

**Core self-evaluations, stress and work aspirations of Department of Education  
officers in selected districts in the Eastern Cape**

**BY**

**NOMZAMO GABELANA**

**Submitted in partial fulfilment of the requirements for the degree of**

**MASTER OF COMMERCE (Coursework)**

**in the subject of**

**INDUSTRIAL PSYCHOLOGY**

**in the Faculty of**

**MANAGEMENT AND COMMERCE**

**at the**

**UNIVERSITY OF FORT HARE**

**SUPERVISOR: NI GCAZA**

## DECLARATION

I declare that “**Core self-evaluations, stress and work aspirations of Department of Education officers in selected districts in the Eastern Cape**” is my original work and has never been submitted to any university for a degree. I submit this in partial fulfilment of the requirements for the Master’s degree in Industrial Psychology (course work) at the University of Fort Hare. All sources that I have used or quoted have been indicated and acknowledged by means of complete references.

.....

N, Gabelana

January 2014

## **ACKNOWLEDGEMENTS**

I would like to express my sincere appreciation and gratitude to:

Almighty Jehovah God for giving me the strength, courage and perseverance to complete this dissertation;

Dr Dodd for her expertise and selfless guidance in my topic;

Ms NI Gcaza for her invaluable support and dedication in evaluating my work and for her continued patience and motivation;

Tatenda Mhlanga for assisting me with statistical analysis;

All the DCESs & SESs in different districts who committed themselves by answering the questionnaire; and

My husband, Malusi, for his tolerance, support and continued motivation for me to complete this study.

## **Abstract**

The aim of the study was to investigate the effects of core self-evaluations and stress on the aspiration levels of the Department of Education (DoE) officers. An additional interest was on checking if general relationships amongst the three variables exist and the magnitude of such relationships. A literature study was conducted on three aspects, which are core self-evaluations, stress and work aspirations. This was followed by a survey involving 250 education specialists from four selected districts in the Eastern Cape, which are, Dutywa, Butterworth, Fort Beaufort and Mthatha. Results of the current research indicated that there is a positive relationship between core self-evaluation and DoE stress levels ( $r=0.32409$ ;  $p=0.0014$ ). These findings indicate that some individuals have low core self-evaluations due to their exposure to stressful situations hence they negatively appraise themselves and are less confident of themselves. DoE Senior Management Team (SMT) has to strategise and adopt measures that reduce stress levels and encourage positive CSE so as to deal effectively with under-performance.

### **KEY TERMS**

*Core self-evaluations, stress, aspirations, education specialists*

## Table of Contents

DECLARATION.....	ii
ACKNOWLEDGEMENTS .....	iii
Abstract.....	iv
List of Figures.....	viii
List of Tables.....	ix
CHAPTER 1 .....	1
INTRODUCTION AND THE BACKGROUND OF THE STUDY.....	1
1.1 Introduction.....	1
1.2 Statement of the problem .....	4
1.3 Research objectives .....	5
1.4 Hypotheses .....	6
1.5 Significance of the study.....	7
1.6 Delimitations of the study .....	7
1.6.1 <i>Size of the districts.</i> .....	7
1.6.2 <i>Units of analysis</i> .....	8
1.6.3 <i>Subject of evaluation</i> .....	8
1.7 Division of chapters .....	9
1.8 Concluding remarks .....	9
CHAPTER 2 .....	10
THEORETICAL FRAMEWORK.....	10
2.1. Introduction .....	10
2.2. Stress theories and models.....	10
2.2.1. <i>Response theories</i> .....	10
<i>Stimulus based model</i> .....	14
<i>Transactional model of stress</i> .....	15
2.3. Core self-evaluation theories.....	17
2.4. Achievement goal theory.....	18
2.5. Concluding remarks. ....	20
CHAPTER 3 .....	21

LITERATURE REVIEW .....	21
3.1. Core self-evaluation .....	21
3.1.1. <i>Self esteem</i> .....	22
3.1.2. <i>Generalised self-efficacy</i> .....	23
3.1.3. <i>Locus of control</i> .....	23
3.1.4 <i>Neuroticism</i> .....	24
3.2. Stress .....	24
3.2.1. <i>Major causes and sources of stress</i> .....	25
3.2.2. <i>Effects of stress on an individual and the organization</i> .....	38
3.3. Aspirations .....	41
3.4. Concluding remarks .....	46
CHAPTER 4 .....	47
RESEARCH METHODOLOGY .....	47
4.1. Introduction .....	47
4.2. Overview of the research methodologies .....	47
4.2.1. <i>Qualitative approach</i> .....	47
4.2.2 <i>Quantitative approach</i> .....	49
4.3. Population .....	50
4.4. Sample and sampling method.....	50
4.4.1. <i>Sampling procedure</i> .....	51
4.5. Research instrument .....	54
4.5.1. <i>Administering the questionnaire</i> .....	55
4.6. Data Analysis .....	57
4.7. Ethical considerations .....	57
4.6. Concluding remarks .....	58
CHAPTER 5 .....	59
PRESENTATION OF THE RESULTS .....	59
5.1. Introduction .....	59
5.2 Internal consistency .....	59
5.2.1 <i>Questionnaire for workplace stress</i> .....	59
5.2.2 <i>Achievement Goal questionnaire revised (AGQ-R</i> .....	60
5.2.3 <i>Core self-evaluation scale</i> .....	60

5.3. Demographic information .....	61
5.3.1. Gender.....	63
5.3.2 Age.....	63
5.3.3 Experience in the current position .....	64
5.3.4. Qualifications.....	65
5.3.5. Current position .....	66
5.3.6 Job Titles .....	66
5.4. Analysis of means .....	67
5.5. Inferential statistics.....	69
5.5.1 Correlations between demographics and study variables.....	69
5.5.2. Hypothesis testing .....	71
5.6. Concluding remarks .....	74
CHAPTER 6 .....	75
DISCUSSIONS, CONCLUSIONS AND RECOMMENDATIONS .....	75
6.1 Introduction .....	75
6.2. Discussion and conclusions .....	75
6.3. Recommendations .....	79
6.4. Limitations .....	79
REFERENCES .....	81
Appendices .....	101
Appendix A .....	101
SECTION A: BACKGROUND INFORMATION.....	102
SECTION B: A QUESTIONNAIRE TO MEASURE STRESS AT WORKPLACE. .....	103
SECTION C: Achievement Goal Questionnaire-Revised (AGQ-R) .....	104
SECTION D: CORE-SELF EVALUATIONS SCALE .....	105

## List of Figures

### Chapter 2

Figure 2.1: A response model of stress (Sutherland & Cooper, 2000) .....	11
Figure 2.2: General Adaptation Syndrome by Seyle (2008) .....	12
Figure 2.3: Human Performance Curve by Payne (2005) .....	13
Figure 2.4: Cox's stimulus based model of stress .....	15

### Chapter 3

Figure 3.1: Macro level stressors .....	31
Figure 3.2: Sources of stress by Michie (2002) .....	38

### Chapter 5

Figure 5.1: Distribution of respondents by gender .....	63
Figure 5.2: Distribution of respondents by age .....	64
Figure 5.3: Distribution of respondents by experience in current position .....	64
Figure 5.4: Distribution of respondents by qualifications .....	65
Figure 5.5: Distribution of respondents by current positions.....	66
Figure 5.6: Distribution of respondents by job titles.....	66

## List of Tables

Table 1: Internal consistency .....	61
Table 2: Biographical data – frequencies, percentages and chi-Square test for equal proportions .....	61
Table 3: Duncan's multiple range test for comparisons of means for the different demographic features with the three measures .....	67
Table 4: Descriptive statistics for workplace stress, goal achievement and self-evaluation.....	68
Table 5: Correlations between demographics and study variables .....	69
Table 6: Pearson correlation on workplace stress, goal achievement and self-evaluation.....	71

# CHAPTER 1

## INTRODUCTION AND THE BACKGROUND OF THE STUDY

### 1.1 Introduction

Core self-evaluation (CSE) is a balanced personality characteristic which involves people's subconscious evaluations or assessment, ratings, perceptions about themselves, their talents and abilities to give directions to the activities of others (Judge, Locke & Durham, 1997).

Different individuals may have different evaluations of themselves. They may have either high core self-evaluations or low core self-evaluations. People with high core self-evaluations always contemplate constructively about themselves with no doubts, are highly satisfied and motivated, are emotionally stable, their goal commitment is high and they trust their own abilities (Judge, Erez, Bono & Thorensen, 2002). Some people have low core self-evaluations which are evidenced by their negative appraisals of themselves; they always think of uncertainties and are less confident of their capabilities.

Many studies have been conducted on the effects of genetics on CSE, stress and intelligence (Judge, Llies & Zhang, 2012). Although prior studies conducted indicated some relationships between personality characteristics and other psycho-social job outcomes, including the relationship between CSE and job stress (Brunborg, 2008), there are very limited published studies pertaining to the relationship between the three variables, that is, CSE, stress and aspirations. The focus of this study is to look at the relationships among the three variables whether they are positive, negative or non-existent.

In addition to their analysis of the term 'core self-evaluations', Judge et al. (1997) further argued that the term core self-evaluations can best be described through the use of four personality characteristics i.e. (a) locus of control (b) neuroticism (c) self-efficacy and (d) self-esteem. The importance of core self-evaluations is that they constitute a personality characteristic which is unchangeable for some time. High core self-evaluations predict positive work outcomes like job performance and job satisfaction (Judge et al., 1997).

People with high self-esteem are highly motivated in their jobs. When a study was conducted to investigate the relationship between CSE and job satisfaction, the results indicated a close relationship between the two concepts (Judge & Bono, 2001) and a person who is contented with his/her job will have high aspirations in his/her job. In research conducted by Heller, Judge and Watson (2002), CSE was linked with job performance. Judge, Erez and Bono (1998) further prove this construct to link positively with motivation. In these studies, the CSE concept transpires as a consistently valid predictor of both affective and objective work outcomes. If this construct is able to predict work outcomes, it means it is closely related to work aspirations of employees.

According to Macmillan (2009), aspiration is defined as that strong desire to achieve something or an ambition or objective desire to succeed or achieve promotion. Thus, according to this definition, an aspiration is either the longing to achieve an objective or reaching the goal itself. Scientific interpretations have encompassed elements of these two definitions of aspiration. The concept of aspiration has been referred to as an expectation or goal (Ritchie, Flouri & Buchanan, 2007), which may include intentions (Jacobs, Karen, & McClelland, 1991) and attitudes (Bunglawala, 2004; Haller & Miller, 1971).

Intentions refer to a plan of action one undertakes to achieve a particular goal (Locke & Latham, 1990a; Pinder, 1998). Attitudes represent one's personal orientation towards a goal (Bunglawala 2004; Haller & Miller, 1971). Thus, the intention to pursue the goal and the attitude toward the goal comprises an individual's work aspirations. Although there are many definitions of the term 'aspiration' by different writers, the above one is very suitable for the study since it concentrates on the desire to achieve 'an' end state and not 'the' end state. When individuals at work have high aspirations, motivation and job performance are very high and their stress level is low (Best, Stapleton & Downey, 2005).

Stress, as defined by Rollinson (2005), is the "condition arising from the interaction of people and their jobs which are characterized by changes within people that force them to deviate from their normal functioning" (p. 270). Various studies have shown that there is a relationship between stress and CSE. This means that stress and

negative CSE can lead people to deviate from their normal functioning. So these two variables need to be managed in order to curb their negative effects on aspirations.

For instance, concerns about stress have been widely reported as a globally complex phenomenon among various organizations. Greenberg and Baron (2008) consider stress as part of everyday life which cannot be avoided. One large life insurance company conducted a survey which showed that nearly 46 percent of American workers are of the opinion that jobs are most stressful. Schell (1997) states that in the United Kingdom (UK) people absent themselves because of stress and this has a negative effect on job performance as well as on aspirations of employees since these are ten times more costly than all other labour disputes.

Statistics in terms of sickness, absence, premature death or retirement due to alcoholism reveal that stress costs the UK economy more than \$2 billion per annum. However, a similar situation is occurring in Norway where the economic costs of work-related sickness and accidents amount to greater than ten percent of the gross national product (GNP) (Lunde-Jensen in Cartwright & Cooper, 1997). Selye (in Broek, Vansteenkiste, De Witte and Lens, 2008) studied and commented on the effects of long term stress on the body. Payne (2005) describes an imbalance between the demands placed on an individual and the level of response of that individual to such demands as leading to exhaustion which leads to low aspirations of workers.

In South Africa, job stress is considered to be a rising concern in many organizations. Costs are estimated at R500 million per year which are a result of absenteeism at work and low productivity due to stress (Executive Stress, 1991), with black and white employees at management levels suffering from high levels of stress (Van Zyl, 1998). Carell, Grobler, Elbert, Marx & Hatfield (1999) reported an assortment of other employee stress-related problems as alcoholism, drug abuse, hypertension and a host of cardio-vascular problems. Another reason for concern over job stress is that stress-related workers' compensation has risen dramatically and this is costly to organizations.

Studies have been done on stress inherent in certain specific groups within the work context (Van Zyl, 1993; Van Zyl, 1998; Van Zyl & Pietersen, 1999) with findings suggesting that approximately 30 to 40 percent of South Africans suffer from high

levels of stress (Van Zyl, 1993). However, in the USA the comparative figures range from 13 to 25 percent (Spielberger & Reheiser in Van Zyl, 1998) which underlines the seriousness of the South African stress experience. Van Zyl (2002) postulates that the levels of stress in South African organizations are exceptionally high. Researchers, encouraged by the seriousness of the South African stress experience, should not only focus on the causes and consequences of stress but also on coping strategies of employees experiencing stress with the aim to help both individuals and organizations to develop improved strategies and programmes to counter the negative effects of stress (Van Zyl, 2002).

## **1.2 Statement of the problem**

Since education specialists have a responsibility to assist schools to implement all policies pertaining to the improvement of results, these officers present low work aspirations which are depicted by the following:

- They show negative core self-evaluations since they appraise themselves negatively, i.e. they show less confidence when doing their work.
- They have a duty to support schools so that policies are implemented but only a small number of schools follow such policies (Education Week Convention & Learning Expo, 2010).
- They give support to teachers, even if it is minimal, due to staff shortages thus hoping to achieve better results (Schooling 2025) but they end up with little (upward movement by 1 - 3%) or no (downward slope of the results from 58% to 51%) achievement of such results (DoE Summary of Results, 2012).

Resources highly needed to support schools do not reach their destinations timely each year in most provinces. The Limpopo issue has proven that (Faranaaz, 2013):

- Teachers blame the officers for not getting the support they need. The officers blame teachers for not doing their work (Education Week Convention & Learning Expo, 2010).
- Few officers who positively appraise themselves have confidence in their work and point fingers at the DoE for:

- Lack of resources for themselves, let alone for the learners (SAPA).
- Lack of accountability hence no one is sure who must act when the undesirable happens.
- Continuous Assessment moderations are not done by most districts in the General Education and Training band due to union disruptions.

Comments from such officers' reveal that this has increased the levels of stress among themselves hence their aspirations in their work have dropped. Both officers and teachers show dissatisfaction in their work which results in high labourturnover (hence some officers leave the department). According to the study conducted by Jepson and Forest (2006), investigating the effects of occupational stress on teachers, three quarters of teachers who have increased workloads within a non-supportive environment were reported to suffer from high stress levels and less confidence. This is reported to have affected job performance, staff retention, and increased the amount of money that is spent on covering sick leave and providing replacement staff, while productivity has been affected as well.

Core research questions that will be examined in this study are:

- Are low aspirations a predictor of high levels of stress?
- Do high stress levels lead to low work aspirations and later result in negative CSE?
- Are low stress levels antecedents of increased work aspirations?
- Do high core self-evaluations result in high aspiration levels?

### **1.3 Research objectives**

The objectives of this study are:

- To investigate the effects of core self-evaluations on the aspiration levels of the DoE officers.

- To investigate the effects of stress on the core self-evaluations of the DoE officers.
- To determine the influence of stress and core self–evaluations on work aspirations of the DoE officers.
- To investigate the additive relationship amongst the three variables, that is, CSE, stress and work aspirations.

#### **1.4 Hypotheses**

This study postulates that:

##### **Hypothesis 1**

H<sub>0</sub>: There is no relationship between core self – evaluations and DoE officers' work aspirations.

H<sub>1</sub>: There is a relationship between core self – evaluations and DoE officers' work aspirations.

##### **Hypothesis 2**

H<sub>0</sub>: There is no relationship between core self – evaluations and DoE stress levels.

H<sub>2</sub>: There is a negative relationship between core self – evaluations and DoE stress levels.

##### **Hypothesis 3**

H<sub>0</sub>: There is no relationship between stress and work aspirations of DoE officers.

H<sub>3</sub>: There is a relationship between stress and work aspirations of DoE officers.

##### **Hypothesis 4**

H<sub>0</sub> – Stress does not moderate the relationship between CSE and work aspirations.

H<sub>4</sub> – Stress moderates the relationship between CSE and work aspirations.

## **1.5 Significance of the study**

As stress costs the department large sums of money and on an individual level it affects physical and psychological wellbeing of an employee, the outcome of this study will assist the department with information on how to assist its employees individually to achieve, so that the organization in its totality can be productive (Rollinson, 2005). This means that the department will choose better workshops, programs, seminars, etc. that will be geared towards stress management in order to help its employees to improve the situation.

Good management of stress levels by the organization will lead to positive stress (eustress) which is beneficial to the public. Employee ill health perpetrated by increased stress levels will be better managed since this is highly costly to the organization (Carell, Grobler, Elbert, Marx, Hatfield & Van der Schyf 1999). In addition, this scientific study will add information on the relationship between CSE, stress and aspiration levels of employees which will be beneficial in the stress management field. For the researcher it is appropriate to contribute information that would equip the DoE to manage their employees' stress levels better.

## **1.6 Delimitations of the study**

The purpose of demarcating a study is to make it more manageable and focused (Babbie & Mouton, 2003). This study will concentrate on education specialists within all the professional sections of the selected districts within the Department of Education to test the relationship amongst the three variables i.e. CSE, stress and work aspirations.

### **1.6.1 Size of the districts.**

Although districts differ in size, their professional sections have an estimated employee population of about 50 – 65 depending on the size of the district. Each section has a clear hierarchical structure composed of Chief Education Specialist, Deputy Chief Education Specialist and Senior Education Specialists which makes it easy to identify respondents.

### **1.6.2 Units of analysis**

The study was limited to Deputy and Senior Education Specialists of the selected districts.

### **1.6.3 Subject of evaluation**

The subject of evaluation in the study can be divided into the following:

#### **1.6.3.1 Core self-evaluations, stress and aspirations.**

Demarcating and focusing on professional section helped the study to be focused among employees with similar objectives. This means that corporate section has not been covered. In addition, the ways of dealing with stress factors discovered have not been covered.

#### **1.6.3.2 Definition of the key concepts**

- Core self-evaluations are the fundamental premises that individuals hold about themselves, people around themselves, their environment and their functioning in the world (Judge & Larsen, 2001).
- Self-esteem reflects a person's overall appraisal of his or her own worth and can be defined as an overall value one feels about oneself as a person (Harter, 1990).
- Generalized self-efficacy refers to an appraisal of one's ability to handle life challenges, or an individual's judgement of his or her capabilities, i.e. how a person performs and handles various situations (Locke, McClear & Knight, 1996; Judge, et al., 1997).
- Locus of control is the degree to which individuals believe they can control events in their lives (Judge & Kammeyer–Mueller, 2008).
- Neuroticism is defined as an enduring tendency to experience unusual emotions (e.g., anger, anxiety and depression) easily (Goldberg, 1990).
- Stress is the pattern of emotional states and physiological reactions occurring in response to demands from within or outside an organization (Greenberg & Baron, 2008).

- Aspirations are defined by Macmillan (2009) as that strong desire to achieve something like goal or an ambition or an objective desire to succeed, or for promotion.
- Education specialists are specialists in education in different fields, focusing on dealing implementation of policies and other education challenges that disturb the achievement of outcomes, for instance learner achievement. Examples of these are curriculum planners, education development officers, subject specialists or curriculum advisors.

## **1.7 Division of chapters**

The following chapters will be divided as follows:

Chapter 1: Introduction, problem statement and outline of the study

Chapter 2: Theoretical framework

Chapter 3: Literature review

Chapter 4: Research methodology

Chapter 5: Data presentation

Chapter 6: Discussion of the results, conclusions and recommendations

## **1.8 Concluding remarks**

This chapter has provided the background of the study, challenges experienced by education specialists within the Department of Education (DoE) and clarifications on the terms used in the study. The next chapter will provide theoretical framework on which the study is built.

