in his study that low self-esteem is something that permeates every aspect of your life, making it difficult for you to interact with others and to get close to people as you are convinced you are not good enough. It also affects your life chances, as you believe that you are incompetent and useless at whatever you try your hand at as you automatically assume that you will fail. Clearly, then, low self-esteem is bound to impact on your choice of career, since you have such little belief in yourself that you will probably stop yourself from reaching your full potential by chosing a career.

4.6 Mediating Role of Career Self-Efficacy Belief

Figure 4.1 represents a Two Factor confirmatory analysis for self-esteem and career choice behavior. The model emerged as a good fit for the data and produced a significant regression between the 2 factors. The researcher went ahead to introduce a third variable to this relationship with a view of seeing if it could produce a better model than the first in Figure 4.1. Career self-efficacy belief was as such introduced as a mediating variable in the relationship between self-esteem and career choice behavior.

4.6.1 Confirmatory Factor Analysis

Confirmatory Factor Analysis was done as the initial step in Structural Equation Model to ascertain whether the observed are actual manifest of the latent variables. Since the CFA for Self-esteem and career choice behavior had been done in the two factor model, CFA was

therefore done for career self-efficacy belief alone in the three factor model. The results are as shown in the table below:

Table 4.16: Standardized and Unstandardized Coefficients for CFA

Observed variable	Latent variable	B	B	SE	CR	P
Problem solving	Career self-efficacy belief	.815	1.000			
Self-appraisal	Career self-efficacy belief	.809	.972	.061	15.852	.0009
Planning	Career self-efficacy belief	.749	.889	.062	14.282	.0008
Goal selection	Career self-efficacy belief	.786	1.010	.066	15.387	.0009
Occupational info.	Career self-efficacy belief	.840	1.030	.062	16.726	.0009

As evident in Table 4.15 all the indicators have their standardized loadings falling within the same range. Since all these loadings tend towards the perfect loading of 1.0, the indicators are as such favourably loading on the latents. To determine the significance of the loadings regressions weights were used. Problem solving loading for career self-efficacy belief is at a regression estimate of 1.0 which is a perfect loading. All the observed loadings for latent have Standard Errors of below .5, Critical Ratios of above 1.96 and p-values of less than .05.

Based on the Critical Ratio Test which states that a Critical Ratio of 1.96 or higher and (-1.96 or lower) and a p-value of less than .05, indicate two-sided significance at the customary 5% level, all these factors significantly load on the latent. This implies that the CFA Test is proven significant as all the observed load onto the latent significantly.

4.6.2 Estimation of Model Fit

To be able to estimate the model fit for the structure, the researcher did the following model fit tests and came up with the following tables describing the various model fit indices.

Table 4.17: Model Fit Results and Criterion for Significance

	Normal Chi-square Fit Index (CMIN/DF)	Root Mean Square Residual (RMR)	Goodness of Fit Index (GFI)	Adjusted Goodness of Fit Index (AGFI)	Root Mean Square Error of Approximation (RMSEA)	Normed Fit Index (NFI)	Tucker Lewis Index (TLI)	Comparative Fit Index (CFI)
Default model	.720	.013	.989	.978	.000	.986	1.009	1.000
Criterion for model fit	<2	Small as to approach 0	Between 0 and 1 with 1 indicating perfect fit	Between 0 and 1 with 1 or >1 indicating perfect fit	Approximately 0.05 or smaller	Between 0 and 1 with values close to 1 indicating perfect fit	Larger than 0.90	Between 0 and 1 with a minimum of .90
Outcome	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit	Acceptable fit

From the fit index estimations, the three-factor model meets all the set criterions implying that it is a good model for our data. It therefore fits the data perfectly.

4.6.3 Structural Equation Modelling

To do this, AMOS was used to draw the structural model for the three variables based on an already theorized model. The 3 variables were drawn as latent while their indicators were drawn as observed. The arrows pointed the direction of relationship. The structural model of the three variables extracted from AMOS is as shown in Figure 4.2.