## CHAPTER 2

### THEORETICAL FRAMEWORK

#### 2.1. Introduction

The previous chapter provided a background to the study by giving a brief definition of each variable outlined in the study. A few findings by different writers have also been highlighted, for instance, the relationship between core self-evaluations (CSE) and stress has been established (Brunborg, 2008). The chapter also expressed objectives, significance and delimitations which serve as a background for understanding the research problem.

Chapter two will discuss the theoretical framework of the research study. As one of the critical objectives of the study is to determine the influence of stress on core self-evaluations and work aspirations of the DoE officers, stress theories or models have been chosen to support the study, including one theory on each variable, that is, aspiration and CSE. Stress has been widely researched when compared to the other two variables hence that information by different writers has been used to support the study. The discussion will commence with the stress theories which have been categorized into three groups: the response-based theories, stimulus theories and interactive theories.

#### 2.2. Stress theories and models

##### 2.2.1. *Response theories*

This model is concerned with an individual's response when such an individual is exposed to a stimulus or demand within the environment. It focuses on how a person responds when under stress (Sutherland & Cooper, 2000). This is done through observation. Although this model assists one to understand stress, coping strategies/dealing with stress will not be included in this discussion.

Sutherland and Cooper (1990) maintain that stress is related to how an individual responds when subjected to a stimulus or a certain demand. Amongst the first researchers who investigated stress is Hans Selye who made the first attempt to describe the process of stress-related illnesses through general adaptation

syndrome (Cartwright & Cooper, 2002). Schematically, the response-based model can be represented as follows:

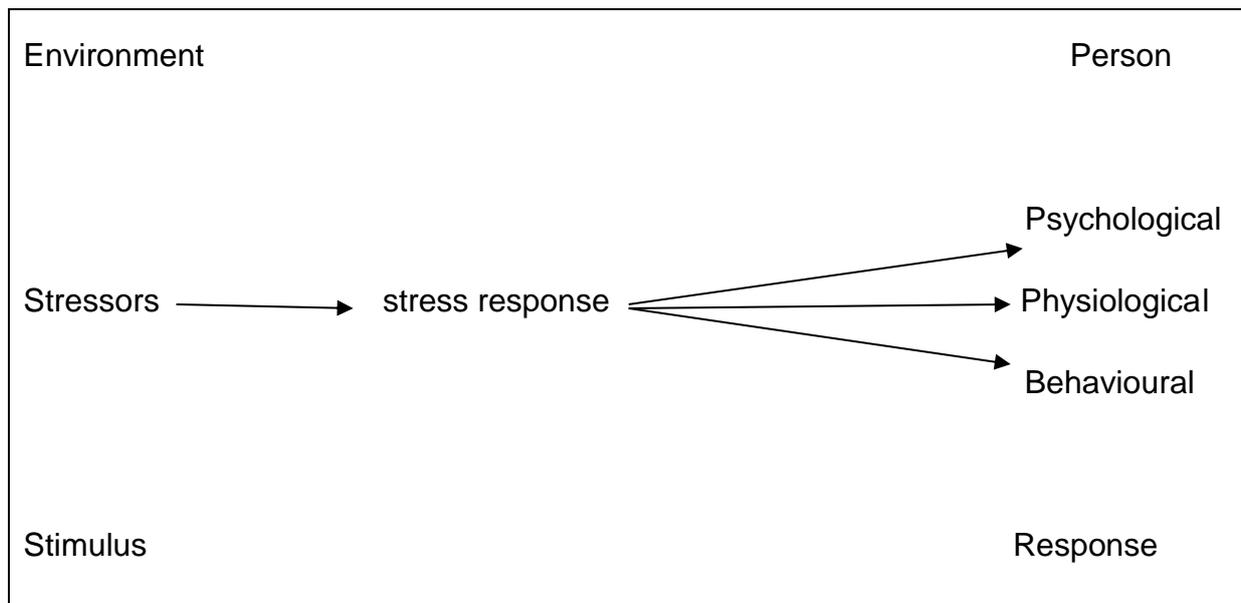


Figure 2.1: A response model of stress (Sutherland & Cooper, 2000)

Not only Cannon and Selye were key to these models; they were further investigated by many researchers like Manson (1971), McEwen & Wingfield (2003). A long time after his investigations, Selye (1974) defines stress as “the non-specific response of the body to any demand made on it” (p. 32). When this definition was criticized, he further explained stress as ‘a state manifested by a specific syndrome which consists of all the non-specifically induced changes within the biological system’ (Holmes, Ekkekakis & Eisenman, 2009; Selye, in Broek, Vansteenkiste, De Witte & Lens, 2008). Selye referred to the process he followed as general adaptation syndrome (GAS).

### 1) General Adaptation Syndrome

Cannon (in Wainwright & Calnan, 2002) in early 1900 explain an emergency reaction done by an organism responding to a threat or danger through fight or flight. Organism can respond to this by facing the threat, that is being prepared to fight it or by fleeing the situation or flight. As researchers assumed that fight or flight response applies to both sexes, Taylor, Cousino Klein, Lewis, Gruenewald, Gurung & Updegraff (2000), suggested that different sexes respond differently in stress situations due to neuro endocrine differences. General adaptation syndrome is a summary of the findings he proposed after he studied and commented on the effects

of long term stress on the body (Seyle, in Broek, Vansteenkiste, De Witte & Lens, 2008). This is composed of three phases: alarm reaction, resistance and exhaustion which are depicted by the model that follows.

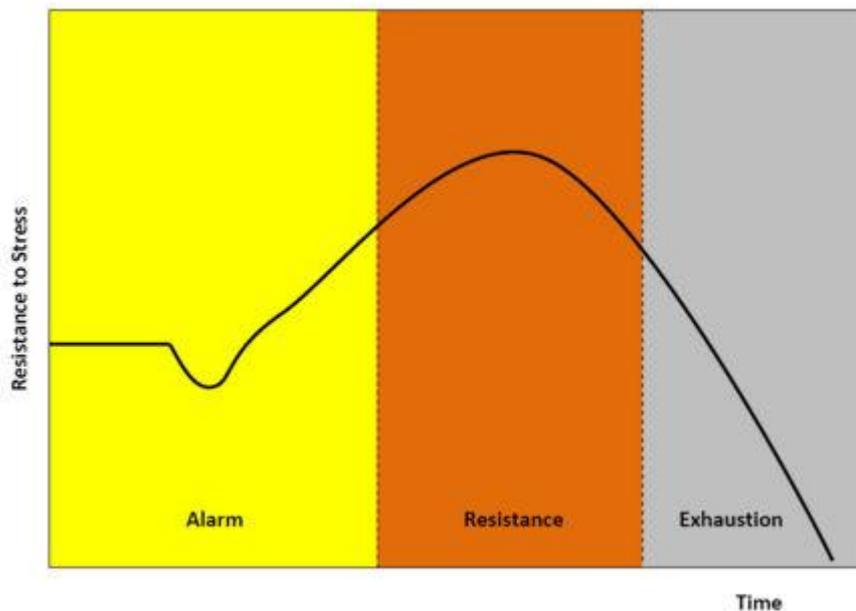


Figure 2.2: General Adaptation Syndrome by Seyle (2008)

In Figure 2.2 **alarm reaction** phase is the first stage of this model. This is a stage when an individual is exposed to sustained and excessive stress. During this phase, the body's defensive forces react in two sub-phases for dealing with the impact of the stressor. The first sub-phase is shock phase, that is when physical signs of distress can be noted, and the other is called counter shock phase (Carson, Butcher & Mineka, 2000). A person can respond by fighting the threat/danger or decide to escape the area where the stressor exists. This results in the body developing poor resistance in terms of its ability to resist the stressor.

The second stage is called the **resistance phase**, where the body starts to adapt to the existence of a chronic stressor. This means that most of the changes that take place during the alarm reaction phase are reversed. A higher level of functioning is maintained even if the stressor is present. This stage is seen as an endeavour to survive through a cautious stable use of the body's syntoxic and catatoxic defence mechanisms to facilitate coexistence of the organism and the stressor (Seyle, 1976a).

The third stage is called the **exhaustion phase** where changes in the body are felt since the body becomes tired and worn out. This is evidenced by the fact that the body cannot resist some attacks, and body systems start to deteriorate. This implies that high levels of cortisol start to have detrimental effects such as psychological, physiological and behavioural mal-adaptation. Eventually the individual would become unable to resist the effects of the stress and diseases like chronic depression occur, less resistance to infection and others become alcoholic.

The latter mentioned are the physiological effects of stress on an individual. Sometimes an individual can view a situation as more stressful depending on how that particular individual cognitively appraises such environment. This is very subjective as it depends on that particular individual; this means a situation which is more stressful on one individual may not be stressful on another. These characteristics, which are both perceptual and cognitive, are considered in explaining individual differences (Cummings & Cooper, 1998).

## 2) Relaxation response model

Payne (2005) describes an imbalance between the demands placed on an individual and the level of response of that individual to such demands. He maintains that an imbalance between these gives rise to the experience of stress and to the stress response itself. He used the following model to describe this comparison:

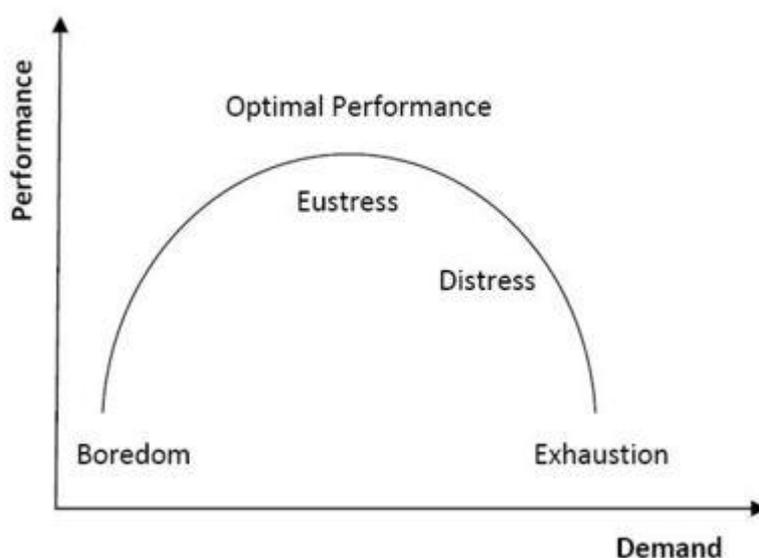


Figure 2.3: Human Performance Curve by Payne (2005)

This model clearly shows that increased workload strengthens performance, that is, when one is positive towards it, and this is referred to as 'eustress'. But when optimal performance is reached, that is a point where further demands will act to decrease an individual's performance, and one will not be productive. The implication of this model is that, when we feel we have made an effort to do our best at work, additional work will not motivate us; instead it will be felt as a burden. A person who perceives his/her ability to cope as weak will experience more stress and that leads to distress and later to exhaustion (Payne, 2005). This model has dealt mostly with work demands which are not the only factor that leads to stress but other factors will be discussed by the models that follow.

### ***Stimulus based model***

This model is based on the idea that individuals are affected by external stressors which they have to provide strategies to cope. Irvine (1997) perceives a person/human being as an object whose feelings are altered by external stressors that create distress to such individual. These external stressors can be cultural expectations, socio-economic factors, relationships, competition; how one views the world and other factors.

This model provides a clear understanding of stress by identifying the external factors that lead to distress. Distress refers to negative stress that leads to behavioural, psychological as well as physiological effects on individuals. It is also built on Hooke's law of elasticity which states that too much pressure exerted on a metal causes the metal to change/lose its original shape if the pressure exerted falls outside the given elasticity limit. Losing shape depends on the strength of the metal as other metals will retain their original shape if the pressure is removed (Cox, 1978; Cox & Mackay 1981).

This means that different individuals react differently when exposed to stressors. Sutherland and Cooper (1990) stated that the environment is characterized by stressors which are regarded as stimuli and are very disruptive or even disturbing. Such disruption can be exerted such that it poses a strain that an individual can either tolerate or not. If the stress exceeds certain levels, it becomes intolerable and results in permanent damage either psychological or physiological. The following model can be shown as follows:

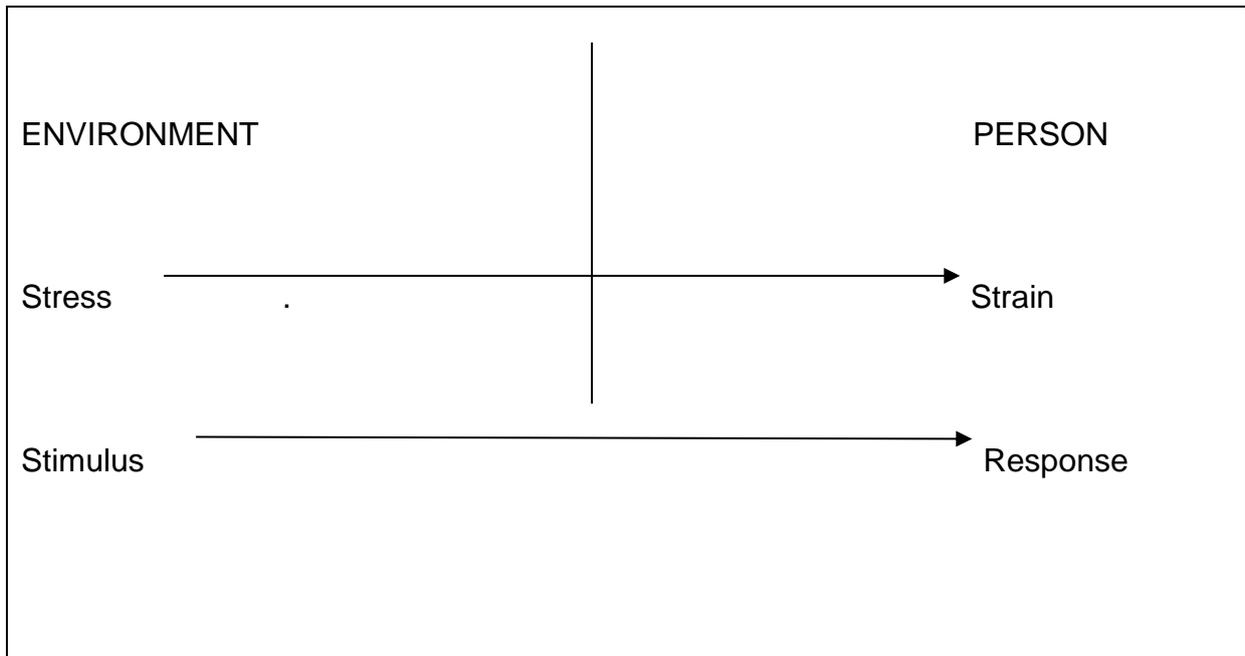


Figure 2.4: Cox's stimulus based model of stress

Holmes & Rahe (in Schell, 1997); McEwen (2002) define stressors as discrete life events that, when experienced in sufficient amounts, give rise to serious effects on both psychological and social well-being of an individual. This means that any changes in life have a stressful impact on individuals whether such changes are negative (distress) or positive (eustress). Other models of stress concentrate not only on the effects of environment or demands but specifically deal with the effects of job stress on the individual's body.

***Transactional model of stress***

Lazarus and Folkman (1984) suggested that stress is the result of an imbalance between demands and resources or when one is pressurized such that one's ability to cope with a situation is challenged. Payne (2005) maintained this when he describes an imbalance between the demands placed on an individual and the level of response of that individual to such demands as giving rise to the experience of stress and to the stress response. The transactional model proposes that when a person interacts with the environment, this leads to a felt stress. Stress does not belong to either the environment or a person but depends on the type of environment and the kind of person which are either congruent or incongruent with each other, and then stress may arise (Lazarus, 1991c). In his cognitive theory of stress,

Lazarus mentioned two appraisals which are at the centre of his argument, that is, primary and secondary appraisals (Lazarus, 1993).

The primary appraisal relates to a process of evaluating the significance of an encounter or transaction for that specific individual. It judges whether the transaction hinders or facilitates the attainment of individual's goals (Smith & Lazarus, 1990). Lazarus and his colleagues suggested three types of evaluations as follows: (i) irrelevant encounter, (ii) benign–positive encounter (iii) stressful encounter. By irrelevant encounter they refer to personal, insignificant encounter which can be easily ignored by an individual. By benign-positive encounter they refer to useful, desirable encounter where the individual can benefit out of such encounter. By stressful encounter they refer to threatening encounter which is undesirable for an individual. This situation affects the individual negatively as it challenges the individual and is considered harmful to engage with (Lazarus, 1994). How do individuals respond to these different situations?

Lazarus argued that whenever an individual is affected by an encounter, a potential for emotion is generated or a person will react in a certain way, hence stressful situations involving threat, harm and even challengean individual's well-being (Lazarus, 1991b; Lazarus 1994). In other words, is the person, event, or situation irrelevant, benign or stressful (Peacock, Wong & Reker, 1993)? If individuals feel that they have a stake in the encounter, the transactional model proposes that they will engage in a secondary appraisal in order to change conditions perceived to be undesirable.

Secondary appraisal focuses on the available coping options for changing the perceived harm, threat or challenge so that a more positive environment is created. This indicates that even if one has high aspirations and believes in one's self, in terms of job performance, on encountering a threat, one is left with no option but to change one's attitude or the environment to one that favours oneself. The transactional model depicts coping as a choice that is affected by the primary and secondary appraisals. Coping goes parallel with one's determination to change the situation (Folkman and Lazarus, 1985). When a situation is unchangeable, one has to explore different coping strategies (Folkman & Lazarus, 1980). These strategies will not be examined further since they do not form part of the discussion. Ultimately,

the individual's choice of a coping mechanism is determined by his perceptions of personal control over the stressful situation.

### **2.3. Core self-evaluation theories**

Judge, Locke and Durham (1997) suggested the term 'core self-evaluation' which they viewed as a higher order construct which is demonstrated by four traits, that is, self-esteem, generalized self-efficacy, locus of control and emotional stability or neuroticism. Core self-evaluations typify the fundamental assessments people make about themselves (Judge, Locke & Durham, 1997), including their ratings, perceptions of their talents and abilities (Judge & Bono, 2003), and the relationship between themselves and their environment (Judge, Bono, Erez & Thereson, 2002).

Some people tend to have high core self-evaluations which help them to be confident of their abilities as they become positive of themselves. Such way of appraising oneself using core self-evaluations can yield positive work outcomes, especially in terms of job performance (Judge, Locke & Durham, 1997). Individuals who positively appraise themselves have the ability to cope with stressful situations since it is easier for them to adopt changes and avoid stress factors that might affect them (Brunborg, 2008). This portrays that individuals with high core self-evaluations suffer less levels of stress than individuals with low core self-evaluations (Brunborg, 2008). Whilst positive appraisals yield positive performance, high levels of core self-evaluations produce negative outcomes (Hiller & Hambrick, 2005). If these high levels of core self-evaluations exist among managers within a work context, these may lead to bad decision-making, and more centralized strategic decision-making process which can frustrate the work force (Judge & Kammeyer-Mueller, 2011; Hiller & Hambrick, 2005).

Contrary to people with positive or high levels of core self-evaluations, others have low core self-evaluations as they negatively assess or appraise themselves and lack confidence in their own abilities. Such people have negative assumptions of them and consider themselves as incompetent (Judge, Heller & Klinger, 2008). Low core self-evaluations cause stress and burnout which ultimately leads to employee turnover which is very costly to the organization (Maslach, Schaufeli & Leiter, 2001). In turn, such negative appraisals will result in low motivated employees who always perform their duties poorly (Judge, Erez & Bono, 1998).

In their research investigating the relationship between core self-evaluations and job satisfaction, Judge, Bono, Erez & Locke (2005) found that if the goals to be achieved are congruent with the individual pursuing them, such an individual is likely to achieve them as he or she is happier and puts more effort to achieve them. People pursuing congruent goals become high achievers as they are intrinsically motivated to achieve but incongruence in goals causes individuals to be easily affected by external environmental factors, hence they view jobs as complex (Judge, Locke, Durham & Kluger, 1998). Fundamental traits or personality dimensions that constitute core self-evaluations predict various outcomes when investigated against different variables like stress (Brunborg, 2008), motivation, job performance (Bono & Judge, 2003) and job burnout (Maslach, Schaufeli & Leiter, 2001).

#### **2.4. Achievement goal theory**

Before the actual achievement of goals, one needs to aspire to achieve the goals set (Macmillan, 2009). The basic concern of many psychologists is to determine all the factors that lead to individuals' success or failure to achieve the desired outcome (Gollwitzer & Sheeran, 2006). Ajzen & Fishbein (2000) contend that setting outcome goals shows willingness to attain or achieve such goals.

Achievement goal theory contends that achievement goals influence the actual achievement depending on the purpose served by such goals (Urdu, 1997). The quality of the cognitive self-regulation process in achieving goals cannot be underestimated in goal achievement. Covington (2000) (when applying goal theory to school achievement) emphasized the importance of cognitive self-regulation process which includes: active involvement of learners in their own learning, analysis of the demands of tasks given, acquisition of resources needed to meet the demands and, lastly, the importance of monitoring the progress up until the task is completed (Pintrich, 1999; Zimmerman, 1990).

Ritchie, Fourie and Buchanan (2007) referred to goals as aspirations or expectations (Jacob, Karen & McClelland, 1991) which may include intentions. Locke & Latham (1990) describe intentions as a plan of action one undertakes to achieve a particular goal. To succeed in achieving such goals depends on the attitude one has towards achieving such goals (Bunglawala, 2004). Sheeran (2002) argued about types of intentions as either good or bad. He maintained that to succeed one needs to realise

implementation intentions as these are very effective in facilitating goal achievement (McCulloch, 2005).

Locke and Latham (2002) define a goal as an action or a task which an individual willingly desires to achieve or obtain. When setting a goal, one needs to attach levels of performance needed for one to have achieved the desired outcomes (Locke & Latham, 2006). To successfully achieve a goal one needs to accept and be committed to the goal, specify levels of performance where one can measure achievement, feedback on achievement so that one can direct actions or behaviour towards improving on non-achievement of goals (Locke & Latham, 2006; O'Neil & Drillings, 1994).

Goals and objectives are very important for each organization as they point out a course of action to be followed in order to achieve. A goal can be defined as a future state that either an individual or an organization strives to achieve. According to Barney and Griffin (2004) goals in an organization serve many functions which include provision of guidance and direction, planning facilitation, provision of employee motivation and inspiration and, ultimately, evaluation and performance control. Goals promote planning on how goals can be achieved and assisting individuals to focus towards the goal achievement activities.

Individual differences play a significant role in goal achievement and the ways followed to achieve a goal. For instance, employees with high learning orientation focus on acquiring knowledge and skills while employees with high performance orientation focus on the actual achievement rather than the achievement process. Other studies which produced mixed results were concerned with gender differences in respect of goal orientation. Anderson & Anderson (1999) concluded that males tend to be more performance oriented than females (Roeser, Middley & Middleton, 1996). Other studies found no gender differences at all (Migley & Middleton, 1997).

Anderman and Midgley (1997) commented on two kinds of goals, that is, learning goals, usually referred to as task goals or mastery goals (Robberts, 1992), which assist in upgrading one's competency, enhancing, understanding and appreciation of the material or skill to be learned (Arnes, 1992). The other kind is called performance goals which are usually referred to as ego goals (Nicholls, 1989) or

self-enhancing goals (Skaalvik, 1997) which assist one to outperform his or her peers.

Achievement goal theorists believe that learning goals include success factors that lead to increased achievement whereas performance goals enhance superficial, rote-level processing that frustrates achievement.

## **2.5. Concluding remarks.**

The discussion above provided theories which relate to this study. General adaptation syndrome provided us with possible reasons why people engage in certain types of behaviour. For instance, people might decide to flee or fight the stressful situation. The importance of positivity while performing a job cannot be stressed strongly enough since it leads to success in job performance, assists in goal attainment, which then increases individual work aspirations and always leads to positive self-evaluations since people become confident of themselves.

## CHAPTER 3

### LITERATURE REVIEW

In this chapter, a review of the literature on core self-evaluations will be discussed, starting from the definition of core self-evaluations. This will be followed by discussion on the four fundamental traits that is, self-esteem, emotional stability/neuroticism, locus of control and generalized self-efficacy. A detailed discussion on the second variable, stress will follow. Lastly, work aspirations will be discussed in detail, and the connections among the three variables will be explored.

#### 3.1. Core self-evaluation

##### Definition of Core Self-Evaluations (CSE)

Packer (1985) at first believed that Core self-evaluations (CSE) were a set of basic assessments of people about themselves but later Judge, Locke, & Durham (1997) included ratings, perceptions about themselves, their talents and abilities to give direction to the activities of others.

According to Judge, Bono, Erez and Thoresen (2002), "Core Self-Evaluations is a higher order concept representing the fundamental evaluations people make about themselves, their environments, and the relationship between themselves and their environment" (p. 58). According to this definition, core self-evaluations refer to positive and negative self-concept. People with positive self-concept have high ego, good self-regard and hold positive assumptions about themselves, people around them and the whole universe.

For instance, some feel they can handle life challenges better, or they may feel the world is a dangerous place, or hold no trust for others (Judge, Locke & Durham, 1997). Those with negative assumptions of themselves will have a different reaction as they may consider themselves as not good and incompetent. This concept, core self-evaluation differs from other personality traits that determine how people interpret the environment (Cantor, 1990). People are unique and this is evidenced by the different personalities that people might have (Judge, Locke & Durham, 1997). The focus in this research is on the self although the environment can have an influence, whether direct or indirect.

Core self-evaluations are best described through four specific traits that is, self-esteem, generalized self-efficacy, locus of control and emotional stability. All these traits are closely linked with the individual's personality. Greenberg and Baron (2008) defined personality as a distinct pattern of traits and characteristics possessed by a person that uniquely influences thoughts, emotions, motivations, cognitions and the way of behaving in various situations. The characteristics named above are what make individuals unique, hence some people positively appraise themselves whilst others negatively appraise themselves. People who negatively appraise themselves have low self-esteem.

### **3.1.1. Self esteem**

#### What is self-esteem and how is it connected with core self-evaluations?

Before focusing on the outcomes of the other writers, a brief explanation of each term needs to be carefully examined. Self-esteem, as first discovered by James in 1890, was explained to include the feeling of the sense of positive self-regard that is stimulated by over performance or when an individual constantly exceeds the important goals in his/her life (Locke, McClear & Knight, 1996). Self-esteem includes evaluative perception of one's self which can be uncertain, bad or negative when a person feels not competent (Brown, 1998). Harter (1990) concluded that self-esteem is core evaluation of the self as it is the total importance that one puts on one's self.

According to Webster's New Collegiate Dictionary, self-esteem is defined as one's confidence and satisfaction in one's own self. This includes self-respect and self-conceit. Self-esteem is never accurate or inaccurate but when it reaches high levels, it becomes clear that it matches individual attributes, goals and accomplishments (Dolan, 2007). Different writers include many psychological concepts with regard to or related to self-esteem. These include self-effectiveness, self-concept, resilience and resistance to stress or hardiness. Self-esteem has two components and one of these is generalised self-efficacy.

### **3.1.2. Generalised self-efficacy**

Dunn, Dunn, Elsom & Cross (2007) see self-efficacy as the manner in which a person evaluates his/her abilities to organise or perform a task. It has a great effect on people's actions or their performance. Judge and Bono (2001) explain this concept in a generalized form as they view generalized self-efficacy as "one's estimate of one's capabilities to mobilize the motivation, cognitive resources and courses of action needed to exercise general control over events in one's life." According to these definitions, all these writers agree that self-efficacy reflects how one copes with difficulties in life, how one behaves in such situations. Judge and Bono (2001) viewed general efficacy as one of the components of self-esteem which is even related to core self-evaluations and has strong similarities with the locus of control.

### **3.1.3. Locus of control**

Ozmete (2007) generally believed that life's rewards, reinforcements and outcomes are managed by the person's own actions which he referred to as 'internal locus of control'. Sometimes these actions can be regulated by environmental factors which are beyond one's control, that is, they are referred to as 'external locus of control'. Judge, Locke, Durham & Kluger (1998) agreed that generalized self-efficacy deals with person's actions, the way one behaves, while locus of control is concerned with the outcomes.

People with internal locus of control are confident and inquisitive. They are great achievers and are geared towards personal development, that is, development of their knowledge, abilities and skills. They note and make use of the information that can create positive outcomes in future. Although Dunn, Elsom and Cross (2007) and Bandura (1997) viewed self-efficacy and locus of control as unrelated, Bono and Judge (2003) concluded that these traits share strong similarities, namely, self-esteem, generalised self-efficacy, locus of control and neuroticism. The only difference is that most research indicates that locus of control fits less with core self-evaluations than other traits.

These four traits show interdependence as in one study they can be treated as dependant variables but independent or causative variables in other studies. An

example of this is an investigation by Judge, Erez, Bono and Thereson (2002) which investigated if measures of self-esteem, neuroticism, locus of control and generalised self-efficacy are measures or indicators of a common construct. Wambach and Panackal (1979) investigated the effects of neuroticism on locus of control while Schneider, Grazia, Nadel & Weissburg (Eds. 1989); Morelli, Krotinger and Moore (1979) inquired about the locus of control as a cause of neuroticism. Judge, Erez and Bono (2002); Eyseck (1990a), after investigating primary traits that describe neurotics, regarded self-esteem as amongst the nine traits that form neuroticism. Robins, Tracy, Trzesniewski, Potter and Gosling (2001) in their study founded that self-esteem correlates well with emotional stability (neuroticism). Findings on these studies clearly indicate that these four traits are interdependent and are closely related.

### **3.1.4 Neuroticism**

Neuroticism, a trait symbolized by jealousy, moodiness, worry and anxiety, which reveals itself through having feelings of fearfulness, being easily frightened, dependency or insecurity and helplessness, is one of the big five personality traits which form the negative end of self-esteem (Freud in Psychometric & success, 2013); Costa & McCrae, 1988). This is measured through negative affectivity (NA). As a result, many researchers indicate that the two, neuroticism and negative affectivity, are closely related concepts (Larsen & Ketelaar, 1991). Individuals with high neuroticism are not confident of themselves and they respond poorly to stressors around themselves.

Most writers tie up neuroticism with emotional stability, which refers to low neuroticism. Emotional stability refers to the ability of a person to remain stable, calm and balanced with less negative feelings. Sub-traits of emotional stability include anxiety, vulnerability, anger, self-consciousness, depression and immoderation. While neurotic refers to feelings of negative emotions, emotional stability is the feeling of positive emotions (Larsen & Ketelaar, 1991).

### **3.2. Stress**

Stress is derived from a Latin word stringere which means to draw tight. This term was often used in the 17<sup>th</sup> century to describe the affliction (Study mode, 2011;

Cartwright & Cooper, 1997). Numerous definitions have been attached to stress; for instance, Carell, Grobler, Elbert, Marx and Hatfield (1999) define stress as a “discrepancy between an employee’s perceived state and desired state, when such a discrepancy is considered important by the employee.” Mostert, Rothmans, Mostert and Nell (2008) and Brown (2011) indicate that the results of such a discrepancy include lower job performance, resentment of supervision, boredom, low self-esteem, inability to concentrate and make decisions, apathy, short attention span, burnout and job dissatisfaction, increased absenteeism, tardiness, decreased productivity, and loss of talented workers.

According to Brown (2011) stress is an interaction between an individual and the environment, designated by emotional strain that affects a person’s physical and mental state. Such a situation which causes stress to an individual is called a ‘stressor’. Stress is not a situation itself but how an individual responds, that is, his/her reaction to such situation (Greenburg & Baron, 2008). Rollinson (2005) views stress as a pattern of emotional and psychological reactions in response to demands from internal or external sources.

However, a condition experienced by an individual has its own causes (Greenburg & Baron, 2008; Van Zyl, 1993) or sources of job stress (Cartwright & Cooper, 2002; Coetzer & Rothman, 2007; Rollinson, 2005) as well as effects (Greenburg & Baron, 2008) or consequences as Van Zyl, (2002) refers to it. Martin (2005) cites sources of high levels of stress as role ambiguity, work relationships, inadequate or inappropriate tools and equipment, career advancement, job security, lack of job security, work-home interface, workload, compensation and benefits, lack of leader/manager support and aspects of the job itself.

### **3.2.1. Major causes and sources of stress**

There are many approaches to discussing major causes and sources of work stress and are even divided into many categories (Luthans,2008; Brown, 2011; Cartwright & Cooper, 1997). The categories of stress often mentioned include individual stressors, group stressors, organizational stressors and extra-organizational stressors.

### 3.2.1.1. Individual stressors

The ways individuals behave in different situations depend on the personality type of those individuals. These personalities can affect individuals and result in negative stress outcomes (Luthans, 2008; Schell, 1997). Individual dispositions like type A and B personalities, learned helplessness and psychological hardiness affect the level of response individuals' experience.

#### 1) Type A and B personalities

Individuals differ both in terms of dispositions and characteristics. Although most research focused on the type A personality, many characteristics revealed both personality A and B. These personality traits include authoritarianism, anxiety, tolerance, emotionality, spontaneity, supportiveness, extroversion, rigidity and the need for achievement.

Luthans (2008) describes type A personality by its profile. Such personality is 'action emotion complex, always moving and rapidly in actions, impatient, can't cope with leisure time, aggressive, competitive, constantly feels under time pressure and always sets high standards of performance without relaxation.' Schell (1997) concurred with this by quoting their tendencies as ' individuals who walk fast, think fast, talk fast with loud voices, are job and task-fixated, use sarcasm, have forced smiles rather than natural smiles, easily frustrated and talk over others if they take too long to come to the point.'

Friedman and Rose (in Luthans, 2008) maintained that type A personality is an 'action – emotion complex person, who is aggressively involved in a chronic incessant struggle to achieve more and more in less and less time, against the opposing efforts of other things or other persons.' Examples of categories of employees who usually resemble this type of personality are managers, sales persons, staff specialists, secretaries or even rank andfile employees. These categories experience high levels of stress (Luthans, 2008). Their common features are as follows:

- Overloaded hard workers who work long hours and constantly meet deadlines and endure constant pressures.

- No relaxation and cannot differentiate between working hours, night or weekends.
- Set high standards of performance and are highly competitive.
- Easily frustrated by colleagues, supervisors and even work situations.

Unlike A, personality B is patient, relaxes without guilt, not pressed about deadlines, mild mannered, never in hurry and not concerned about time. Type B personalities are less successful, less ambitious and behave well even in stressful situations.

## 2) Learned helplessness

This term has been exposed by Seligman (in Luthans, 2008) through his research conducted through experimentation with dogs. He found that when dogs were unable to escape shock, they simply give up. Worst is that even if an opportunity to escape is presented the dogs have learned to be helpless. The same is applicable even in the work environment. When employees have accepted stressors, even if they are given chances to escape, they cannot even notice such opportunities since they have already given up.

The most contributing factor to learned helplessness is lack of control. Individuals mostly experience lack of control when they perceive the reasons for such to be:

- Related to own personal characteristics ( as opposed to other outside environmental forces)
- Stable and enduring (rather than temporary)
- Global and universal (other than in one sphere of life)

Such lack of control within the work situation will lead to individuals experiencing stress. Karasek (1979) agreed with this statement in his model – the demand control model. According to the demand control model proposed by Karasek (1979), individuals are more likely to experience high levels of stress if an individual lacks control over his/her responsibilities. Cartwright and Cooper (1997) counted on other situations that employees found themselves in, like organizational change. These are highly stressful situations since the employee has no control and has no confidence if circumstances will work in his/her favour.

### 3) Self-efficacy

This term, which is sometimes used interchangeably with the term 'confidence', refers to an individual's perception of how controllable the situation is and how well one can perform a particular task (Bandura in Madi, 1996). Bandura (1997) argued that motivation cannot function without self-efficacy because an individual needs to believe that she/he can produce the desired results. Stajkovic (in Luthans, 2008) further defines self-efficacy as an 'individual conviction about his or her abilities to mobilize the motivation, cognitive resources, and courses of action needed to successfully complete a specific task within a given context.' This means that individuals with high self-efficacy usually remain in control of the situation when faced with a stressful situation.

### 4) Psychological hardiness

Individuals react differently when faced with extreme stressors. Some individuals seem to break up at the slightest provocation whereas others remain calm even if the situation is highly stressful. Those individuals who cope in the face of such difficulties are said to be hardy. In this case individuals were categorized as hardy and non-hardy. Kobasa (in Luthans, 2008) found that hardy individuals had a lower rate of stress-related illnesses. These people have the following features:

- Too much committed in their work
- Pleased by challenges
- Believe that they can control events around them.

Individuals of this calibre have the ability to resist stress hence they can provide buffers between themselves and the stressors. They have the ability to survive and grow vigorously in such environments. Non-hardy individuals may suffer the harmful outcomes of stress and conflict (Kobasa in Luthans, 2008). Most researchers in positive psychology concluded that, "once an individual becomes tough and thereby experiences the sustained energy necessary for successful coping, that person is likely to experience a greater variety of situations as challenging rather than threatening' (Luthans, 2008).

### 3.2.1.2. Group pressures/stressors

Groups can also be a source of stress since members are under pressure to conform to group norms and if a person alters some of the norms stress levels will increase (Moorhead & Griffin, 1989). Dolan (2007) maintains that the pressure groups exert on the individual members can lead to stress, especially if a member undertakes values and beliefs which contradict with their principles. These pressures bring about psychological as well as behavioural changes. Group stressors can be categorized into two areas as follows:

#### 1) Lack of group cohesiveness

Group cohesiveness or togetherness is very important for a group to perform, more especially in the lower ranks. Without unity and coordination in the group, the outcome can be very stress producing (Luthans, 2008). He further articulated that group level dynamics may become stressors hence they sometimes lead to conflict with workers and supervisors which can lead to depressive symptoms for the employees involved.

#### 2) Lack of social support

Social support leads to the effectiveness of the group since it provides a platform for individuals to share their problems. The absence of such support leads to a very stressful situation which is costly to the organization (Luthans, 2008). Lack of social support leads to: poor relationships, decrease in self-esteem and high levels of anxiety that ultimately causes social isolation (Mohr in Dormann & Zapf, 2002; Luthans, 2008).

#### 3) Career stress

This category of potential stressors includes job insecurity, that is, the threat of being unemployed, inability to be promoted, lack of skills required to perform the job and this results in inability achieve ones goals or less work aspirations (Cartwright & Cooper 1997; Luthans, 2008). Mergers and downsizing in various organizations lead to scarcity of job opportunities, job dissatisfaction, demotivation and even loss of commitment to the organization (Campbell-Jamison, Woral & Cooper, 2001). The

concept of 'career' nowadays is associated with different forms of employment contracts which can be negotiated or in some cases enforced. Lack of promotion opportunities, when due, are regarded as lack of progress and employees regard these as primary sources of job dissatisfaction, ultimately leading to a major stress. Despite changes in societal attitudes concerning equal employment opportunities, disadvantaged groups like women and other minority groups encounter organizational barriers to their career development (Cooper, Dewe & O'Driscoll, 2001). This produces high levels of psychological strain to these disadvantaged groups.

### 3.2.1.3 Organizational stressors

Individuals have to deal with a variety of stressors in an organization, which are unique to each organization and exist at macro level dimension of the organization (Luthans, 2002). The figure below shows macro level stressors which have been categorized into administrative policies and strategies, organizational structure and design, organizational processes and working conditions (Luthans, 2008).

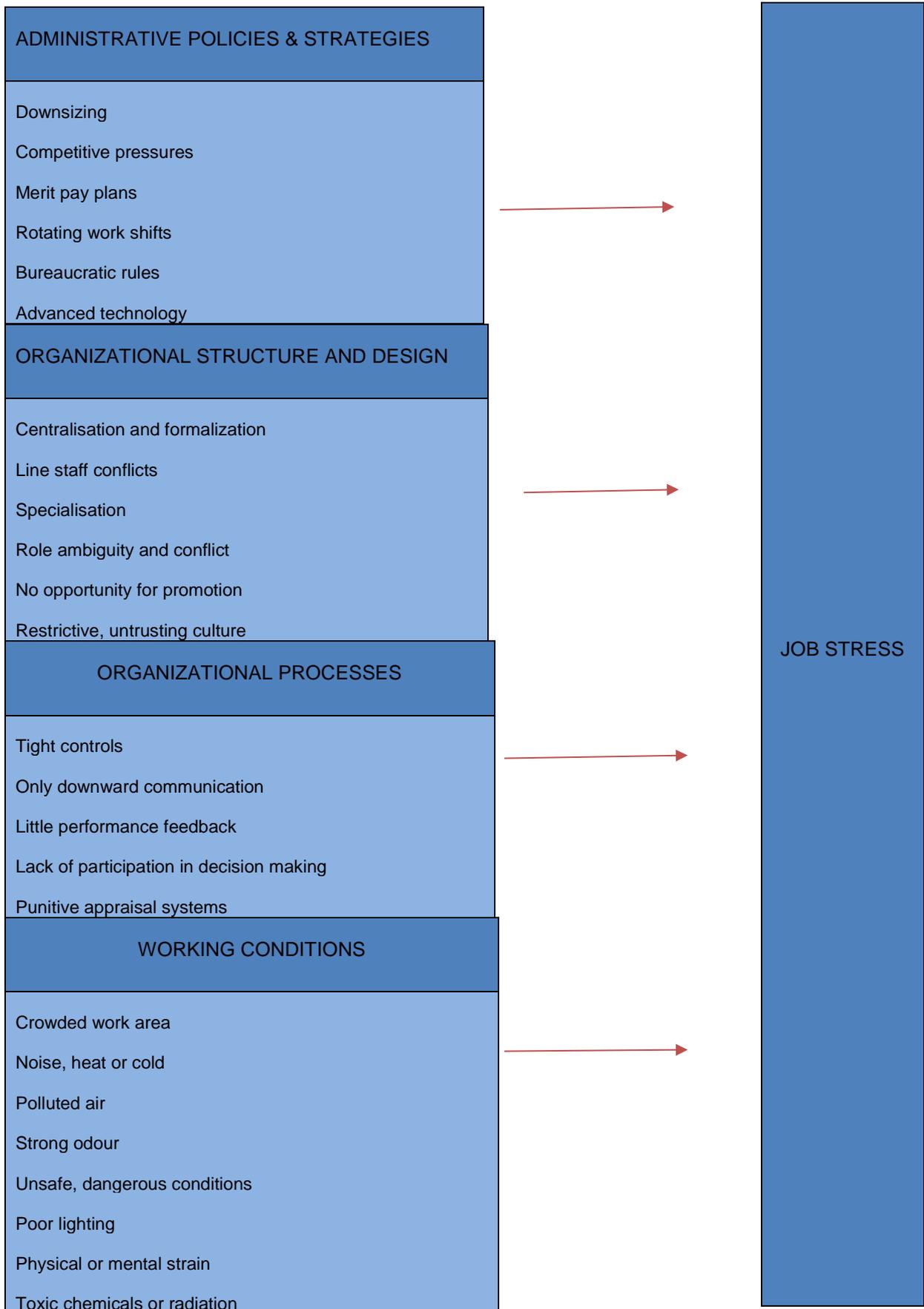


Figure 3.1: Macro level stressors

There are many specific examples of these organizational stressors which, amongst others, include lack of clear job description or reporting relationships, inadequate recognition, responsibility without authority, inability to voice complaints (Luthans, 2008) and lack of empowerment, leadership style of immediate supervisor, lack of participation in the decision-making, downsizing due to technological changes, restructuring that results in unexpected changes in work-schedules, competition that results in conflicts among the colleagues or violence in the workplace and less time to do expected duties (Brown, 2011).