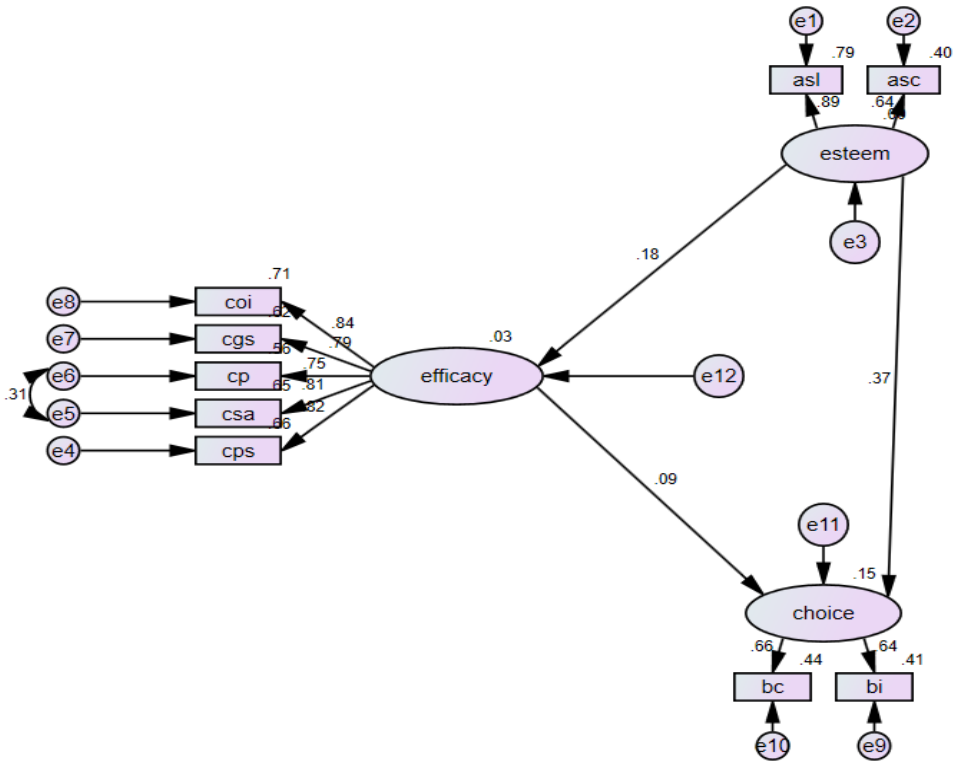

Figure4.2. A Three Factor Structural Model for self-esteem, career self-efficacy belief and career choice behavior extracted from AMOS

Key: asl- self liking sub scale, asc- self-competence sub scale, bi- uncertainty sub scale, bc- certainty sub-scale, coi- occupational information, cps- problem solving sub scale, cp- planning sub scale, csa-self appraisal sub scale, cgs- goal selection.

From Figure 4.2, different regression estimates are indicated. Summary of the regression of the latent variables was extracted and shown in the Table 4.18.

Table 4.18: Regression Analysis

Independent Variable	Dependent Variable	Regression Estimate
Self-esteem	Self-efficacy	.176
Self-esteem	Career choice behavior	.366
Self-efficacy	Career choice behavior	.094

From Table 4.17 it emerges that all these factors relate though at different levels. The relationship between career self-efficacy belief and career choice behavior has the least estimate of .0.94 followed by that of self-esteem and career self-efficacy belief at .176. The relationship between self-esteem and career choice behavior is highest at .37. This value is however lower than the original estimate found in the Two Factor model of .41 with a margin of .04. Since there is a reduction in estimate with the introduction of a third variable, the third variable of career self-efficacy belief is therefore said to mediate in the relationship between self-esteem and career choice behavior. The Three Factor model is therefore said to be more parsimonious than the two-factor model.

The current study qualifies all the conditions set by Baron and Kenny (1986) who argued that for one to claim a mediating relationship there is need to first show that there is a significant relationship between the independent variable and the dependent variable: independent and the mediator variable: mediator and the dependent variable. All these conditions were met as has been demonstrated in the past correlations. The final step consists of demonstrating that when the mediator and the independent variable are used simultaneously to predict the dependent variable, the path between the independent and dependent variables is now reduced, if not non-

significant. Maximum evidence for mediation would occur if the relationship between X and Y before the introduction of M drops to 0. In the current study, this correlation drops from .41 to .37 signifying the existence of mediation.

The findings of this study are congruent with the findings got from face to face oral interview with the career counselors. One career counselor upon being asked on his opinion on the role of career self-efficacy belief on the career choice process, responded that:

> Although this is a new concept to me, I strongly believe that its inclusion in the careercounseling will go a long way in improving students' career choice. Since this concept talks about confidence in carrying out career tasks, it is now for us the career counselors to work towards improving students' level of confidence in carrying out tasks in their careers of choice.