Luthans (2002); Cartwright and Cooper (1997); Sutherland and Cooper (2000); Quick, Nelson and Hurrell (1997) cited many factors in an organization that can lead to stress. They summarized these as task demands, physical demands, role demands, interpersonal demands and career stress.

### **1) *Task demands***

Task demands refer to the factors related to a specific job the individual is performing together with the type of occupation, job security and workload. These factors also include the design of the individual's job, that is, task autonomy, task variety, level of automation, working conditions and the physical layout (Bakker, Demerouti, De Boer & Schaufeli, 2003). It also consists of stresses such as change in work responsibilities, technological changes as well as time pressures. Examples of these include assembly lines which need excessive speed or working in areas with constant interruptions that lead to increased anxiety and stress.

Job security can have an influence on the way one perceives stress. Some occupations are more stressful than others, for instance, football coach (professional), general practitioner, airplane baggage loader and even shift work increase stress levels (Cartwright & Cooper, 1997). Individuals occupying secure jobs are relaxed and do not even think about being fired, but when such security is threatened stress can increase (Moorhead & Griffin, 1989).

### **2) *Physical demands***

These are working conditions which include physical surroundings as well as the design of the work place (Cartwright & Cooper, 1997). Dolan (2007) viewed these conditions as harsh, extreme, strenuous or hazardous work environments. Physical

surroundings refer to a level of noise, type of lighting (extremely bright or poor), smells and temperature. If these are in excess, they result in increased stress levels. Poorly designed offices with no privacy could result in distraction of an individual from performing the task as demanded (Moorhead & Griffin, 1989). Too much interaction can confuse a worker of his/her job responsibilities and the role she/he has to perform.

### **3) *Role demands***

Moorhead and Griffin (1989) describe role demands as a set of behaviours associated with a particular position or a role played by an individual in an organization or in a group. These occur when responsibilities assigned to an individual are inconsistent or when expectations presented are confusing. If the roles and expectations are clearly defined and are being understood by the individual, stress will be minimized (Cartwright & Cooper, 1997).

Cox (1993) cited in his findings that a variety of research has confirmed that most employees regard organization as an environment for (a) performing tasks, (b) solving problems and (c) development. If one of these is perceived to be lacking, levels of stress escalate. He further identified two key sources of stress resulting from a person's role within the organization, that is, role ambiguity and role conflict.

### **4) *Role conflict and ambiguity***

Role conflict and role ambiguity evolve when a person is not clear about the rules of a certain situation. These include his or her responsibilities in performing a certain job, the actual work objectives, what his colleagues expect from him or her (Cartwright & Cooper, 1997; Luthans, 2008). Consequences of role ambiguity and role conflict may include lowered self-esteem, lower levels of motivation at work and increased job turnover (Coetzee & de Villiers, 2010). These can be prevented through role analysis as this provides a means of dealing with such problems (Brown, 2011).

Luthans (2008) added that role conflict also occurs when an employee or a team member is forced to perform tasks that clash with his or her personal values. Such conflict increases when one has to engage in an unethical behaviour just because the

group stresses one set of norms whilst the leader and the organization express others.

Although different people at different levels can play different roles which are relevant to their behaviour, (for example, men and women being church members, officer of a community group, weekend golfer, and others) organizational roles are the most important ones. Roles like salesperson, engineer, departmental head and chairperson often involve conflicting demands and expectations. Even if some roles differ because of culture, as shown in the 'International Application Example' in Luthans (1998), this results in conflict.

Luthans (2002) cited three different types of role conflict as follows:

- Person-role conflict which means that the demands placed on one's job role does not match one's personality skills.
- Intra-role conflict occurs when conflict originates from varying expectations on how a certain job can be performed. An example is that of a manager who is unsure of the leadership style to pursue, whether to be autocratic or democratic, when dealing with his or her subordinates (Luthans, 2002).
- Inter-role conflict occurs when an individual experiences conflict among two or more roles which must be performed at the same time. Work demands and non-work demands are usually a cause of such conflict as a successful manager working longer hours at work can be a mother who has to care for her family at the same time (Luthans, 2002).

In a research conducted by Chen and Spector (1992) role ambiguity and role conflict were found to be amongst the work stressors which resulted in anxiety, aggression and sabotage. Results of a meta-analysis of 96 papers conducted by Jackson and Schuler (1985) show that role ambiguity and role conflict are two separate constructs which impact differently in each organization and as such should be examined and treated separately and not together as some researchers do. Discussed above are only the intra-individual aspects of conflict whereas even interpersonal aspects of conflict are important.

## **5) Interpersonal demands**

Interpersonal demands are pressures created within a group of employees working together, for example, managers, peers, team members. This refers to all the stressors associated with the characteristics of the relationships that confront people in organizations. Poor interpersonal relations and lack of social support can lead to stress (Luthans, 2002; Moohead & Griffin, 1989; Cartwright & Cooper, 1997). Examples of these interpersonal demands are group pressure, personality style, and leadership style.

Despite individual, group and organizational stressors there are stress causes which are regarded as non-work related or termed as 'extra-organisational' stressors.

### **3.2.1.4. Extra-organisational stressors**

Luthans (2008) often refers to the important role that extra-organisational stressors play in our lives, although these are constantly ignored. Forces outside the workplace make a large contribution to how one behaves and performs one's duties in the workplace. These are societal/technological changes, life changes, family, relocation, race, gender and class stressors.

#### **1) Societal or technological change**

As the work environment changes, skills become disused whereas new equipment is always introduced. Such a high rate of change may pose a threat to some individuals as they will be unable to cope with such innovations (Cooper, Dewe & O'Driscoll, 2002). The introduction of new technology is connected to changes in employee job satisfaction and physical health (Korunka, Weiss, Huemer, & Kareta, 1995). Cartwright & Cooper (1997) endorsed this by adding another category of employees, that is, top executives and managers. Such advances in computer technology lead to increases in computer utilization by organizations and forces the latter to modernize work processes whereas people lack such expertise.

#### **2) Life changes**

By life changes we refer to hurtful aspects of life like getting old, sudden death of a spouse, that is, all sudden changes that have a dramatic effect on people, making

life more stressful (Luthans, 2008). The most vulnerable people are aged executives (between 40-50 years), who have been abusing alcohol, living with discriminated children, aging parents and a wide range of financial commitments. The more exposure to hurtful life changes, the poorer the subsequent health and the greater the risk of accidents which are attributable to stress (Crosby in Luthans, 2002). He further argued that divorce interferes with work more than any other personal life stressor. Among the things he noticed is poor concentration in divorced men and women within the first three months and such individuals become less productive.

### **3) *The family***

Different writers give different definitions of the term 'family' but some agree on the fact that a family can be defined as 'a network of people who share their lives over long periods of time, bound by ties of marriage, blood, law, or commitment, legal or otherwise, who consider themselves a family and who share a significant history and anticipated future of functioning in a family relationship' (Boss, 2002; Galvin, Bylund & Brommel, 2008 in Maguire, 2012). Having this bond these members can be attacked by crises like illness of a family member, strained relationship with a spouse, or children which can produce stress to those employees (Luthans, 2008).

Many employees find it difficult to strike a balance between work and family due to longer hours of work or even night shifts (Atkinson, 1999). These factors may lead to strained relationships within family members and even work (Sutherland & Cooper, 2000). Additional factors that play a big role in employees' stress due to family situations are when family members develop hurtful family environments marked by aggression, lack of affection, neglect, violence, (Maguire, 2012) and life changes such as divorce or getting older, being forced to take a second job, the economic situation in general as well as status. These situations reduced time for recreational activities and other family activities hence are regarded as unresolved environmental demands (Luthans, 2008).

### **4) *Relocation***

Relocating the family due to transfer or promotion can lead to stress (Luthans, 2008; Cartwright & Cooper, 1997). Financial situations of different families have proved to be stressors hence either a husband or a wife is forced to take a second job, the so

called, 'moonlighting' (Luthans, 2008), to assist his/her family to cope financially. Although some research shows that employees are more mobile nowadays, it is even worse with top level post occupants. Such movement can be traumatic and stressful because those people have to leave their families, that is, children, wife and other activities one is used to. These people view and interpret such movement differently due to age, educational level/qualification, job skills and one's personality (Cartwright & Cooper, 1997). The overall impact on employees is more stress on their primary job which requires adaptive behaviours in the form of social readjustments.

#### **5) Race, gender and social class**

These sociological variables can become stressors too. It has been noticed that minorities suffer more stress than majority groups (Luthans, 2008). Individual employees may be unfriendly to those perceived as different and they may decide to leave as they may see themselves as misfits (Schneider & Northcraft, 1999). Several studies conducted agreed that women perceive more job demands than men whether such occupation is male dominated or female dominated (Luthans, 2008). Professional women experience stressors like discrimination, stereotyping, marriage work interface and social isolation (Nelson & Quick, 1985).

To summarise all the sources of stress at work Michie (2002) used the following diagram:

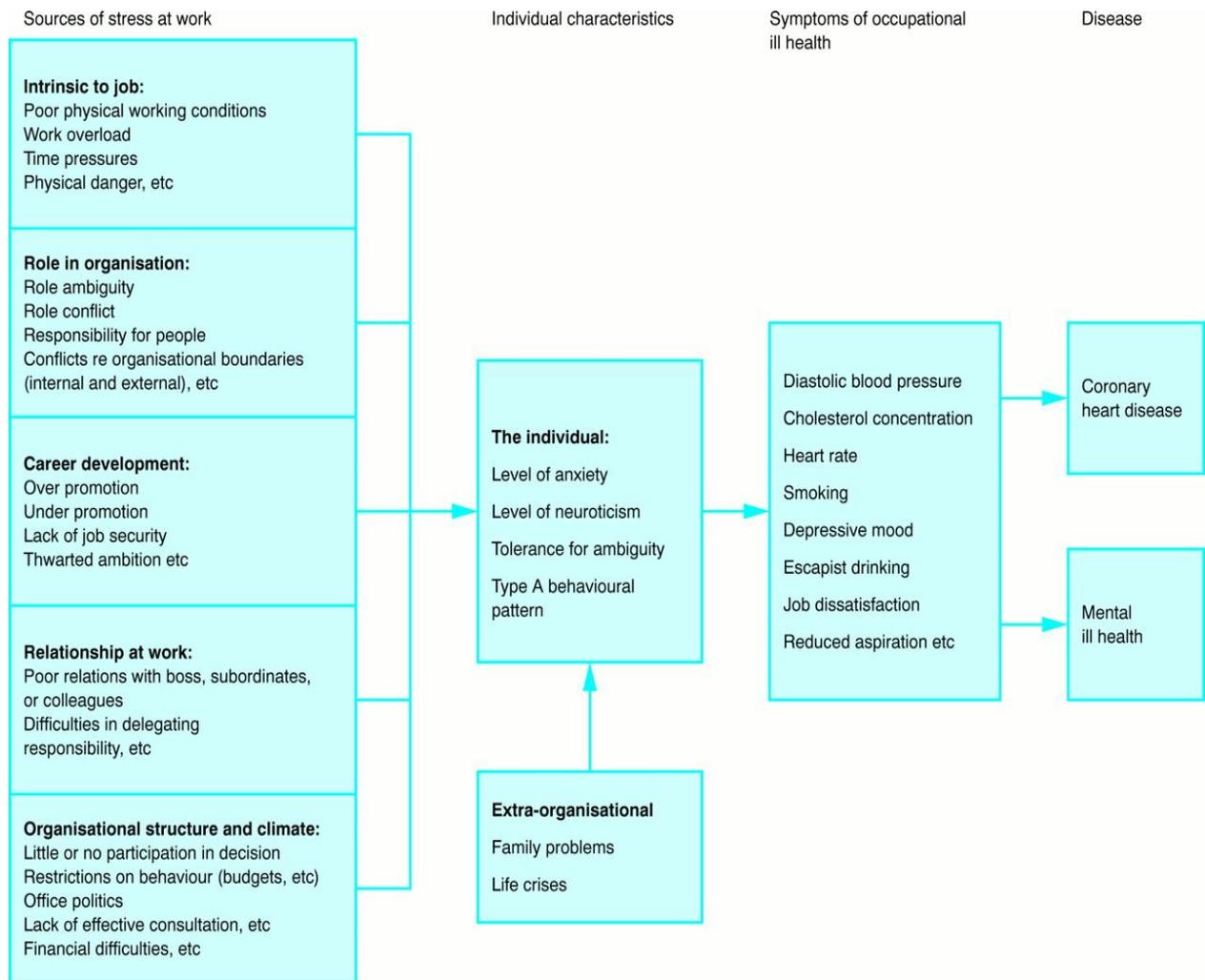


Figure 3.2: Sources of stress by Michie (2002)

### 3.2.2. Effects of stress on an individual and the organization

Luthans (2008) indicated that not all stress is bad since low levels of stress increase job performance. Advising on family stress, Maguire (2012) maintained that stress effects depend on the nature and type of stress. Stress can be classified according to the valence (eustress versus distress) duration (chronic versus acute) of the event.

One recent study found that mild stress may have positive results like increased activity, change, and overall better performance. Dolan (2007) stated that globalization has stressful tendencies on employees. As organizations are pressured by changes around the world, they have to respond quickly and effectively

to such changes. This pressure has to be passed on to employees and this result in a stressful situation at both the organizational and personal levels (Dolan, 2007).

In addition research conducted by Smith, Segal and Segal (2013) indicated that the level of difficulty, the nature of the task being performed, personal dispositions and other psychological dispositions and neuroticism may affect the relationship between stress and performance. Luthans (2008) concluded that: Multi-tasking is strongly affected by stress; performance usually drops off distinctively when stress levels have largely increased.

The major concern is the dysfunctional effects of high levels of stress since they lead to cognitive, emotional, physical, psychological and behavioural problems within an individual.

Smith, Segal and Segal (2013); Smith, Mcnamara and Wellens (2011) tabulated the effects of stress as follows:

<b>COGNITIVE PROBLEMS</b>	<b>EMOTIONAL PROBLEMS</b>
<ul style="list-style-type: none"> <li>• Brain rewiring</li> <li>• Memory problems</li> <li>• Depression</li> <li>• Inability to concentrate</li> <li>• Poor judgment</li> <li>• Seeing only the negative</li> <li>• Anxious or racing thoughts</li> <li>• Constant worrying</li> </ul>	<ul style="list-style-type: none"> <li>• Moodiness</li> <li>• Irritability or short temper</li> <li>• Agitation, inability to relax</li> <li>• Feeling overwhelmed</li> <li>• Sense of loneliness and isolation</li> <li>• Depression or general unhappiness</li> </ul>
<b>PHYSICAL PROBLEMS</b>	<b>BEHAVIOURAL PROBLEMS</b>
<ul style="list-style-type: none"> <li>• Pain, digestive problems</li> <li>• Aches and pains</li> <li>• Diarrhoea or constipation</li> <li>• Nausea, dizziness, headaches</li> <li>• Chest pain, rapid heartbeat or even a stroke</li> <li>• Loss of sex drive</li> <li>• Frequent colds</li> <li>• Illnesses or health problems like heart attack</li> <li>• Obesity</li> <li>• Autoimmune diseases</li> <li>• Infertility and speedy aging rate</li> </ul>	<ul style="list-style-type: none"> <li>• Eating more or less</li> <li>• Sleeping too much or too little</li> <li>• Isolating yourself from others</li> <li>• Procrastinating or neglecting responsibilities</li> <li>• Using alcohol, cigarettes, or drugs to relax</li> <li>• Nervous habits (e.g. nail biting, pacing)</li> </ul>

As indicated in the table chronic stress disrupts every system of the body and leads to demotivation, hence an organization cannot be productive if working with highly stressed employees.

Greenberg and Baron (2008) refer to 'stress as, the pattern of emotional states and physiological reactions occurring in response to demands from within or outside organisation' (p.170). Psychological problems associated with stress include changes in mood, anger, anxiety, feelings of helplessness, irritability, tension and boredom (Dormann & Zapf, 2002; Luthans, 2002). All these problems associated with stress have an impact on job performance (Luthans, 2002), job satisfaction and decision making (Greenglas & Burke, 2001). Growing evidence suggests that high levels of stress adversely affect physical health, psychological well-being, behaviour and many aspects of task performance (Mistry, Benner, Tan & Kim (2009). If stress has such an adverse effect on employees, can they dream or aspire to perform better for such organizations? The following topic on aspirations will present a discussion on employee aspirations and how related the two variables, namely, stress and aspirations are.

### **3.3. Aspirations**

Aspiration, as defined by Macmillan (2009), is the strong desire to achieve something or an ambition or objective desire to succeed or for promotion. Individuals' aspirations comprise an objective to pursue the goal and the feeling toward a goal (Locke & Latham, 2002; Haller & Miller, 1971). The concept of 'aspiration' as it relates to work performance has been conceptualized and reviewed to include occupational, career and management aspirations.

An operational definition of an aspiration is any future goal in which an individual is willing to invest time, effort or money, as proposed by Turner (in Sherwood, 1989) and Kerckhoff (cited in Spenner & Featherman, 1978). Other writers refer to aspirations as targets while others link them to achievement motivation. In this study aspirations will be looked at as achievement of goals within the work situation.

A goal is a task which one consciously desires to achieve or get or obtain (Locke & Latham, 2002). The process of goal setting includes a conscious process of establishing levels of performance to obtain desired outcomes. As people's aspirations assist them to achieve their goals, such achievement can be obtained by increasing effort or changing strategy (Locke & Latham, 2006). All these tasks can be performed by individuals or teams at work, or can be started in early childhood.

Strand (2007) and Gottfredson (2002) investigated aspirations during childhood and adolescence where they emphasized the importance of the parental role during this stage. Levinson (1977) indicates that one of the major tasks during early childhood is to form aspirations, to make commitments to people and organizations and to strive towards achievement of one's goals. To advance this argument, he introduces the concept of a 'dream', defined as, "an imagined possibility of self-in-world, a vision of the adult self-living a good life. It is a soil in which joyfully hopes can flower, but it also nourishes illusive beliefs: that I am capable of accomplishing everything the dream envisages, that certain others will unequivocally support my efforts, and that fulfilling the dream will bring me true happiness" (Levinson, 1986, p.108).

In addition, research on aspirations is vast, with the majority of work done on occupational aspirations (Rojewski & Yang, 1997) including that of adolescents and senior management aspirations. Super (1990) argues about establishment phase which he links with ages 25-44, which is suggestive of a time when individuals seek to secure a permanent place of work by committing more strongly to work and advancement. This means that individuals at this stage have high aspirations for advancement and are geared towards goal achievement.

Sherwood (1989) viewed an aspiration as any future goal in which an individual can willingly employ resources like time, effort or money to ensure its achievement. This leads us to look at all the dynamic processes followed by individuals to assess opportunities, constraints and risks, and the choice of goals and strategies to attain such goals.

McGregor and Elliot (2002) in their three studies investigating aspirations as predictors of achievement included mastery, performance approach and performance avoidance goals. They argued that in order for an employee to master goals set, there are some positive motivational processes that should be followed, for example, effective preparation towards goal achievement as well as challenge appraisals. This should be followed by a performance approach like the aspiration of the outcome after performance and negative processes like threat appraisals.

Research on aspirations has followed four lines of inquiry. The first line has tried to measure individual differences in generalized ambition or its natural inclination to achieve. The second line has tried to identify the links between internalised, personal

values and levels of ambition. The third line has tried to measure the effect upon achievement of the cognitive dissonance created by status inconsistency (the discrepancy between self-image and objective status). And the fourth has tried to account for individual differences in the goals or objects of aspirations (Lewin in Sherwood, 1989; Quaglia & Cobb, 1996).

According to the field theory by Lewin (in Sherwood, 1989), the strength (motivational stimulus) of an aspiration equals the value an individual places upon the goal and to his/her chances of attaining the goal. If the goal is of high value, many individuals will strive to achieve it as their aspiration to achieve it will be stronger. The lower the value or the less the perceived likelihood of achieving the goal, the weaker the aspiration will be.

Aspirations have two clearly outlined aspects. First, they are futuristic, that is, they can only be satisfied sometime in the future. This distinguishes them from immediate gratifications. Secondly, they tend to be motivators as they form part of the goals which individuals are willing to invest in, that is their time, effort or money in order to attain them. This differentiates them from idle daydreams and worthless wishes.

After outlining his argument, Sherwood (1989) concluded that an aspiration is any goal an individual is willing to invest in beforehand. Turner and Kerckhoff have engaged in similar concepts in their aspirations studies, Turner defining ambition as the "active pursuit of goals" and Kerckhoff defining it as a "willingness to work to achieve goals" (Turner in Quaglia & Cobb, 1996; and Kerckhoff cited in Spenner & Featherman, 1978). These two definitions have something in common; motivation to achieve goals willingly without being forced.

Another study was conducted by Hoppe (1976) to examine factors that influence goal setting behaviour. This study considers the effects of success and failure on individual's decisions to raise or lower their level of aspiration. He found that individuals' level of aspiration cannot be stable during the course of activity. Individuals differed tremendously in their levels of aspiration due to their differences in their personality styles like ambition, self-confidence, prudence, courage (Gardner in Quaglia & Cobb, 1996). Level of aspiration was studied in the context of a specific task.

Fishbein and Ajzen (1975) described aspiration as the rising level of internal motivation of an individual. This shows that such an individual is responsible for taking charge of his or her behaviour or practice with full comprehension of its content, value, and application to achieve desired results. The level of aspiration reflects one's intention to change. Fishbein and Ajzen (1975) described intentions as predictors of behaviours. When an individual aspires, a change process has begun and this is followed by a change in behaviour or practice by that individual.

Frank (in Quaggia and Cobb, 1996) reported that the relationship between the aspiration level and the level of past performance depends on the following needs: (1) the need to keep the level of aspiration as high as possible (i.e. above the level of past performance), (2) the need to make the level of aspiration approximate the level of future performance, and (3) the need to avoid failure, where failure is defined as a level of performance below the level of aspiration. These needs resemble different personality types as some people would always aspire to achieve more whilst others would like to maintain what they have achieved or just keep their aspiration levels below the past performance achieved.

Frank (1996), reported that the element of motivation is key to tracing the level of aspiration and performance. One cannot have a proper analysis of the above mentioned needs without considering both environmental and personal factors which have a direct impact on them. Frank (in Quaggia and Cobb, 1996) concluded that there are two psychological determinants of the level of aspiration. The first is when one performed so that a failure can be avoided, that is, minimal performance. The second is the need to maintain high level of aspiration without even considering performance (Frank, in Quaggia and Cobb, 1996). According to Hope (in Quaggia and Cobb, 1996), the second psychological determinant is motivated by the level of the ego, which is not only the desire to do well but even aim at uplifting one's social status.

Associating himself with the latter statement, Frank (in Quaggia and Cobb, 1996) viewed the level of aspiration as posing a threat to self-esteem. He further alluded to other factors that pose a threat to the achievement of goals as social and cultural factors as well as other organizational factors. Some studies look at how groups within the organization affect aspiration levels. Adherence to a group level of

aspiration poses a disadvantage hence even if an employee has an inner drive to succeed, he/she has to limit his/her accomplishments to the success level of the group. This is a result of fearing to be left out as a group member or alienated from the group.

Collier (in Guaggliia and Cobb, 1996) uses social comparison theory to explain aspirations and their differing levels. He defined aspirations as the ability to establish and set goals for the future and be stimulated in the present to work towards achieving such set goals. He attaches two variables as determinants of aspirations, that is, inspiration and ambitions. Inspiration clearly shows that the activity is exciting and enjoyable as one is motivated by the activity itself, that is, its intrinsic value. Ambitions reflect an individual's perception that it is possible and desirable to plan for the future. That is why in his definition Collier (1994) views aspirations as unique as they combine motivational components like inspiration and ambitions.

Research by Festinger (in Guaggliia and Cobb, 1996) assisted us to understand aspirations as a manifestation of a desire to achieve and improve. The level of aspiration research has shown that aspirations are qualified by how an activity is conducted or how a goal is achieved (Hope in Guaggliia and Cobb, 1996), by experiences of success and failure (Frank in Guaggliia and Cobb, 1996), and by social pressures to aim high and do well. To measure the intention to do is a complex issue hence Hope's technique of measuring aspirations was claimed to lack objectivity and validity. Quaggliia and Cobb (1996) concluded that to measure a "true" aspiration level is not an easy task, if possible, due to the dynamic nature and vast complexities underlying human behaviour.

A different perspective by Appadurai (2004) classified aspirations according to socio-economic status (SES). He believed that students from low socio-economic status backgrounds have low aspirations due to unfair distribution of resources. He further articulated that people with a high desire to accumulate economic and academic capital will succeed in the work climate since they signalled high aspirations unlike groups that lack aspiration (Goot& Watson, 2007).

Looking at different literature by other writers on work stress, aspirations and core self-evaluation, a thorough study has been made on work stress by Hans Selye and many other writers (Schell, 1997). All the literature consulted agrees that stress

affects job performance, but the sources of stress that affect each workplace differ from organization to organization. In addition the relationship between stress and core self-evaluation has been noted hence eustress facilitates performance and boosts self-esteem (Maguire, 2012). To measure aspiration cannot be easy due to individual differences as well as the dynamic nature of the individuals themselves (Quaggia and Cobb, 1996).

### **3.4. Concluding remarks**

The foregoing chapter discussed the three variables used in this study, that is, core self-evaluations, stress and aspirations. In the literature consulted it emerged that there is a relationship between core self-evaluations and stress but it has never been proven between stress and aspirations. Chapter four will focus on the research design and methodological procedures.

## CHAPTER 4

### RESEARCH METHODOLOGY

#### 4.1. Introduction

The previous chapter reviewed the literature on the influence of the three variables against each other, that is, stress, core self-evaluations and aspirations. This chapter focuses on the research design and methodological procedure used in this research study. In this chapter, the following will be discussed: overview of the research methodologies; research approaches (qualitative and quantitative approaches); population of the study; sample, sampling methods and procedures; data collection, including the questionnaire and its administration; data analysis and ethical considerations.

#### 4.2. Overview of the research methodologies

When many people, including professionals, doubted if social science is really a science just like other sciences, like natural science, Neuman (2005) answered their questions by revealing that research methodology is what made social science to be scientific. To gather information in a study, one needs to select a suitable methodology and appropriate tools to collect and analyse data (Mouton, 2001). Although scientists used various methods of gathering data, basically there are two widely used approaches that can be used when collecting data, that is, the quantitative technique which is expressed in numbers and the qualitative technique expressed in words, pictures and objects (Neuman, 2005).

##### 4.2.1. *Qualitative approach*

Robinson (2011) views qualitative design as rather flexible and inductive and not fixed; nor does it follow a strict sequence influenced by an initial decision. This approach is firmly based on the interpretive social sciences paradigm which recognizes the importance of subjective, experiential 'life world' of human beings which reflects the phenomenology approach amongst the five approaches used in this technique (Babbie, 2003; Blanche & Durrheim, 2006; Strauss, 2012). It assists in providing the human side of an issue, that is, their behaviours, beliefs, opinions, emotions and relationships which usually conflict (Bernard, 1995).

Research that uses qualitative methodology usually focuses on data collection methods like:

- Participant observation, which is appropriate for collecting data on naturally occurring behaviours in their usual contexts;
- In-depth interviews which are optimal for collecting data on individuals' personal histories, perspectives, and experiences, particularly when sensitive topics are being explored;
- Focus groups which are effective in eliciting data on the cultural norms of a group and in generating broad overviews of issues of concern to the cultural groups or subgroups represented (Jennings, 2001; Denzin, 2000).

Qualitative research is subjective as it relies on text and discourses of the few participants it involves (Ramchander, 2004).

As qualitative reports are presented in words that are descriptions or explanations in a narrative form, objects and pictures, they are highly beneficial in gaining a rich and complex understanding of a specific social context or a phenomenon which typically takes precedence over eliciting data that can be generalized to other geographical areas or populations. This means that it can even reveal the qualities of group experience in a way that other forms of research cannot (Blanche & Durrheim, 1999). Since the researcher has to be with the sampled population for an extended period, time required formulating research settings, collection of data, analysis and interpretation is a challenge (Babbie, 1995). This type of research differs from scientific research in general since its findings cannot be extended to people with similar characteristics.

Because of the subjectivity of the qualitative data and its origin in single contexts, it is difficult to apply conventional standards of reliability and validity (Cresswell, 1994). Generalisations to a wider context cannot be made with any degree of confidence so individual conclusions do not meet the standards of scientific criteria. Neuman (2005) and Jennings (2001) argue that this does not make such understandings any less real or valid for the participant. The only difference is in the approaches used in data collection which are highly flexible, explorative, textual and even iterative (Weijer, Goldsand& Emmanuel, 1999).

### **4.2.2 Quantitative approach**

Aliaga and Gunderson (2000) describe quantitative research as the explanation of phenomena through the collection of numerical data which is analysed by using mathematically based methods, for example, statistics or numbers (Neuman, 2005). Positivism or realism underlies the quantitative approach. This paradigm adopts a deductive approach to the research process. The objective of this approach is to develop and employ mathematical models, theories or hypotheses related to a particular phenomenon gathers data from the real world settings and then analyses the data statistically to support or reject hypotheses (Anderson & Taylor, 2009; Welman & Kruger 2001). This means that data used in this approach is abstracted from the participants into statistical representations rather than textual pictures of the phenomenon.

The whole research process is objectively constructed using scientific methods and the following steps:

- Development of models, theories and hypotheses of the researchers' expectations.
- Effect choice or develop instruments that will be used to measure obtained data.
- Control and manipulation of variables.
- Data collection, then data analysis.
- Evaluation of results (Anderson & Taylor, 2009; Blanche & Durrheim 1999).

Results produced are quantifiable and reliable with less ambiguity as they can be generalized to a larger population (Welman & Kruger 2001). This method provides valid and understandable answers rather than person intuition, an opinion or a view.

Unfortunately, just like the qualitative approach, this approach has its own limitations. Massey (2003) argues that quantitative approach decontextualises and denigrates human behaviour and the ability to think. The event is removed from its real world setting and ignores the effects of variables that have not been included in the model. One cannot control all the variables due to the complexity of human experience. It lacks the depth and richness of data because of the number of participants involved

in the study. It focuses on confidence rather than absolute truth as it focuses on how much we can rely on the study (Burns, 2000). To quantify data can become an end in itself.

In addition researchers cannot have their own interpretation of experiences and act on their own meanings (Ramchander, 2004). As researchers, they have no freedom of their own interpretation; they have to assume that facts are true for all the people (Burns, 2000). Because of its restrictions, it produces trite and trivial findings with little consequence as there is less control of variables (Gilbert, 1993). This research design allows the researcher to answer questions about the relationships between measured variables to explain, predict and control certain phenomena. Blanche et.al, (2007) agreed that findings obtained from quantitative research are generalisable and the data is objective, hence it has been utilized in this study.

### **4.3. Population**

Population is a large pool of cases or elements from which the researcher draws his/her sample (Neuman, 2005). It entails the specification of the survey group to be studied. Neuman (2005) emphasizes the importance of specifying the unit being sampled, the geographic location of the population being sampled and the temporal boundaries of population.

The population of this study comprised education specialists in the Eastern Cape Province of South Africa. Since the population is too huge, it needed to be sampled, hence Creswell (1994) writes about the delimiters in the research which may narrow the scope of the study.

### **4.4. Sample and sampling method**

A specific list that approximates closely all the elements in the population is a sampling frame (Neuman, 2005). So a sample is a subset of the population drawn from the sampling frame (Shaughness & Zechmeister, 1997). The sample should be selected in a systematic way so that it can be representative of the population studied (Saunders, Lewis & Thornhill, 2003) and can only be perfect if it has parent population features. Bryman and Bell (2003) added the accuracy of reflection of the population so that inferences can be drawn.

Ellsberg and Heise (2005) listed types of sampling methods to include: intensity, deviant case, stratified purposeful, snowball or chain, maximum variation, convenience and criterion sampling. Knowledge of these methods assists in practical ways of choosing a sample and minimizes the chance of including an atypical group. Four districts of the twenty three districts of the Eastern Cape Province have been sampled for this study. These are Dutywa, Butterworth, Fort Beaufort & Cofimvaba District offices. The population size is 250 officers, i.e. senior education specialists (SEs) & deputy chief education specialists (DCEs).

#### **4.4.1. Sampling procedure**

Blanche, Durrheim and Painter (2006) define sampling procedure as a method used by the researcher when selecting cases to observe. The first thing is to determine the sample; this is followed by choosing an appropriate sampling technique to obtain a representative sample. This provides a reliable means of inferring information about a population without examining every member or element (Neuman, 1997). Sampling procedures are classified under two general categories, namely, probability and non-probability sampling.

##### 4.4.1.1 Probability sampling methods

Neuman (2005) defines probability sampling as a process that relies on random processes where each element has an equal opportunity of being selected. Probability sample is more accurate, hence rigorous controls that reduce non-sampling errors have been employed. These are the only types of samples where the results can be generalized from the sample to the population. Such samples allow the researcher to calculate the precision of the estimates obtained from the sample and specify the sampling error. Types of probability samples include simple random sampling, cluster sampling, stratified random sampling and systematic sampling (Shaughnessy & Zeichmeister, 1997; Wilburn, 2006).

Simple random sampling is the easiest random sample to understand and assists in modelling other types of sampling methods. In this sample, a sample frame is drawn so that every element has an equal chance of being selected in the sample. This means bias is reduced as the researcher can estimate sampling errors. Its limitation is that it is time consuming and cumbersome (Shaughnessy & Zeichmeister, 1997).

The cluster sampling method is similar to stratified sampling because the population to be sampled is subdivided into mutually exclusive groups or clusters which serve as primary sampling units. Then a sample is drawn from these clusters to select respondents (Willburn, 2006). Samples are drawn in three stages, that is, random sample from big clusters, random sample of small clusters within big clusters and, lastly, sampling of elements from small clusters sampled (Neuman, 2005). The advantage of this type of sampling is that it is less expensive, efficient and the results are mostly precise per unit cost (Wilburn, 2006).

When conducting stratified random sampling, a researcher divides the population into sub populations called the 'strata' based on two or more attributes (Saunders, Lewis and Thornhill, 2003). A random sample is drawn from each sub population. This means that the researcher controls the relative size of each stratum rather than letting random processes control it (Neuman, 2005). If the stratum information is accurate, stratified sampling produces samples that are more representative of the population.

Systematic sampling is a simple random sampling with a shortcut for random selection. It starts by assigning each population unit a number in ascending order (Breakwell, Hammond, Schaw & Smith, 2006). Then the researcher calculates a sampling interval which is the required ratio of the sample size of the total population ( $I = N/n$ ). If the researcher decides to sample every 20<sup>th</sup> member of the population, a 5% sample, the starting point for the sample is randomly selected from the first twenty members. Systematic sample is one of the cluster sample types because the first twenty members of the sample freely define a cluster that contains 5% of the population.

The above discussed type of sampling is advantageous in that (a) systematic samples are easier to draw and execute; (b) a certain sequence is followed since the researcher does not jump backward and forward through the sampling frame to draw members to be sampled; (c) there is an even spread of the members selected for measurement across the entire population and (d) this method allows the researcher to draw a probability sample without prior knowledge of the sampling frame. To avoid bias the researcher should not select an inappropriate sampling interval.

#### 4.4.1.2 Non Probability sampling

Non probability is a sampling procedure where the researcher cannot estimate the probability of each element's inclusion in the sample. This type of sampling is used when there is not enough time to research or in special situations. These include haphazard (also called accidental or convenience), quota, purposive and snowball sampling (Neuman, 2005).

Goodwin (2002) explained haphazard/convenience sampling as when the researcher requests volunteers from a group of people who meet the general requirements of the study. The researcher simply selects anyone who is convenient. Examples of convenience sampling include in the street interviews, class students or use of volunteers for advertisements or promotion. This type of sample is less costly and easy to use. However, its disadvantage is that not every person has a chance of being selected. Another disadvantage is that it lacks sampling accuracy and none of the reliability or sampling precision statistics can be calculated (Shaugnessy & Zeichmeister, 1997).

Within non-probability sampling, one can even use purposive or judgmental sampling which is for special situations (Neuman, 2005). In this sample type, the researcher uses his or her own expert judgment on whom to include in the sample frame. To select respondents or elements the researcher uses prior knowledge and research skills. This involves obtaining a sample with a population that has certain characteristics, experience and understanding (MacGarty, 2003). Its limitation is that the results of this sample cannot be generalized to a larger population because of the geographical area from which the samples have been drawn.

Another example of a non-probability method is snowball sampling which is also called referral or reputational sampling. This sample type is about selecting people or organizations that are connected to one another. This method is used to identify and sample or select cases in a network. Such networks can be scientists around the world investigating the same problem or the members of an organized crime unit or executives of corporations. The sample is constructed by addition of wave after wave of respondents like a snowball which begins small but becomes larger as it rolls wet snow and picks up additional snow. This means it begins with few people or cases and spreads as they link with more people (Neuman, 2005).

The last example of non-probability sampling is called quota sampling which is based on selecting anyone in predetermined groups. According to Neuman (2005), quota sampling is an improvement over convenience sampling although itself is regarded as a weak type of sampling. This sample is constructed by identifying categories of people (females, males, aged between 20 and 40 or under 30s) then fix the number of people to involve in each category. It is an improvement of convenience sampling hence in this sampling all the interviewed people can be of the same age whereas in quota sampling some population differences are in the quota. This sampling is easier, cheaper and quicker than probability sampling. One of its limitations is that quota categories do not accurately represent all geographical areas (Neuman, 2005).

In this study, simple random sampling has been used where four districts have been sampled out of 23 districts. In each district, all SESs and DCESs (professional sections) are engaged in the study since these are the people who deal directly with schools, who understand their problems. These have been visited and all these officers have been requested to complete the instruments. Samples used are representative of the population studied since the respondents have been randomly selected from the districts which all have an equal chance of being included in the study.

#### **4.5. Research instrument**

Questionnaires have been used to collect data. A questionnaire is an instrument with open and closed ended questions or statements to which the respondents will react (De Vos & Fouche, 1998). These have been used as they are advantageous in translating research objectives into specific questions and standardizing questions and response categories.

Three questionnaires to test the three variables used in this study have been used and one short questionnaire assisted the researcher with the background information. These were divided into four sections, namely section A, B, C and D. A shortened version of the Effort Reward Imbalance questionnaire (ERI) which consists of 16 items has been used to test stress at the workplace. This has been widely used and has constantly produced reliable and valid results. Its Cronbach's alpha is 0.89 for the whole questionnaire. Participants were requested to rate

themselves on the extent to which they agree with the given statements on a five-point Likert scale ranging from does not apply (1) to applies and distresses me very much (5).

Also, the achievement goal questionnaire by Elliot and Murayama (2008) has been used to test aspirations of officers. The questionnaire explicitly indicates the need for performance among the respondents. All the researchers who used aspiration among their variables have used this tool to test aspirations of their study group, for instance, Rich & Delgado (2010) and Litzky (2002). The Cronbach's alpha for this instrument is 0.82. In this questionnaire, the same five point Likert scale rating has been used where (1) stands for strongly disagree to (5) that stands for strongly agree.

For CSE, the core self-evaluations scale by Judge, Erez, Bono, and Thoresen, (2003) has been used. This has been used by many researchers and reaches a Cronbach's alpha of 0.89.