Most of the career counselors were in agreement that career self-efficacy belief is quite instrumental in the career choice process. They advocated for its increased use and emphasis in the career counseling process. Having shown good ratings, it is therefore evident that career self-efficacy belief does influence the relationship between self-esteem and career choice behavior in a positive manner by reducing the path between SE and CCB. In this case, it is therefore important to introduce it in career counseling.

The current study affirms findings by past studies of the ability of career self-efficacy belief to mediate various relationships. Career self-efficacy has a strong ability to mediate in relationships involving various behavioral factors (Pajeres, 2002). Bandura's (1986) Social Cognitive Theory of human development postulates that human functioning is determined by personal, behavioral, and environmental factors. According to Pajares (2002) this perspective views human functioning as the "product of a dynamic interplay of personal, behavioral, and environmental influences. Pajares (2002) explained that people interpret the results of their

own behavior in a way that “informs and alters their environments and the personal factors they possess which, in turn, inform and alter subsequent behavior”. Furthermore,

This view is again held by Lin and Flores (2011). They tested the mediation effect of career self-efficacy in the relationship between effectiveness source variables and job search behavior. And career self-efficacy widely used to do as a mediator in many research models. Kounenou (2012) found that the mediating role of career decision self-efficacy is significant in determining behavior outcome.

CHAPTER FIVE

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter contains summary of the research findings, conclusions of the study and recommendations.

5.2 Summary

The purpose of the study was to find the mediating role of career self-efficacy belief on the relationship between self-esteem and career choice behavior among secondary school students in Migori sub-county-Kenya. The summary and conclusions are presented according to the themes deduced from the research objectives that guided the study.

5.2.1 Level of Self-Esteem

The study established that:

The level of self-esteem was high with 86.3% of students having high SE and only 9.3% having low SE. This was due to a variety of factors that were favorable at the time of the study.

5.2.2 Level of Career Choice Behavior across Gender

The study established that:

The choices of Doctor, Lawyer, Engineer, and Pilot were made by more students due to their high outcome expectations and prestige. Teaching and Nursing ranked high due to the ease of job availability. Students chose careers that provided same gender role models such as females chose Nurse, Secretary, Air hostess And Model whereas males chose Soldier, Police, Chef Scientist, and Artist.

Career choice was also slightly dependent on the decision of those around a student's life as. Though some students had made certain career choices such as Dancer, Robber, Teacher, Police, Prostitute, and Musician they could not explicitly state them due to confrontation with important others around them.

The level of career choice behavior was high with 79.2% of students having high CCB and only 1.6% having low CCB. In terms of gender, the level of CCB was slightly higher than that of females.

Career self-efficacy belief had a significant influence on the career choice behavior given by the magnitude of the regression coefficient of 0.062 and a p-value of .000.

5.2.3 Level of Career Self-Efficacy Belief

The study established that:

The level of CSEB was high among students of Migori sub-county with 84.5% having high CSEB and only 2.8% having low CSEB. This was attributed to the recent career guidance and counseling done to Form Three students during subject selection process which made them confident of successfully accomplishing tasks in their careers of choice. The high CSEB was also attributed to the high level of self-esteem.

Self-esteem was shown to have a positive and significant influence on career self-efficacy belief given by the magnitude of the regression coefficient of 0.065 and a p-value of .000.

5.2.4 Relationship between Self-Esteem and Career Choice Behavior

The study established that:

A confirmatory factor analysis of the two factors was done through investigation of the Standard Regression Weights, which showed that the factor loadings for the observed were favorably high. The last in ranking was uncertainty, whose loading for CCB was .635 followed by certainty factor loading for CCB at .670. Self-competence loading for SE came second at .699 with self-liking loading for SE coming first at .809. The high factor loading is a manifestation that the observed were reliable indicators of the latent. To establish the significance of factor loading regression weights of the loadings were established and based on the Critical Ratio Test, all these factors significantly load on the latent as all their CR is above 1.96.

The two-actor model of SE and CCB yielded good model fit ratings based on all the fit indices that were used to estimate model fit. The tests including CMIN/DF, RMR, GFI, RMSEA, NFI, TLI, and CFI all scored within the significance level estimates of the respective indices, thus showing that the observed were actual predictors of the latent and the model was a perfect fit for the data.

Correlation estimate for SE and CCB was at .41. With a CR test of 3.500 and a p-value of .0003. the relationship meets the st levels for significance.

5.2.5 Mediating Role of Career Self-Efficacy Belief

The study established that:

Confirmatory Factor Analysis was done through the establishment of the Standardised Regression Weights which indicated that the factor loadings was still favourably high even

after the introduction of CSEB. CSEB sub scales were generally high with occupational information loading for CSEB at .840. Problem solving's loading for CSEB at .815 whereas that of self-appraisal for CSEB at .809 and Goal selection's loading for CSEB at .789. The loading of planning for CSEB was at .749. These relatively high loadings of indicators justify that the observed are reliable indicators of latent. To get the significance of factor lodings regression weights were calculated and based on the Critical Ratio Test, all these factors significantly load on the latent as all their CR is above 1.96.

An introduction of the third variable to the Two Factor model did not destroy the initial model fit. CMIN/DF, RMR, GFI, RMSEA,NFI, TLI and CFI Tests scores indeed improved by tilting more towards the optimal levels of model fits of the respective indices, thus giving a perfect Three Factor model fit for our data.

There was a significant relationship among the three variables. The relationship between CSEB and CCB was .094. That between SE and CSEB WAS .176 whereas that between SE and CCB was .366. This value is lower than the original correlation found in the two-factor analysis of .407. With a margin of .041. Since there is a reduction in relationship with the introduction of a third variable, the third variable, career self-efficacy belief is therefore said to mediate in the relationship between self-esteem and career choice behavior. The Three Factor model is therefore said to be more parsimonious than the two factor model.

5.3 Conclusions

In light of the findings of the study, the following conclusions were made:

5.3.1 Level of Self-Esteem

The level of self-esteem of students in Migori sub-county is high. Self-esteem is a factor of a number of conditions surrounding a student's life and is not merely subject to one particular phenomenon.

5.3.2 Level of Career Choice Behavior across Gender

The level of student career choice behavior in Migori sub-county is favourably high. Same gender role model play a factor in students' career choice and career self-efficacy belief has the power to influence career choice behavior.

5.3.3 Level of Career Self-Efficacy Belief

The level of career self-efficacy belief of students is high in Migori sub-county. Career self-efficacy belief is influenced by the level of self-esteem. The higher the self-esteem the higher the career self-efficacy belief.

5.3.4 Relationship between Self-Esteem and Career Choice Behavior

There is a relationship between self-esteem and career choice behavior. These two factors are able to significantly correlate with one another signifying that an increase in one leads to an increase in another and a decrease in one consequently leads to a decrease in the other. Therefore, to improve career choice behavior self-esteem should be enhanced.

5.3.5 Mediating Role of Career Self-Efficacy Belief

Career self-efficacy belief has the ability to mediate in the relationship between self-esteem and career choice behavior since it has power to reduce the level of relationship between self-

esteem and career choice behavior if introduced into the relationship. Therefore, for career choice behavior to be improved the level of career self-efficacy belief should be enhanced.

5.4 Recommendations

The following recommendations were made based on the findings of the study

The study confirmed that career self-efficacy belief mediated in the relationship between self-esteem and career choice behavior. That is to say, CSEB was an important factor in career choice process. However, it remains largely unused in the career choice process. The researcher therefore came up with the following recommendations:

1) Since self-esteem is an important aspect in the career choice process teachers as well as career counselors should work towards improving students' self-esteem for career choice behavior to be improved.
2) There needs to be intervention by both teachers and the ministry of education to break the alignment of certain careers to particular gender so that students can choose careers appropriately beyond gender barriers.
3) The government through the Ministry of Education should organize in service trainings for career counselors to train them on emergent issues such as career self-efficacy belief in career counseling.
4) Self-esteem of students need be enhanced by teachers and counselors alike as it is evident that it correlates with career choice behavior of students in this study.
5) Career self-efficacy belief of students should be enhanced by career counselors through appropriate counseling as this study has demonstrated that it improves career choice behavior.

5.5 Suggestions for Further Research

Based on the findings of the current study, the following suggestions for further research were made.