The whole questionnaire will have the following sequence, Section A: Biographical information, Section B: ERI stress questionnaire, Section C: Core self-evaluation scale and Section D: Achievement Goal Questionnaire. These are short questionnaires since the longest, which is the ERI, is composed of 16 questions and all variables were to be tested.

#### ***4.5.1. Administering the questionnaire***

Sekaran and Bougie (2009) define a questionnaire as pre-formulated set of questions where respondents write their answers within closely defined objectives. After the questionnaire has been designed, pilot tested and changes or amendments made and adopted, the questionnaire can be used to collect data.

There are many ways of administering the questionnaire that is, postal or mailed questionnaires, online or electronic questionnaires and self or personally administering the questionnaire (Saunders, et. al., 2003).

The researcher decided to use the latter, that is, self-administered questionnaires due to the following reasons:

- Features of the respondents (hence SESs in corporate services do not deal directly with teachers).
- Importance of reaching a particular person (the different districts in the case of this study).
- Sample size required for analysis.
- The nature of the tool.

The researcher arranged meetings with the heads of the sampled personnel to discuss the administration of the questionnaire in each district. During these meetings the researcher secured a slot at the end of the year meetings which are held in each district. This slot was used to deliberate about the questionnaire, how to fill it in and how it will be collected, ensuring them of the anonymity and confidentiality of the information. Lunch time was also used to distribute the questionnaires to all those absent from the meetings. A total number of 250 questionnaires was photocopied and distributed on the different days when the meetings were held. An allowance of two weeks was given in each district for collection.

Heads of the sections agreed to be collection points where each respondent had to submit the questionnaires, after the respondent had recorded his or her responses. A follow up was done through the use of the telephone to remind the heads of sections when the researcher would visit the district for collection which was almost three to four times in various districts.

The researcher used this method successfully and it was advantageous to the researcher due to the following reasons:

- It assisted the researcher to manage time, hence many respondents attended the meetings.
- It was less expensive as the dates for visiting the districts were negotiated beforehand.
- Anonymity was ensured since the questionnaires were collected from a collection point by the researcher.
- Out of 250 questionnaires, 157 were returned fully completed which is more than 60%.

#### **4.6. Data Analysis**

Quantitative techniques of data analysis were used in this study. Aliaga and Gunderson (2000) describe quantitative research as the explanation of phenomena through collection of numerical data which is analysed by using mathematically based methods, for example, statistics or numbers (Neuman, 2005). All data obtained from the respondents was analyzed using descriptive and inferential statistical analysis. To report demographic data, aspirations and achievements, frequencies and percentages were used. Data was presented in the form of tables and graphs. SAS version 9.1 programme was used to analyse data. In addition, to analyse the relationship between CSE, stress and work aspirations, the Pearson correlation analysis was used. At the same time, standard Duncan's multiple range test analysis was used to assess the contribution of stress to CSE and work aspirations.

#### **4.7. Ethical considerations**

Sekaran and Bougie (2009) define ethics as a code of conduct or an accepted and expected societal code of behaviour one adheres to while conducting research. It applies to everyone involved in the research, that is, the researcher, organisation and the members that sponsor the research and the respondents.

While conducting the research, the researcher took note of the following ethical considerations:

- Respect for people - autonomy of individuals participating in the research was safeguarded. Free recording of instruments was afforded without interference.
- Beneficiaries – no people were exposed to risk while the study was conducted.
- Justice - Equal treatment of all the participants was ensured.
- Informed consent - before individuals became the subject of research, they were notified as to what the study was all about and its intentions, that is, during the meetings.

- Confidentiality - during the process the researcher protected the dignity and privacy of every individual involved in the study. Identity of individuals from whom information was obtained in the course of the research was kept strictly confidential.
- Voluntary participation - no pressure or inducement of any kind was applied to encourage an individual to become a subject of research.
- Deception – participants were not given erroneous information or other information withheld in an attempt to deceive them.

#### **4.6. Concluding remarks**

In chapter four the focus was on the research design and methodological procedures used in this research study. These included an overview of the research methodologies, research approaches (qualitative and quantitative approaches), population of the study, sample, sampling methods and procedures, data collection including the questionnaire and its administration, data analysis and ethical considerations. The following chapter will present the research findings.

## CHAPTER 5

### PRESENTATION OF THE RESULTS

#### 5.1. Introduction

The previous chapter gave a brief discussion of the approach followed by the researcher to conduct this study. This approach assisted the researcher in the procedures that ultimately helped the researcher to answer the research questions.

In this chapter the results are presented based on the empirical analysis of the data collected from various respondents. All the statistical procedures were done using SAS version 9.1 and all tests were done at 5% significance level. The presentation starts by showing the results of internal consistency among the variables, and then proceeds to the analysis of the given demographic variables of the study, the analysis of the means and the inferential statistics (where correlations between demographics and study variables are tested together with the testing of the hypothesis).

#### 5.2 Internal consistency

Below are the results for the internal consistency of the data collection instrument. Cronbach's alpha coefficient was used to test for the reliability of the research instrument. The results are listed as follows:

##### 5.2.1 Questionnaire for workplace stress

Cronbach's Coefficient Alpha	
Variables	Alpha
Raw	0.891382
Standardized	0.895785

The Cronbach's coefficient alpha for the question measuring workplace stress is 0.89. Hence the questions were reliable to measure workplace stress.

### **5.2.2 Achievement Goal questionnaire revised (AGQ-R)**

<b>Cronbach's Coefficient Alpha</b>	
<b>Variables</b>	<b>Alpha</b>
Raw	0.840719
Standardized	0.844265

The Cronbach's coefficient alpha for the question measuring achievement goal is 0.84. Hence it shows high reliability in measuring achievement goal.

### **5.2.3 Core self-evaluation scale**

<b>Cronbach's Coefficient Alpha</b>	
<b>Variables</b>	<b>Alpha</b>
Raw	0.717498
Standardized	0.719861

The Cronbach's coefficient alpha is 0.71 which shows that the reliability of the questionnaire can be accepted.

The following table summarizes the above results for the data collection instruments.

Table 1: Internal consistency

MEASURES	N	ITEMS USED	CRONBACH'S COEFFICIENT ALPHA	
			ALPHA	ALPHA
			(RAW (STANDARDIZED VARIABLES)	VARIABLES)
<b>WORKPLACE STRESS</b>	102	15	0.891382	0.895785
<b>ACHIEVEMENT GOAL</b>	100	11	0.840719	0.844265
<b>SELF EVALUATION</b>	117	12	0.717498	0.719861

Items marked with (\*) are significantly reliable/acceptable

Reliability analyses revealed a Cronbach's alpha exceeding 0.6 for workplace stress (0.891382), core self-evaluation (0.717498) and achievement goal (0.840719), indicating highly acceptable internal consistency for all the three measures.

### 5.3. Demographic information

Below is table 2, summarizing the demographic characteristics of the study. A chi-square test for equal proportions was used to test for differences in frequency distribution within each demographic variable.

Table 2: Biographical data – frequencies, percentages and chi-Square test for equal proportions

VARIABLE	LEVELS	D f	f	%	Chi-square	p-value
<b>GENDER</b>	MALE	1	47	36.43	9.4961	0.0021**
	FEMALE		82	63.57		
<b>AGE</b>	25 - 34 YEARS	2	0	0.00	8.0000	0.0183**
	35 - 44 YEARS		31	24.03		
	45 - 54 YEARS		57	44.19		
	55+ YEARS		41	31.78		

<b>EXPERIENCE</b>	LESS THAN 1 YEAR	1	3	10	7.75	41.8837	<.0001**
	1 – 5 YEARS			19	14.73		
	6 – 10 YEARS			55	42.64		
	MORE THAN 10 YEARS			45	34.88		
<b>QUALIFICATION</b>	CERTIFICATE	5	2	1.55	163.8837	<.0001**	
	DIPLOMA			13	10.08		
	BACHELORS DEGREE			31	24.03		
	HONOURS DEGREE			71	55.04		
	MASTERS DEGREE			11	8.53		
	DOCTORATE			1	0.78		
<b>POSITION</b>	DCES	1	48	37.50	8.0000	0.0047**	
	SES		80	62.50			
<b>TITLE</b>	DCES (IDS&G)	5	12	9.38	122.2188	<.0001**	
	DCES (CURR)		38	29.69			
	DCES (ESSS)		1	0.78			
	SES (IDS&G)		10	7.81			
	SES (CURR)		60	46.88			
	SES (ESSS)		7	5.47			

Variables with a significant difference in proportions are marked with \*\*

### 5.3.1. Gender

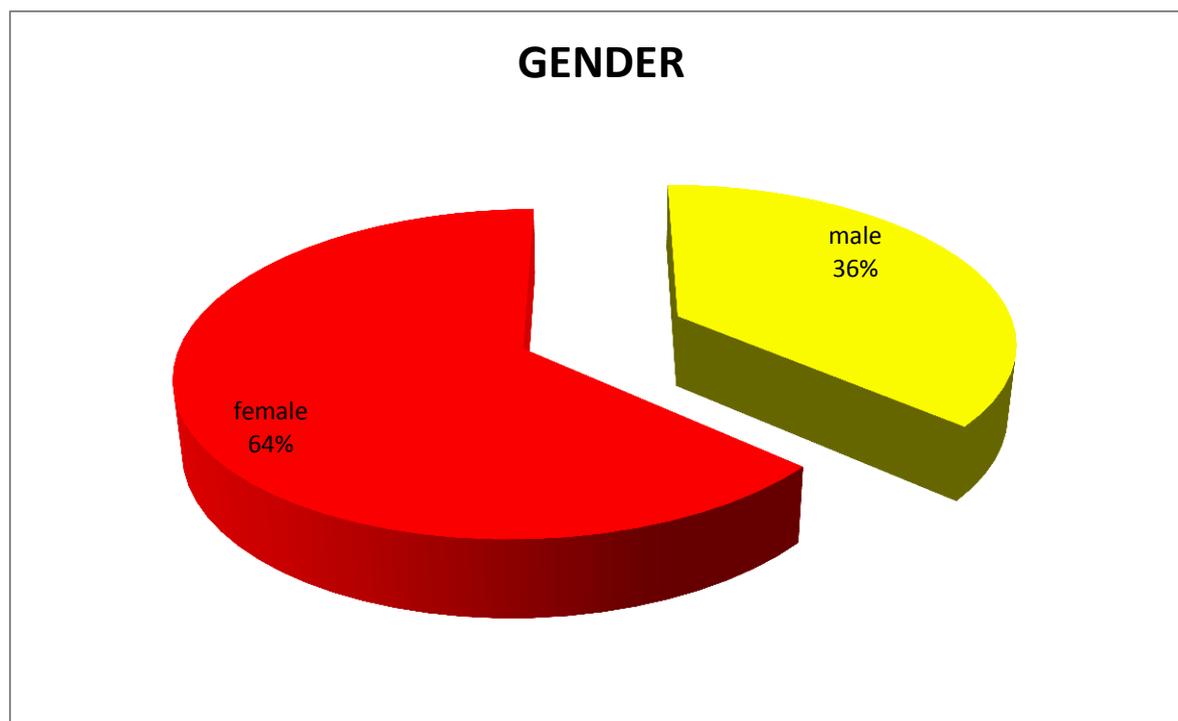


Figure 5.1: Distribution of respondents by gender

Figure 5.1 above presents the gender distribution of the sample. The sample was representative of a larger number of female respondents to that of male respondents. Female respondents comprised of 64% (n = 82) compared to 36% (n = 47) male respondents. From table 2, the chi-square tests shows a significant difference between the male and female proportions in the study sample (p=0.0021).

### 5.3.2 Age

The graphic presentation of the age distribution of the sample is presented in figure 5.2. The majority of the respondents (n = 57 or 44.19%) fall in the age category of 45-54 years. This is followed by 41 (31.78%) of the respondents in the age category of 55+ years. The age category 35-44 years old constitutes 24.3% (n = 31) of the sample. Table 2 shows that the chi-square tests reveal a significant difference between the various categories of age groups in the study sample (p=0.0183).

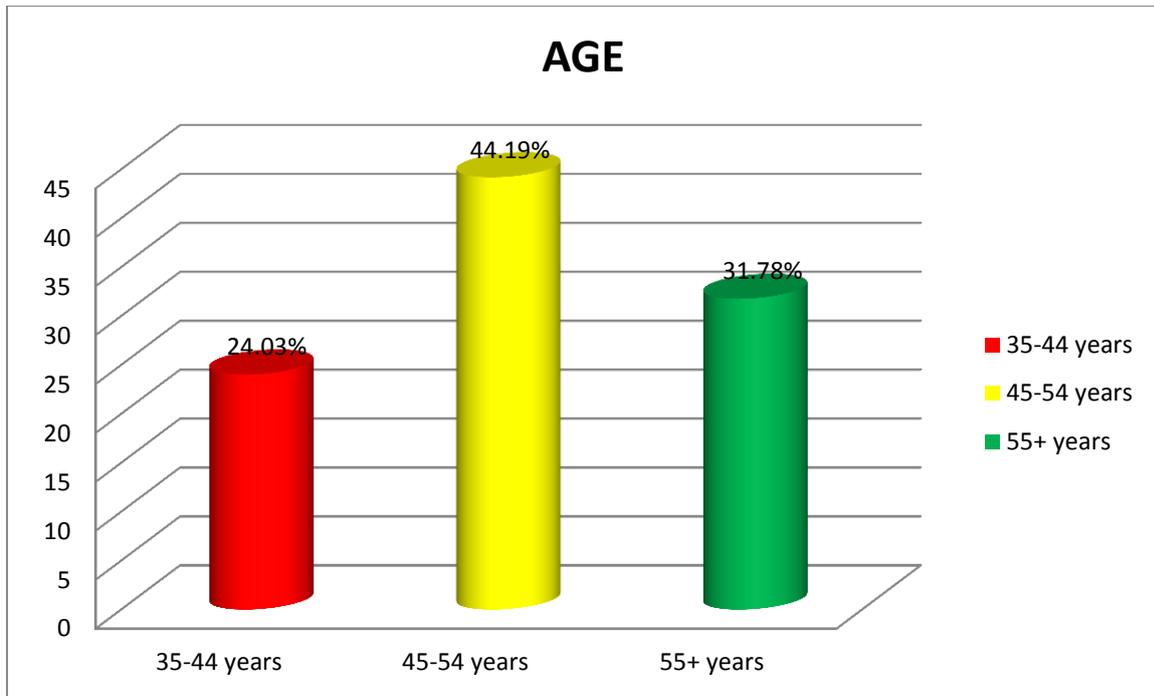


Figure 5.2: Distribution of respondents by age

### 5.3.3 Experience in the current position

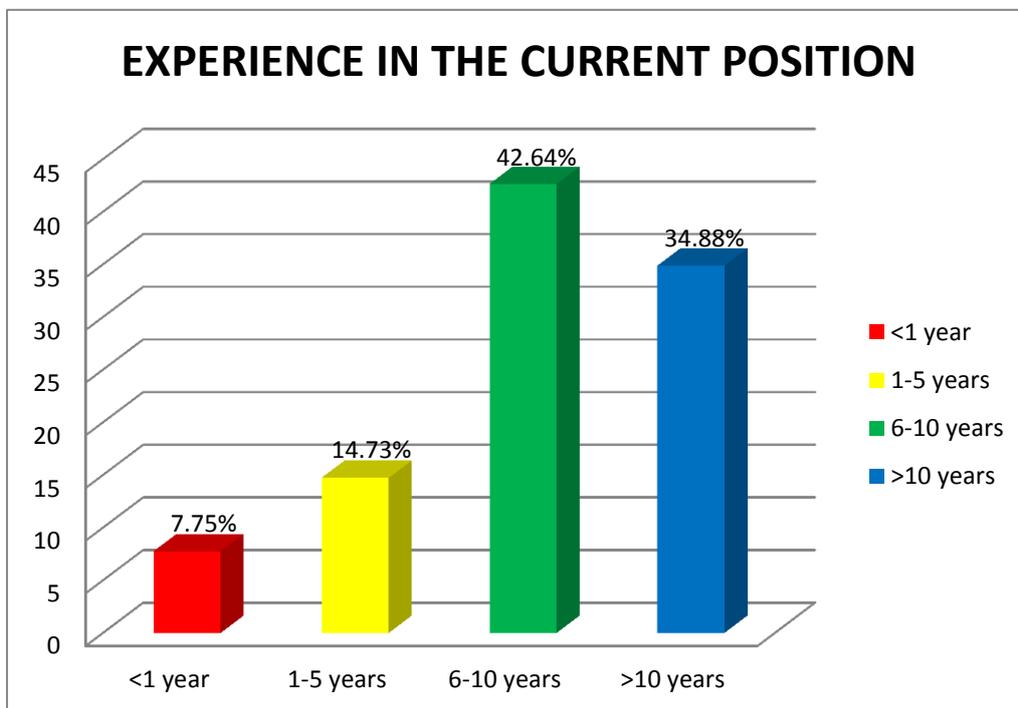


Figure 5.3: Distribution of respondents by experience in current position

It can be viewed in figure 5.3 that the majority of the respondents (n = 55 or 42.64%) had 6-10 years' work experience and forty-five respondents (34.88%) fall in the more than 10 years category. Nineteen respondents (14.73%) fall in the 1-5 years of experience category while 10 respondents (7.75%) fall in the less than 1 year work experience. From table 2, the chi-square tests show a significant difference between the various groups ( $p < .0001$ ).

### 5.3.4. Qualifications

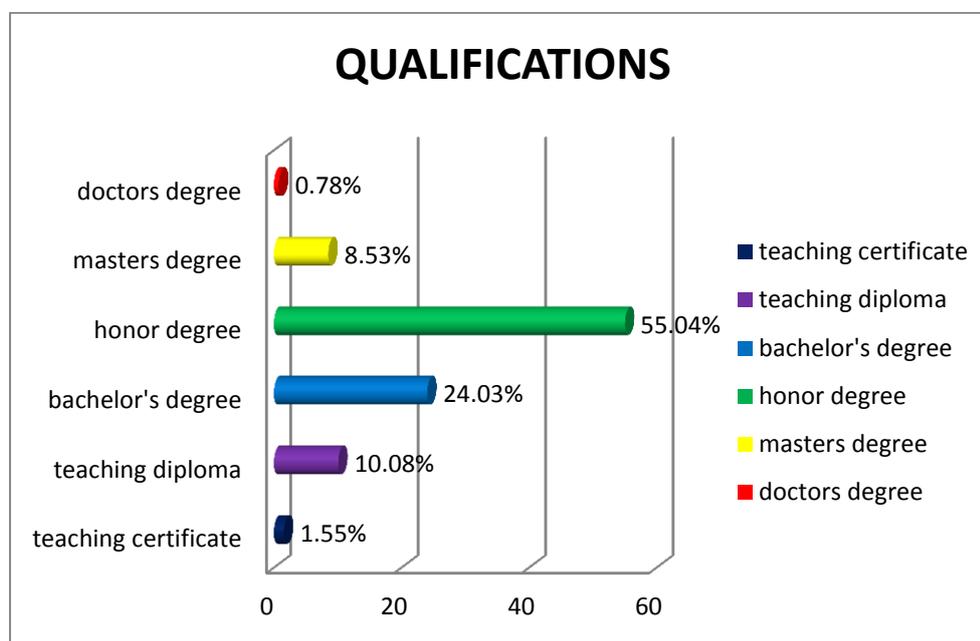


Figure 5.4: Distribution of respondents by qualifications

Figure 5.4 illustrates the education level of the sample. The graph depicts that the majority of the respondents, 55.04% (n=71) have an honour's degree, whilst 24.03% (n=31) possess a bachelor's degree. Thirteen respondents (10.08%) have a teaching diploma, eleven respondents (8.53%) have a master's degree, and two respondents (1.55%) have a teaching certificate while one respondent (0.78%) has a doctorate degree. From table 2, the chi-square tests show a significant difference between various categories of educational qualifications ( $p < .0001$ ).

### 5.3.5. Current position

Figure 4.5 shows the current position of the respondents. The majority of the respondents (63%, n=80) hold the position of Deputy Chief Educational Specialist while 37% (n=48) had the position of Senior Education Specialist.