1. An assessment of the mediating role of self-esteem on the relationship between career self-efficacy belief and career choice behavior
2. A correlation study of career role modeling and career self-efficacy belief.
3. An investigation of factors influencing career self-efficacy belief to make a career choice.
4. A study of self-liking and self-competence components of self-esteem in students career choice.

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APPENDICES

APPENDIX A: CONSENT FORM

Carefully study the following information before consenting to take part in this study.

STUDY TITLE

MEDIATING ROLE OF CAREER SELF-EFFICACY BELIEF IN THE SELF-ESTEEM AND CAREER CHOICE BEHAVIOR RELATIONSHIP AMONG SECONDARY SCHOOL STUDENTS IN MIGORI SUB-COUNTY-KENYA.

UNIVERSITY: MASENO UNIVERESITY

RESEARCHER: GOR POLYCARP OWINO

SUPERVISORS: PROF. LUCAS OTHUON

DR. WYCLIFFE HUMPHREY ODIWUOR

INVITATION

You are being asked to take part in this research study entitled A Correlation Study of Self-Esteem and Career Choice Behaviour: Mediating Role of Career Self-Efficacy Belief among Secondary School Students in Migori Sub-County-Kenya. Whether or not you take part is your choice. If you don't want to take part, you don't have to give a reason. If you do want to take part now, but change your mind later, you can pull out of the study at any time.

This sheet will help you decide if you would like to take part. It sets out why this study is being conducted, what your participation would involve, what the benefits and risks to you might be and what may happen after the study ends. We will go through this information with you and answer any questions you may have.

If you agree to take part in the study, you will be asked to sign the consent form at the end of this document. You will be given a copy of both the participant information sheet and consent form to keep.

WHAT IS THE PURPOSE OF THE STUDY?

Career choice behaviour has been a major problem to students with many just pursuing various careers chosen to them by their parents or going for those careers that their performance at the KCSE level qualifies them for as evident in many studies highlighted in this study. This study therefore seeks to find out how career self-efficacy belief (the level of confidence a student has in his/her ability to successfully accomplish a given career task) can influence the relationship between self-esteem (personal judgement of worthiness that an individual holds of him/herself)

and career choice behaviour (the level of student decidedness in making career choice with a view to improving of improving student career choice.

WHAT WILL HAPPEN

In this study, you will be asked to fill the three questionnaires that will be given to you by circling the number that corresponds to your level of agreement as will be directed.

TIME COMMITMENT

The completion of the 3 questionnaires will take approximately take 40 minutes.

PARTICIPANTS' RIGHTS

You may decide to stop being a part of the research study at any time without explanation. You have the right to ask that any data you have supplied be withdrawn /destroyed without any penalty whatsoever.

You have the right to omit or refuse to answer or respond to any question that is asked of you *(as appropriate, "and without penalty")*.

You have the right to have your questions about the procedures answered (unless answering these questions would interfere with the study's outcome). If you have any questions as a result of reading this information sheet, you should ask the researcher before the study begins.

BENEFITS AND RISKS

There are no specific benefits to you. Your participation may benefit future generations by helping career counsellors find a solution to career indecisiveness. There are no risks for you in this study.

COST, REIMBURSEMENT AND COMPENSATION

Your participation in this study is voluntary and will not be paid or compensated.

CONFIDENTIALITY/ANONYMITY

The data we collect do not contain any personal information about you. No one will link the data you provided to the identifying information you supplied.

FOR FURTHER INFORMATION

Please feel free to contact the researcher or the supervisors if you have any questions concerns or complaints about the study or if you want to find out the final results of the study on the contact addresses below.

Researcher: Gor Polycarp Owino. E-Mail address: gorpolycarp@gmail.com. Tel: 0725736140

Supervisors: Prof. Lucas Othuon. E-mail address: lothuonus@yahoo.com. Tel: 0714642524

Dr. Wycliffe Odiwuor. E-Mail address: odwicky@yahoo.com. Tel: 0722 430847

By signing below, you are agreeing that: (1) you have read and understood all the information above, (2) questions about your participation in this study have been answered satisfactorily, (3) you are aware of the potential risks (if any), and (4) you are taking part in this research study voluntarily (without coercion).

Declaration by the Participant:

I do hereby consent to take part in this study.

_____

Participant's Name

_____

Signature Date

Declaration by member of research team:

I have given a verbal explanation of the research study to the participant, and have answered the participant's questions about it. I believe that the participant understands the study and has given informed consent to participate.

_____

Researcher's Name

_____

Signature Date

APPENDIX B: INFORMATION SHEET

MASENO UNIVERSITY

P.O. BOX PRIVATE BAG

MASENO-KENYA

CONTACT DETAILS
GOR POLYCARP OWINO
P.O. BOX 99 SUNA-MIGORI
MOBILE NO. 0725736140
E-MAIL ADDRESS gorpolycarp@gmail.com

Dear Respondent,

As part of my Master of Education in Educational Psychology degree I am undertaking a research study entitled a correlation study of self-esteem and career choice behavior: mediating role of career self-efficacy belief among secondary school students in Migori sub-county, Kenya. The study examines the career choice of students in relation to their self-esteem and career self-efficacy belief. You were chosen since you have gone through career guidance during your subject selection and the results of this study will be purely used for the study's purpose and nothing else.

I would like you to assist me by completing the attached questionnaires as per the instruction given in each case. The completion time will take approximately 40 minutes and the questionnaires will thereafter be collected by the researcher upon completion by all respondents.

Your participation is fully voluntary and no one will be victimized whatsoever for failing to take part in this study.

The result of this study will remain highly confidential as the questionnaires will remain anonymous and data aggregated such that individual data cannot be identified.

We will provide a copy of the result to your school administration, which will make them available to you. In case of any queries or complaints kindly direct them to the above stated contacts.

Thank you for considering participating in this study.

APPENDIX C1: STUDENT QUESTIONNAIRE 1

Rosenberg Self-Esteem Scale

Name of of school_____
Date of Birth_____
Gender_____

Instruction
Please respond to the following statements by indicating your level of agreement by circling the number that corresponds to your level of agreement. This is as follows;

4	3	2	1	0
strongly agree	agree	Undecided	disagree	strongly disagree

	SA A U D SD				
1. I feel that I am a person of worth, at least on an equal plane with others.	4	3	2	1	0
2. I feel that I have a number of good qualities.	4	3	2	1	0
3. All in all, I am inclined to feel that I am a failure.	4	3	2	1	0
4. I am able to do things as well as most people.	4	3	2	1	0
5. I feel I do not have much to be proud of.	4	3	2	1	0
6. I take a positive attitude toward myself.	4	3	2	1	0
7. On the whole, I am satisfied with myself.	4	3	2	1	0
8. I wish I could have more respect for myself.	4	3	2	1	0
9. I certainly feel useless at times.	4	3	2	1	0
10. At times I think that I am no good at all.	4	3	2	1	0

APPENDIX C2: STUDENT QUESTIONNAIRE 2

Career Decision Scale

This questionnaire contains some statements that people commonly make about their educational and occupational plans. Some of the statements may apply to you; others may not. Please read through them and indicate how closely each item describes you in your thinking about a career or an educational Choice by *circling* the appropriate number on the answer sheet. An example is given below:

	Exactly like me	Very much like me	Moderately like me	Only slightly like me	Not at all like me
I am excited about finishing school and going to work.	4	3	2	1	0

If you are excited about going to work and feel no hesitation about it you would circle "4" to indicate that the description is exactly the way you feel. If the item is very close.but not exactly the way you feel - for example. you're generally excited about going to work after you finish schooling, but are experiencing some minor concerns about It - you would circle the number "3": You would circle "1" if the item describes you in some ways, but in general it is more unlike than like your feelings; for example, if you are generally more concerned than excited about work after finishing schooling. Finally, you would circle "0' if the Item does not describe your feelings at all; that is, you are experiencing a great deal of concern and no excitement about finishing schooling and work.
Please be sure to give only *one* response to each item and answer *every* item.

	EL VL ML SL NL
1. I have decided on a career and feel comfortable with it. I also know how to go about implementing my choice.	4 3 2 1 0
2. I have decided on subjects and feel comfortable with them. I also know how to go about implementing my choice.	4 3 2 1 0
3. If I had the skills or the opportunity, I know I would be a __ _ but this choice is really not possible for me. I haven't given much consideration to any Other alternatives, however.	4 3 2 1 0