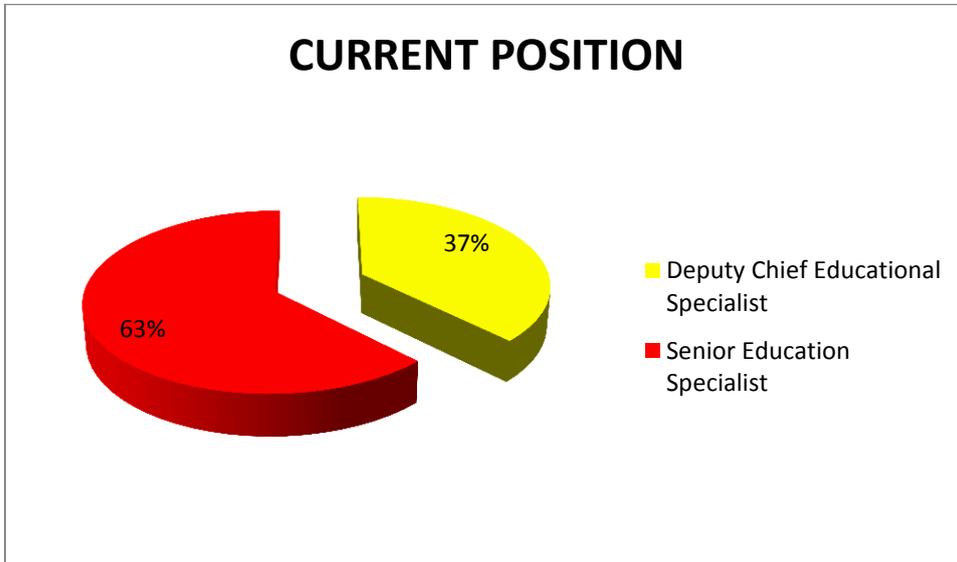


Figure 5.5: Distribution of respondents by current positions

### 5.3.6 Job Titles

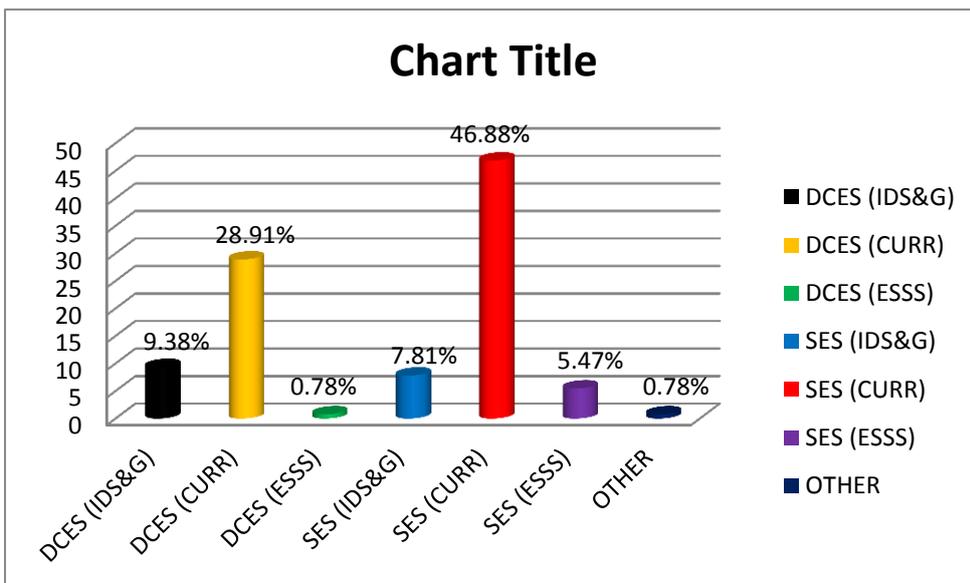


Figure 5.6: Distribution of respondents by job titles

Figure 5.6 shows the job titles held by respondents. The job titles of the sample comprises 46.88% (n=60) SES (CURR), 28.19% (n=37) of the respondents were DCES (CURR), 9.38% (n=12) DCES (IDS&G), 7.81% (n=10) SES (IDS&G), 5.47% (n=7) SES (ESSS). One respondent (0.78%) was a DCES (ESSS) and another one respondent (0.78%) had another job title. The chi-square tests show that there is a significant difference between the various groups ( $p < .0001$ ).

#### 5.4. Analysis of means

A Duncan's Multiple Range Test was used for the comparisons of means for the different demographic features with the three measures, that is, workplace stress, goal achievement, and self-evaluation. Table 3 below shows the summary of the tests. For the actual mean values refer to table 4.

Table 3: Duncan's multiple range test for comparisons of means for the different demographic features with the three measures

VARIABLE	COMPARISON BY	DF	MSE	F-VALUE	Pr>F
AGE	WORKPLACE STRESS	2	0.10395735	0.23	0.7978
	ACHIEVEMENT GOAL	2	0.74755170	2.64	0.0766
	SELF EVALUATION	2	0.08232193	0.55	0.5803
EXPERIENCE	WORKPLACE STRESS	3	0.14178344	0.31	0.8202
	ACHIEVEMENT GOAL	3	0.58377704	2.06	0.1108
	SELF EVALUATION	3	0.09849941	0.65	0.5824
QUALIFICATION	WORKPLACE STRESS	3	0.64493375	1.45	0.2341
	ACHIEVEMENT GOAL	3	0.25290926	0.86	0.4648
	SELF EVALUATION	3	0.40173743	2.82	0.0422 *
TITLE	WORKPLACE STRESS	4	0.87058652	2.01	0.0993
	ACHIEVEMENT GOAL	4	0.68420114	2.47	0.0505
	SELF EVALUATION	4	0.05813175	0.38	0.8220
Significantly different means are marked with *					

Most of the variables, i.e. age, experience and title show that there was no significant difference in any of the means for the three measures. This means that these variables have no impact in differentiating the mean levels on workplace stress, goal achievement and self-evaluation. However, there was a fairly significant difference within the means of self-evaluation on the educational qualification variable. The Duncan Waller groupings showed that there is no significant difference within the various levels. In table 4, all the mean levels ranged between 2.25 to 3.13 for workplace stress, 3.72 to 4.54 for goal achievement and 3.28 to 3.50 on a 5-point Likert scale. These results show that there were moderate levels of workplace stress, extremely high levels of goal achievement and moderately high levels of self-evaluation within all categories of the various demographics within the respondents.

Table 4: Descriptive statistics for workplace stress, goal achievement and self-evaluation

VARIABLE	LEVELS	WORKPLACE STRESS			ACHIEVEMENT GOAL			SELF EVALUATIONS		
		N	M	SD	N	M	SD	N	M	SD
<b>GENDER</b>	MALE	38	2.48	0.61	38	4.20	0.48	44	3.38	0.41
	FEMALE	62	2.77	0.68	60	4.18	0.61	72	3.35	0.37
<b>AGE</b>	35 - 44 YEARS	26	2.73	0.64	23	4.01	0.58	28	3.43	0.33
	<i>45-54 YEARS</i>	44	2.64	0.63	44	4.29	0.57	49	3.32	0.43
	55+ YEARS	30	2.64	0.75	31	4.18	0.51	39	3.37	0.36
<b>EXPERIENCE</b>	LESS THAN 1 YEAR	9	2.83	0.63	8	4.18	0.39	10	3.23	0.24
	1 – 5 YEARS	12	2.73	0.47	12	3.94	0.41	16	3.33	0.26
	6 – 10 YEARS	43	2.60	0.68	43	4.30	0.63	50	3.35	0.39
	MORE THAN 10 YEARS	36	2.67	0.72	35	4.14	0.54	40	3.42	0.44
<b>QUALIFICATION</b>	CERTIFICATE	1	3.13	-	2	4.04	0.19	2	3.45	0.29
	DIPLOMA	9	2.41	0.77	10	4.31	0.55	13	3.50	0.30

	BACHELORS DEGREE	25	2.78	0.82	22	4.13	0.63	30	3.50	0.48
	HONOURS DEGREE	56	2.71	0.58	54	4.26	0.48	61	3.29	0.32
	MASTERS DEGREE	8	2.31	0.50	9	4.00	0.65	9	3.28	0.40
	DOCTORATE	1	1.93	-	1	2.45	-	1	2.66	-
<b>POSITION</b>	DCES	34	2.69	0.66	34	4.23	0.59	45	3.36	0.39
	SES	66	2.65	0.67	64	4.16	0.54	71	3.37	0.38
<b>TITLE</b>	DCES (IDS&G)	9	2.37	0.60	9	4.49	0.52	12	3.49	0.58
	DCES (CURR)	26	2.91	0.67	26	4.09	0.61	35	3.34	0.34
	DCES (ESSS)	1	1.93	-	1	4.54	-	1	3.33	-
	SES (IDS&G)	8	2.50	0.70	7	4.05	0.50	9	3.39	0.25
	SES (CURR)	52	2.66	0.64	48	4.27	0.45	53	3.34	0.39
	SES (ESSS)	4	2.25	0.68	7	3.72	0.91	6	3.41	0.32

Males had higher levels of workplace stress (mean=2.48; SD=0.61), goal achievement (mean = 4.20; SD=0.48), and self-evaluation (mean = 3.38; SD = 0.41) as compared to females. The age group of 35-44 had higher level of workplace stress (mean = 2.73; SD =0.64) and self-evaluation (mean = 3.43; SD= 0.33) than the other age groups. However, the age group 45-54 had a higher level of goal achievement as compared to the other age groups. Those with less than one year experience on the job had high levels of workplace stress (mean = 2.83; SD=0.3).

## 5.5. Inferential statistics

### 5.5.1 Correlations between demographics and study variables

Table 5: Correlations between demographics and study variables

<b>Pearson Correlation Coefficients</b>			
<b>Prob &gt;  r  under H0: Rho=0</b>			
<b>Number of Observations</b>			
	<b>WORKPLACE STRESS</b>	<b>GOAL ACHIEVEMENT</b>	<b>SELF- EVALUATION</b>
<b>GENDER</b>	0.18847 0.0578 102	-0.01908 0.8505 100	-0.03851 0.6801 117
<b>AGE</b>	-0.05046 0.6145 102	0.09127 0.3665 100	-0.04495 0.6304 117
<b>EXPERIENCE</b>	-0.07151 0.4751 102	0.02541 0.8019 100	0.13043 0.1610 117
<b>QUALIFICATIONS</b>	-0.09168 0.3594 102	-0.10319 0.3070 100	-0.25934 0.0047 117
<b>POSITION</b>	-0.00928 0.9267 101	-0.06636 0.5140 99	0.01002 0.9150 116
<b>TITLE</b>	-0.01397 0.8897 101	-0.06428 0.5273 99	0.00893 0.9239 117

Table 5 shows the correlation of self-evaluation, workplace stress and goal achievement on demographic variables. In terms of gender, age, experience, position and job title there was no correlation with workplace stress, goal achievement and self-evaluation. Education qualifications had no relationship with workplace stress and goal achievement. However, education qualifications had a negative correlation with self-evaluation ( $r=-0.25934$ ;  $p=0.0047$ ).

### 5.5.2. Hypothesis testing

Table 6: Pearson correlation on workplace stress, goal achievement and self-evaluation

DIMENSION	WORKPLACE STRESS	ACHIEVEMENT GOAL	SELF-EVALUATION
<b>1. WORKPLACE STRESS</b>	-	r=0.11457	r=0.32409
		(0.2935)	(0.0014*)
<b>2. ACHIEVEMENT GOAL</b>		-	r=0.19108
			(0.0636)
<b>3. SELF-EVALUATION</b>			-
Items marked with (*) are significantly correlated			

#### Hypothesis 1

H<sub>0</sub>: There is no relationship between core self-evaluations and DoE officers' work aspirations.

H<sub>1</sub>: There is a relationship between core self-evaluations and DoE officers' work aspirations.

From Table 6 it shows that there is no relationship between core self-evaluations and DoE officers' work aspirations (r=0.19108; p=0.0636). Hence we reject the alternative hypothesis in favour of the null hypothesis and conclude that there is no relationship between core self-evaluations and DoE officers' work aspirations.

#### Hypothesis 2

H<sub>0</sub>: There is no relationship between core self-evaluations (CSE) and DoE stress levels.

H<sub>2</sub>: There is a relationship between core self-evaluations and DoE stress levels.

Table 6 shows that there is a positive relationship between core self-evaluations (CSE) and DoE stress levels (r=0.32409; p=0.0014). So we reject the null hypothesis

in favour of the alternative hypothesis and conclude that there is a relationship between core self-evaluations and DoE stress levels.

### Hypothesis 3

H<sub>0</sub>: There is no relationship between stress and work aspirations of DoE officers.

H<sub>3</sub>: There is a relationship between stress and work aspirations of DoE officers.

From Table 6 it shows that there is no relationship between stress and work aspirations of DoE officers. ( $r=0.11457$ ;  $p=0.2935$ ). Hence we reject the alternative hypothesis in favour of the null hypothesis and conclude that there is no relationship between stress and work aspirations of DoE officers.

### Hypothesis 4

H<sub>0</sub> – Stress does not moderate the relationship between CSE and work aspirations.

H<sub>4</sub> – Stress moderates the relationship between CSE and work aspirations.

CSE was modelled as explanatory variable on work aspirations using the Generalized Linear Model (GLM). The resulting F-value ( $F=3.52$ ;  $Pr>F=0.0536$ ) shows that the model is not statistically significant. Only 3.7% of the variation in work aspirations is being explained by the model. The parameter estimates output showed that SE has no significant effect on work aspirations ( $Pr>F=0.0636$ ). The output is presented below.

Source	DF	Sum of Squares	Mean Square	F Value	Pr > F
Model	1	1.09785878	1.09785878	3.52	0.0636
Error	93	28.96947485	0.31149973		
Corrected Total	94	30.06733362			

R-Square	CoeffVar	Root MSE	GOAL_ACHIEVEMENT Mean
0.036513	13.25840	0.558122	4.209569

Parameter	Estimate	Standard Error	t Value	Pr >  t
Intercept	3.291073019	0.49259206	6.68	<.0001
SELF_EVALUATION	0.272465743	0.14513344	1.88	0.0636

To determine if stress moderates the relationship between CSE and work aspirations, CSE and stress were modelled as explanatory variables on work aspirations using the Generalized Linear Model (GLM). The resulting F-value ( $F=0.94$ ;  $Pr>F=0.3953$ ) shows that the model was not significant. Only 2.4% of the variation in work aspirations is being explained by the model. The parameter estimates output showed that CSE ( $Pr>F=0.8165$ ) and the moderated effect of stress ( $Pr>F=0.3809$ ) have no significant effect on work aspirations. The output is presented below.

Source	DF	Sum of Squares	Mean Square	F Value	Pr > F
Model	2	0.59307913	0.29653957	0.94	0.3953
Error	78	24.62720451	0.31573339		
Corrected Total	80	25.22028364			

<b>R-Square</b>	<b>Co-eff Var</b>	<b>Root MSE</b>	<b>GOAL_ACHIEVEMENT Mean</b>
0.023516	13.34367	0.561902	4.210999

<b>Parameter</b>	<b>Estimate</b>	<b>Standard Error</b>	<b>t Value</b>	<b>Pr &gt;  t </b>
<b>Intercept</b>	3.822022664	0.58025915	6.59	<.0001
<b>SELF_EVALUATION</b>	0.049040739	0.21060203	0.23	0.8165
<b>SELF_EVAL*WORKPLACE_</b>	0.024960515	0.02832408	0.88	0.3809

Since the model and parameter estimate of the moderated effect of stress are not statistically significant and also there was no significant increase in the variance explained by the model with the moderated effect of stress, we do not reject the null hypothesis and conclude that stress does not moderate the relationship between CSE and work aspirations.

## **5.6. Concluding remarks**

In this chapter presentation of the results was done starting with the checking of the internal consistency of the instrument used. The results showed that the instrument was highly reliable on two variables, that is, stress and aspirations, but had a moderately acceptable degree of reliability on the third variable which is core self-evaluation. Summary of the demographic variables' characteristics was presented using chi-square tests. Also the results showed comparison of means for demographic features and the three variables, that is, stress, aspirations and self-evaluations, were presented. The next chapter will discuss the results presented.

## CHAPTER 6

### DISCUSSIONS, CONCLUSIONS AND RECOMMENDATIONS

#### 6.1 Introduction

The previous chapter presented the results of the research study starting by rechecking the internal consistency of the data collection instruments. In this chapter the results are discussed and conclusions drawn regarding the hypotheses tested in the study. A brief presentation will also be done on the limitations and recommendations of this study.

#### 6.2. Discussion and conclusions

To ensure reliability of the results, the three instruments that were used to measure the three variables, work stress, work aspirations and core self-evaluations were retested. The results for the three variables revealed a Cronbachs' alpha exceeding 0.6 which indicated highly acceptable internal consistency.

To analyse demographic characteristics of the study, a chi-square test for equal proportions was used to test for frequency in the distribution of the demographic variables used in the study. These include gender, age, experience, qualifications, position and title which yielded differing results. Although these demographic variables have not been hypothesized, some influence the results of the variables tested in this study. For instance, Anderson and Anderson (1999) concluded that males tend to be more performance oriented than females (Roeser, Midle & Midleton, 1996). This means that most males favour performance goals or ego or self-enhancing goals which assist males to outperform their counterparts (Skaalvik, 1997). A conclusion can be drawn that the fewer number of males against the larger number of females in this study has an influence on aspirations or goal achievement testing.

In addition, when Duncan's multiple range test was used to test comparisons of means for the demographic features of workplace stress, goal achievement and core self-evaluations, the results showed that most variables have no significant difference of the means for the three measures except for core self-evaluations and educational qualification which have a negative correlation ( $r=0.25934$ ;  $p=0.2935$ ).

In summary the respondents results showed that there were moderate levels of workplace stress, high levels of goal achievement and moderate levels of core self-evaluations as the mean levels ranged between 2.25 to 3.13 for workplace stress, 3.72 to 4.54 for goal achievement and 3.28 to 3.50 for self-evaluation.

However, it will be recalled that the purpose of this study was to investigate the relationship among the three variables - work stress, work aspirations and core self-evaluations - and how each variable affects the others. It was hypothesized that there is a relationship among the three variables that leads to underperformance of both the Deputy Chief Education specialists and the Senior education specialists within the Department of Education. Hypotheses one to four, including their results, are discussed as follows:

### **Hypothesis 1**

H<sub>0</sub>: There is no relationship between core self-evaluations and DoE officers' work aspirations.

H<sub>1</sub>: There is a relationship between core self-evaluations and DoE officers' work aspirations.

Results from Table 6 (Pearson correlation) show that there is no relationship between core self-evaluations and Department of Education officers' work aspirations ( $r=0.19108$ ;  $p=0.0636$ ). This means that the alternative hypothesis is rejected in favour of the null hypothesis and concludes that there is no relationship between core self-evaluations and Department of Education officers' work aspirations. In a research conducted by Judge & Kammeyer-Mueller (1998), results showed a relationship between one characteristic which signifies core self-evaluation (self-regard) and aspiration (in form of goals). It was concluded that people with positive self-regard embrace more self-regulated activities that lead to goal achievement than people with low positive self-regard. This means if Department of Education officers have negative self-regard they will not be engaging in self-regulatory exercises hence no correlation between the two variables.

## Hypothesis 2

H<sub>0</sub>: There is no relationship between core self-evaluations (CSE) and DoE stress levels.

H<sub>2</sub>: There is a relationship between core self-evaluations and DoE stress levels.

The results of the current research as shown in Table 6 clearly indicate that there is a positive relationship between core self-evaluations (CSE) and DoE stress levels ( $r=0.32409$ ;  $p=0.0014$ ). Hence we reject the null hypothesis in favour of the alternative hypothesis and conclude that there is a relationship between core self-evaluations and DoE stress levels.

Brunborg (2008) in his research which examined core self-evaluation as a predictor of job stress commented that individuals with high core self-evaluations cope well with stressful situations because they can alter the stressful situations that affect them. However, individuals with low core self-evaluations negatively appraise themselves and are not confident of their abilities so they perceive higher job stress than individuals with high core self-evaluations (Judge, Erez, Bono & Thoresen, 2002). This means that DoE officers positively appraise themselves in some of the tasks and are confident when delivering whereas they show no confidence in delivering some tasks hence moderate stress has been found by the results summary.

Judge (2009), after investigating core self-evaluations and work success, added stress levels amongst his hypotheses. He concluded that individuals with high core self-evaluations perform more effectively and efficiently on their jobs, became more satisfied and successful in their careers. Such satisfaction with their jobs leads to reports of lower levels of stress and conflict. The vice versa is that if individuals have low core self-evaluations, stress will be high. If unattended, negative core self-evaluations lead to burnout (Best, Stapleton & Downey, 2005) which is not only an excessive stress but a complex reaction to stress.

Michael, Carrie and John (2013) investigated dispositional factors connected to work stress. The results of the study supported the hypothesis that core self-evaluation is negatively related to work stress and that performance goal orientation partially mediates such a relationship. Lastly, the study conducted by Avey,

Reichard, Luthans & Mhatre (2011) contributed to the understanding of the relationship between core personality traits and work stress.

### **Hypothesis 3**

H<sub>0</sub>: There is no relationship between stress and work aspirations of DoE officers.

H<sub>3</sub>: There is a relationship between stress and work aspirations of DoE officers.