4. Several careers have equal appeal to me. I'm having a difficult time deciding among them.	4 3 2 1 0
5. I know I will have to go to work eventually, but none of the careers I know about appeal to me.	4 3 2 1 0
6. I'd like to be a _____, but I'd be going against the wishes of someone who is important to me if I did so. Because of this, it's difficult for me to make a career decision right now. I hope I can find a way to please them and myself,	4 3 2 1 0
7. Until now, I haven't given much thought to choosing a career. I feel lost when I think about it because I haven't had many experiences in making decisions on my own and I don't have enough information to make a career decision right now.	4 3 2 1 0
8. I feel discouraged because everything about choosing a career seems so uncertain; I feel discouraged, so much so that I'd like to put off making a decision for the time being.	4 3 2 1 0
9. I thought I knew what I wanted for a career, but recently I found out that it wouldn't be possible for me to pursue it. Now I've got to start looking for other possible careers.	4 3 2 1 0
10. I want to be absolutely certain that mv career choice is the "right" one, but none of the careers I know about seem ideal for me.	4 3 2 1 0
11. Having to make a career decision bothers me. I'd like to make a decision quickly and set it over with. I wish I could take a test that would tell me what kind of career I should pursue.	4 3 2 1 0
12. I know what I'd like to major in, but I don't know what careers it can lead to that would satisfy me.	4 3 2 1 0
13. I can't make a career choice right now because I don't know what my abilities are.	4 3 2 1 0

14. I don't know what mv interests are. A few things make me happy but I'm not certain that they are related in any way to my career possibilities.' ,	4 3 2 1 0
15. So many things interest me and I 'know I have the abilitv to do well regardless of what career I choose. It's hard for me to find just one thing that I would want as a career.	4 3 2 1 0
16. I have decided on a career, but I'm not certain how to go about implementing my choice. What do I need to become a _____anyway?	4 3 2 1 0
17. I need more information about what different occupations are like before I can make a career decision.	4 3 2 1 0
18. I think I know what to major in, but I feel I need some additional support for it as a choice for myself.	4 3 2 1 0
19. None of the above items describe me. The following would describe me better: (write your response below).	

APPENDIX C3: STUDENT QUESTIONNAIRE 3

Career Decision Self-Efficacy Scale-Short Form

INSTRUCTIONS

For each statement below, please read carefully and indicate how much confidence you have that you could accomplish each of these tasks by marking your answer according to the key.

No confidence at all.	Very little confidence	Moderate confidence	Much confidence	Complete confidence
1	2	3	4	5

Example:

How much confidence do you have that you could:

a. Summarize the skills you have developed in the jobs you have held?

If your response was "Moderate Confidence," you would circle the number 3 on the answer sheet.

HOW MUCH CONFIDENCE DO YOU HAVE THAT YOU COULD

Statement	C MU MO V N
1. Find information in the library about occupations you are interested in.	4 3 2 1 0
2. Select one subject from a list of potential subjects you are considering.	5 4 3 2 1
3. Make a plan of your goals for the next five years.	5 4 3 2 1
4. Determine the steps to take if you are having academic trouble with an aspect of your chosen subject.	5 4 3 2 1
5. Accurately assess your abilities.	5 4 3 2 1

6.	Select one occupation from a list of potential occupations you are considering.	5	4	3	2	1
7.	Determine the steps you need to take to successfully complete your chosen subject.	5	4	3	2	1
8.	Persistently work at your subject or career goal even when you get frustrated.	5	4	3	2	1
9.	Determine what your ideal job would be.	5	4	3	2	1
10.	Find out the employment trends for an occupation over the next ten years.	5	4	3	2	1
11.	Choose a career that will fit your preferred lifestyle.	5	4	3	2	1
12.	Prepare a good curriculum vitae.	5	4	3	2	1
13.	Change subjects if you did not like your first choice.	5	4	3	2	1
14.	Decide what you value most in an occupation.	5	4	3	2	1
15.	Find out about the average yearly earnings of people in an occupation.	5	4	3	2	1
16.	Make a career decision and then not worry whether it was right or wrong.	5	4	3	2	1
17.	Change occupations if you are not satisfied with the one you enter.	5	4	3	2	1
18.	Figure out what you are and are not ready to sacrifice to achieve your career goals.	5	4	3	2	1
19.	Talk with a person already employed in a field you are interested in.	5	4	3	2	1
20.	Choose a subject or career that will fit your interests.	5	4	3	2	1
21.	Identify employers, firms, and institutions relevant to your career possibilities.	5	4	3	2	1
22.	Define the type of lifestyle you would like to live.	5	4	3	2	1
23.	Find information about graduate or professional schools.	5	4	3	2	1

24. Successfully manage the job interview process.	5 4 3 2 1
25. Identify some reasonable subject or career alternatives if you are unable to get your first choice.	5 4 3 2 1

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APPENDIX D: CAREER COUNSELORS INTERVIEW SCHEDULE

The main aim of this interview is to find out the opinion of career counselors on the role of career self-efficacy belief in career counseling.

Questions:

1. For how long have you been working as a career counselor?
2. Can you briefly describe what career counseling is?
3. How often do you do career counseling?
4. In your own opinion do you think career counseling is effective in line with students' career choice?
5. What do you know about career self-efficacy belief?
6. In your own view to what extent do you think student's career self-efficacy belief would influence a students'career choice?
7. Apart from career self-efficacy belief can you give other ways in which students' career indecisiveness can be solved?

APPENDIX E

MASENO UNIVERSITY

SCHOOL OF GRADUATE STUDIES

Office of the Dean

Our Ref: PG/MED/00017/2011

Private Bag, MASENO, KENYA
Tel:(057)351 22/351008/351011
FAX: 254-057-351153/351221
Email: sgs@maseno.ac.ke

Date: 21st August, 2015

TO WHOM IT MAY CONCERN

RE: PROPOSAL APPROVAL FOR GOR POLYCARP OWINO— PG/MED/017/2011

The above named is registered in the Master of Education in Educational Psychology of the School of Education, Maseno University. This is to confirm that his research proposal titled "A Correlation Study of Self Esteem and Career Choice Behavior: Mediating Role of Career Self Efficacy Belief among Secondary School Students in Migori Sub County, Kenya" has been approved for conduct of research subject to obtaining all other permissions/clearances that may be required beforehand.

MASENO UNIVERSITY
24 AUG 2015
SCHOOL OF GRADUATE STUDIES

Prof. P.O. Owuor
DEAN, SCHOOL OF GRADUATE STUDIES

APPENDIX F

MASENO UNIVERSITY ETHICS REVIEW COMMITTEE

Tel: +254 057 351 622 Ext: 3050
Fax: +254 057 351 221
Private Bag – 40105, Maseno, Kenya
Email: muerc-secretariate@maseno.ac.ke

FROM: Secretary - MUERC

DATE: 18th February, 2016

TO: Polycarp Owino Gor
PG/MED/00017/2011
Department of Educational Psychology
School of Education, Maseno University
P.O. Private Bag, Maseno, Kenya

REF: MSU/DRPI/MUERC/00264/15

RE: A Correlation Study of Self Esteem and Career Choice Behaviour: Mediating Role of Career Self Efficacy Belief among Secondary School Students in Migori Sub County, Kenya. Proposal Reference Number MSU/DRPI/MUERC/00264/15

This is to inform you that the Maseno University Ethics Review Committee (MUERC) determined that the ethics issues raised at the initial review were adequately addressed in the revised proposal. Consequently, the study is granted approval for implementation effective this 18th day of February, 2016 for a period of one (1) year.

Please note that authorization to conduct this study will automatically expire on 17th February, 2017. If you plan to continue with the study beyond this date, please submit an application for continuation approval to the MUERC Secretariat by 18th January, 2017.

Approval for continuation of the study will be subject to successful submission of an annual progress report that is to reach the MUERC Secretariat by 18th January, 2017.

Please note that any unanticipated problems resulting from the conduct of this study must be reported to MUERC. You are required to submit any proposed changes to this study to MUERC for review and approval prior to initiation. Please advice MUERC when the study is completed or discontinued.

Thank you.

Yours faithfully,

DIRECTORATE OF RESEARCH PUBLICATION & CONSULTANCIES 18 FEB 2016 MASENO UNIVERSITY

Dr. Bonuke Anyona,
Secretary,
Maseno University Ethics Review Committee.

Cc: Chairman,
Maseno University Ethics Review Committee.

APPENDIX G: TEST RETEST RELIABILITY COEFFICIENT

Scale	**Cronbach's Reliability coefficient**
Rosenberg Self-Esteem Scale	0.82
Career Decision Scale	0.80
Career Decision Self-Efficacy Scale-Short Form	0.84

APPENDIX H: A MAP OF MIGORI SUB-COUNTY-KENYA