When exploring the results of the above hypothesis results from Table 6, it shows that there is no relationship between stress and work aspirations of DoE officers ( $r=0.11457$ ;  $p=0.2935$ ). Hence we reject the alternative hypothesis in favour of the null hypothesis and conclude that there is no relationship between stress and work aspirations of DoE officers. Woolard (2008), when interviewing many CEOs about measuring company performance goals, retaining employees and alleviating stress, concluded that these cannot be reduced without introducing work-life balance in companies. This clearly indicates that the correlation between the two variables can only be significant with an addition of measures that address work life problems, hence no correlation was found between the two variables.

### **Hypothesis 4**

H<sub>0</sub> – Stress does not moderate the relationship between CSE and work aspirations.

H<sub>4</sub> – Stress moderates the relationship between CSE and work aspirations.

CSE was modelled as explanatory variable on work aspirations using the Generalized Linear Model (GLM). The resulting F-value ( $F=3.52$ ;  $Pr>F=0.0536$ ) shows that the model is not statistically significant. Only 3.7% of the variation in work aspirations is explained by the model. The parameter estimates output showed that CSE has no significant effect on work aspirations ( $Pr>F=0.0636$ ). So estimates output showed that CSE and the moderated effects of stress have no significant effect on work aspirations. This indicates that the positive relationship between stress and CSE is not significant on the third variable, that is, work aspirations, hence the conclusion can be drawn that stress does not moderate the relationship between CSE and work aspirations.

### **6.3. Recommendations**

The findings of this research indicate that Senior Management Teams (SMT) of DoE should encourage the DoE officers to improve their qualifications, hence the chi square test shows significant differences between the various categories of educational qualification ( $p < .0001$ ). Seemingly, these officers are interested in achieving goals within the tasks they can perform but they cannot improvise from the unknown. This means that needs analysis should always be done and officers be developed in areas of need.

Another finding was a positive relationship between CSE and stress. Judge (2009), after investigating core self-evaluations and work success, added stress levels amongst his hypothesis and reported that individuals with high core self-evaluations performed more effectively and efficiently on their jobs. Such individuals become more satisfied and successful in their careers and this result in lower levels of stress and conflict. This means that the Department of Education senior management team has to strategize and adopt measures that reduce stress levels and encourage positive CSE so as to deal effectively with underperformance.

Woolard (2008), after interviewing different company CEOs, suggested that implementing measures to improve work-life balance resulted in high staff retention, more trust between managers and employees, less stress and burnout, high self-regard and better corporate results. One can thus conclude that better results can be achieved by improving organizational work life.

Lastly, managers can use the results of this study to develop intervention strategies that can improve performance in their respective sections.

### **6.4. Limitations**

The study concentrated on the employees of the Department of Education only. The actual intervention strategies that can improve the situation have not been dealt with.

## **6.5. Other possible research areas**

Further research should focus in all the factors that can allow an individual to cope effectively with stress in the workplace. These coping strategies should aim at counter acting the negative effects of stress. These factors should include motivation, locus of control, self regard, optimism, self development and self esteem. Furthermore future research should focus on the teaching and application of skills needed by an individual to better cope with workplace stress e.g. problem solving skills, analytical skills. Other areas of interest could include the role of positive CSE on increased work aspirations.

## REFERENCES

- Ajzen, I. & Fishbein, M. (2000). Attitudes and the attitude-behaviour relations: Reasoned and automatic processes. *European Review of Social Psychology*, 11, 1-33.
- Anderman, E.M. & Midgley, C. (1997). Changes in achievement goal orientations, perceived academic competence and grades across the transition to middle-level schools. *Contemporary Educational Psychology*, 22(5), 269-298.
- Appadurai, A. (2004). The capacity to aspire: Culture and the terms of recognition. *Culture and Public Action*, (11:59-84).
- Arnes, C. (1992). Classrooms: Goals, structures and student motivation. *Journal of Educational Psychology*, 84, 261-271.
- Artkinson, W. (1999). Employee fatigue. *Management Review*, 88(9), 56-60.
- Avey, J.B., Reichard, R.J. Luthans, F. & Mhatre, K. (2011). A review, synthesis and meta-analysis of positive psychological capital. *Human Resource Development Journal*, 22(2), 127-152.
- Babbie, E. R. & Mouton, J. (2003). *The practice of social research*. Cape Town: Oxford University Press.
- Bakker, A.B., Demerouti, E., De Boer, E. & Schaufeli, W.B. (2000). Job demands

- Andjob resources as predictors of absence duration and frequency. *Journal of Vocational Behavior*, 62, 341–356.
- Barney, J.B. & Griffin R.W. (1992). *The management of organizations*. Boston: Houghton Mifflin Company.
- Bernard H.R. (2000). *Qualitative and quantitative approaches: Social Research Methods*. Thousand Oaks: Sage.
- Best, R.G., Stapleton, L.M. & Downey, R.G. (2005). Core self-evaluations and job burnout: The test of alternative models. *Journal of Occupational Health Psychology*, 10(4), 441-451.
- Blance, T.M., Durrheim, K. & Painter, D. (2006). *Research in practice* (2<sup>nd</sup>Ed.). Cape Town: UCT Press.
- Bono, J.E. & Judge, T.A. (2003). Core self-evaluations: A review of the trait and its role in job satisfaction and job performance. *European Journal of Personality*, 17, 5-8.
- Boss, P. (2002). *Family relationships*. California: Sage.
- Breakwell, G., Hammond, S.M., Schaw, C. & Smith, J. (2006). *Research methods in psychology*. London: Sage.
- Brown, A.B. (1998). *Organisational culture*. Englewood Cliffs: Prentice Hall.
- Brunborg, G.S. (2008). Core self -evaluations: A predictor variable for job stress.

*European Psychologist*, 13(2), 96-102.

Bryman, E. & Bell, E. (2003). *Business research methods*. Oxford: Oxford University Press.

Bunglawala, Z. (2004). *Aspiration and reality: British Muslims and the labour market*. Budapest: Open Society.

Burns, R. (2000). *Introduction to research methods*. London: Sage.

Campbell-Jamison, F., Worrall, L. & Cooper, C. L. (2001). Downsizing in Britain and its effects on survivors and their organizations: *Anxiety, Stress and Coping*. 14(1), 35-38.

Cantor, N. (1990). From thought to behaviour: "Having" and "doing" in the study of personality and cognition. *American Psychologist Association*, 45(6) 735-750.

Carrel, M.R., Elbert, N.F., Hatfield, R.D., Grobler, P.A., Marx, M. & Van der Schyf. (1999). *Human resources in South Africa*. Cape Town: Pearson Education.

Cartwright, S. & Cooper, C.L. (1997). *Managing workplace stress*. Thousand Oaks: Sage.

Cartwright, S. & Cooper, C.L. (2002). *Asset: An organizational stress screening tool: The management guide*. Manchester: RCL.

Coetzee, C.F. & Rothmans, S. (2007). Job demands, job sources and work engagement of employees in a manufacturing organization. *South African*

*Business Review*, 11(1)17-32.

Coetzee, M. & De Villiers, M.A. (2010). Sources of job stress, work engagement and career orientations of employees in a South African financial institution. *SA Business Review*, 14 (1), 27-57.

Collier, G. (1994). *Social origins of mental ability*. New York: John Wiley & Sons.

Cooper, C. L., Dewe, P.J., & O'Driscoll, M.P. (2001). *Organizational stress: A review and critique of theory, research and applications*. Thousand Oaks: Sage.

Costa, P.T. & McCrae, R.R. (1988). Personality in adulthood: A six-year longitudinal study of self-reports and spouse ratings on the NEO Personality Inventory. *Journal of Personality and Social Psychology*, 54, 853-863.

Cox, T. (1978). *Stress*. London: Macmillan.

Cox, T. & Mackay, C. (1981). A transactional approach to occupational stress. In Corletti, E.N. & Richardson, J. (Eds.). *Stress, work design & productivity*. Chichester: Wiley & Sons.

Cox, T. (1993). *Stress Research and Stress Management: Putting Theory to Work*. HSE Contract Research Report, No. 61. London: HMSO

Covington, M. (2000). Goal theory, motivation and school achievement: An Integrative review. *Annual Review Psychology*, 51, 171-200.

Cresswell, J.W. (1994). *Research design, qualitative & quantitative approaches*.

London: Sage.

Cummings, T.G. & Cooper, C.L. (1998). A cybernetic theory of organizational stress.

In Cooper, C.L. (Ed.). *Theories of organizational stress*. Oxford: Oxford Press.

De Vos, A.S. & Fouche, C.B. (1998). *Writing the research proposal. Research at*

*Grass Roots: A primer for the caring professionals*. Pretoria: Van Schaik.

Denzin N.K. & Lincoln, Y.S. (2002). *Handbook in qualitative research* (2<sup>nd</sup> Ed.).

Amazon: Sage.

DoE summary of results (2012). Retrieved from

<http://www.ecdoe.gov.za/examinations-Results>.

Dolan, S.L. (2007). *Stress, self-esteem, health and work*. New York: Palgrave

Macmillan.

Dormann, C. & Zapf, D. (2002). Social stressors at work, irritation, and depressive

symptoms: Accounting for unmeasured third variables in a multi-wave study.

*Journal of Occupational Organizational Psychology*, 75(1), 33-58.

Elliot, A.J. & Murayama, K. (2008). On the measurement of achievement goals:

Critique, illustrations and application. *Journal of Educational Psychology*, 100,

613-628.

Ellsenberg, M. & Heise, L. (2005). *Researching violence against women: A practical*

*guide for researchers and activists*. USA: Pearson.

Executive stress & the art of balanced living. (1991). *Rehabilitation in South Africa*,  
(December), 102 – 104.

Eysenck, H.J. (1990a). Biological dimensions of personality. In Previn, E. (Ed.),  
*Handbook of Personality*. New York: Guilford.

Faranaaz, V. (2013, September, 03). *Limpopo textbook crisis: A study in rights  
based advocacy, the raising rights consciousness and governance*. Mail  
& Guardian. Retrieved from info @ [www.section27.org.za](http://www.section27.org.za)

Fishbein, M., & Ajzen, I. (1975). *Belief, attitude, intention, and behavior: An  
introduction to theory and research*. Massachusetts: Addition-Wesley.

Folkman, S. & Lazarus, R.S. (1985). If it changes, it must be a process: Study of  
emotion and coping during the three stages of a college examination, *Journal  
of Personality and Social Psychology*, 48, 150-170.

Folkman, S. & Lazarus, R.S. (1980). An analysis of coping in a middle aged  
community sample. *Journal of Health and Social Behaviour*, 21, 219 -239.

Gilbert, D.T. (1993). The assent of man: The mental representation and control of  
Belief. In Wegner, D.M. & Pennebaker, J.W. (Eds.). *Handbook of mental  
control*. Englewood Cliffs, NJ: Prentice Hall.

Goalwiter, P.M. & Sheeran, P. (2006). Implementation intention and goal  
achievement: A meta analysis of effects and processes. *Advance in*

*Experimental Social Psychology*, 2-38.

Goldberg, L.R. (1990). An alternative “description of personality”: The Big-Five factor structure. *Journal of Personality and Social Psychology*, 59, 1216-1229.

Goodwin, C.J. (2002). *Research in psychology: Methods and design*. New York: John Wiley & Sons Inc.

Goof, M. & Watson, J. (2007). Are aspirations different? In Denmark, D., Meagler, G., Wilson, S., Western, M. & Phillip, J. (Eds.). *Australian social attitudes-citizenship& work aspirations*. Sydney: University of New South Wales Press.

Gottfredson, L.S. (2002). Gottfredson theory of inscription, compromise and self Creation. In Brown, D. (Ed.). *Career choice and development* (4<sup>th</sup>Ed.). San Francisco: Jossey Bass.

Greenberg, J. & Baron, R.A. (2008). *Behaviour in Organisations*. (9<sup>th</sup> Ed.). USA: Pearson International.

Greenglass, E.R. & Burke, R.J. (2001). Editorial introduction- Downsizing and Restructuring: *Anxiety, Stress and Coping: An International Journal*, 14(1), 1-13.

Haller, A.O. & Miller, I.W. (1971). *The occupational aspiration scale: Theory, Structures& correlates*. Cambridge: Schenckman.

Harter, S. (1990). Causes, correlates, and the functional role of global self-worth: A

- life-span perspective. In Sternberg, R.J. & Kolligan, J. (Eds.). *Competence Considered*, 67-98.
- Heller, D., Judge, T.A. & Watson, D. (2002). The confounding role of personality and trait affectivity in the relationship between job & life satisfaction. *Journal of Organisational Behaviour*, 23 (7), 815-835.
- Hiller, N.J. & Hambricks, D.C. (2005). Conceptualising executive hubris: The role of (hyper-) CSE in strategic decision making. *Strategy Management Journal*, 26, 279-319.
- Holmes, M.E., Ekkekakis, P., & Eiseman, J.C. (2009). *The physical activity, stress and metabolic syndrome triangle: a guide to unfamiliar territory for the obesity researcher. Etiology and Pathophysiology*. USA: Michigan State University.
- Hoppe, F. (1976). Success and failure. In De Rivera (Ed.). *Field theory as human-Science*. New York: Gardner Press.
- Irvine, A.R. (1997). *Between two worlds*. London: Mowbray.
- Jacobs, J.A., Karen, D. & McClelland, K. (1991). The dynamics of young men's career aspirations. *Sociological Forum*, 6(4), 609-639.
- Jennings, G. (2001). Tourism research. [Online] from <http://www.worldcompetitiveness.com> (Accessed 21 August 2011).
- Jepson, E. & Forest, S. (2006). Individual contributory factors in teacher stress: The

role of achievement striving and occupational commitment. *The British Journal of Educational Psychology*, 76, (1) 183 – 197.

Jones, F. & Bright, I. (2001). *Stress: Myth, theory and research*. Amazon: Prentice Hall.

Judge, T.A., Locke, E.A., Durham, C.C. (1997). The dispositional effects on job and life satisfaction: A core evaluations approach. *Research in Organisational Behaviour*, 19, 151-188.

Judge, T.A., Erez, A., Bono, J.E. & Thereson, C.J. (2002). Are measures of self esteem, neurotism, locus of control, and generalised self-efficacy indicators of a common core construct? *Journal of Personality and Social Psychology*, 83, 693-710.

Judge, T.A., Locke, E.A., Durham, C.C. & Kluger, A.N. (1998). Dispositional effects on job and life satisfaction: The role of core evaluations. *Journal of Applied Psychology*, 83, 17-34.

Judge, T.A., Erez, A., & Bono, J.E. (1998). The power of being positive: The relationship between positive self-concept and job performance. *Human Performance*, 11(2-3)167- 187.

Judge, T.A. & Bono, J.E. (2001). Relationship of core self-evaluations traits- self and emotional stability with job satisfaction and job performance: A meta-analysis. *Journal of Applied Psychology*, 86, 80-92.

Judge, T.A. & Larsen, R.J. (2001). Dispositional source of job satisfaction: A review and theoretical extension. *Organisational Behaviour & Human Decision Processes*, 86, 67-98.

Judge, T.A., Erez, A., Bono, J.E. & Thoresen, C.J. (2003). The core self – evaluation scale (CSES): Development of a measure. *Journal of Personnel Psychology*, 56, 303 -331.

Judge, T.A., Bono, J.E., Erez, A. & Locke, E.A. (2005). Core self-evaluations and Job and life satisfaction: The role of self-concordance and goal attainment. *Journal of Applied Psychology*, 90 (2), 257–268.

Judge, T.A. & Kammeyer-Mueller, J.D. (2008). Implications of core self-evaluations for a changing organizational context. *Human Resource Review*, 21, 331-341.

Judge, T.A., Heller, D. & Klinger, R. (2008). The dispositional sources of job satisfaction: A comparative test. *Applied Psychology: An International Review*, 57: 361-372.

Judge, T.A. (2009). Core self-evaluations and work stress. *Current directions in Psychological science*, 18: 58-62.

Judge, T.A. & Kammeyer-Mueller, J.D. (2011). Implications of core self-evaluations for a changing organizational context. *Human Resource Management Review*, 21, 331-341.

- Judge, T.A., Llies, R. & Zhang, Z. (2012). Genetic influences on core self-evaluations, job satisfaction, work stress & employee health: A behavioural genetics mediated model. *Organizational Behavior & Human Decision Processes*, 117, 2008-220.
- Karasek, R. & Theorell, T. (1990). *Healthy work: Stress, productivity and the reconstruction of working life*. New York: Basic Books.
- Larsen, R.J., & Ketelaar, T. (1991). Personality and susceptibility to positive and negative emotional states. *Journal of Personality and Social Psychology*, 61, 132-140.
- Lazarus, R.S. & Folkman, S. (1984). *Stress, appraisal and coping*. New York: Springer.
- Lazarus, R.S. (1991c). Psychological stress in the workplace. *Journal of Social Behavior and Personality* 6, 1-13.
- Lazarus, R.S. (1993). From psychological stress to the emotion: a history of changing outlooks. *Annual Review of Psychology*, 44, 1-21.
- Lazarus R.S. (1994). Psychological stress in the workplace. In Crandall, R. & Perrewe, P.L. (Eds.). *Occupational Stress*: New York: Taylor and Francis.
- Levinson, D.J. (1977). The mid-life transition: A period in adult psychosocial development. *Psychiatry*, 40, 99-112.

- Litzky, B.E. (2002). *Senior Management Aspirations of Managers and Professionals: A career Decision Making Perspective*. Retrieved from <http://www.Personal.psu.edu/users/b/x/bx126/...>
- Locke, E.A., McClear, K., & Knight, D. (1996). Self-esteem and work. *International Review of Industrial/Organisational Psychology*, 32(18), 161-178.
- Locke, E.A. & Latham, G.P. (1990 a). Work motivation & satisfaction: Light at the end of the tunnel. *Journal of Psychological Science*, 1, 240 – 246.
- Locke, E.A. & Latham, G.P. (2002). Building a Practically Useful Theory of Goal Setting and Task Motivation: A 35-Year Odyssey. *American Psychologist Association* 57(9), 705–717.
- Locke, E.A. & Latham, G.A. (2006). Current directions in psychological science: New directions in goal-setting theory. *Association for Psychological Science*, 15 (5) 265 -268
- Luthans, F. (1998). *Organisational behaviour*. (8th Ed.). Boston: Irwin McGraw-Hill.
- Luthans, F. (2002). *Organisational behaviour*. (9<sup>th</sup> Ed.). (International Edition). New York: Mc Graw-Hill.
- Luthans, F. (2008). *Organisational behaviour*. (11<sup>th</sup> Ed.). Singapore: McGraw Hill.
- Macmillan, H. (2009). *Macmillan Dictionary*: England: MacMillan.
- Madi, S.R. (1996). *Personality theories: A comparative analysis* (6<sup>th</sup> Ed.). Pacific

Grove: Brooks/Cole.

Maguire, K.C. (2012). *Stress and coping in families*. Cambridge: Polity Press.

Martin, J. (2005). *Organisational behaviour and management*. London: Thomson.

Maslach, C., Schaufeli, W.B. & Leiter, M.P. (2001). The power of being positive: The relation between positive self concept and job performance. *Human Performance Processes*, 11 (2-3), 167-187.

Mc Ewen, B.S. & Wingfield, J.C. (2003). The concept of allostasis in biology and Biomedicine. *Hormone Behaviour*, 43 (1), 2-15.

Mc Ewen, B. (2002). *The end of stress as we know it*. Washington: Dana Press.

McGregor, H.A. & Elliot, A.J. (2002). Achievement goals as predictors of achievement-relevant processes prior to task engagement. *Journal of Educational Psychology*, 94, 381-395.

Michie, S. (2002). Causes and management of stress at work. *Occupational Environmental Medicine*, 59, 67-72.

Mistry, R.S., Benner, D., Tan, C.S. & Kim, S.Y. (2009). The influence of adolescents' perception of economic strain. *Journal of Family Psychology*, 279-290.

Moorhead, G. & Griffin, R.W. (1989). *Organisational Behaviour*. (2<sup>nd</sup>Ed.). Boston: Houghton Mifflin.

Morelli, G., Krottinger, H. & Moore, S. (1979). Neuroticism and Levenson's locus of

control scale. *Psychological Reports*, 44, 153-154.

Mostert, F.F., Rothmans, S., Mostert, K. & Nel, K. (2008). Outcomes of occupational stress in a higher education institution. *South African Business Review*, 12(3) 102-127.

Mouton, J. (2001). *How to succeed in your masters and doctoral studies*. Pretoria: Van Schaik.

Nelson, D.L. & Quick, J.C. (1985). Professional women: Are distress and disease inevitable? *Academy of Management Review*, 10(2), 206-218.

Neuman, W.L. (2005). *Social research methods: Qualitative and quantitative approaches* (7<sup>th</sup>Ed.). Boston: Allyn and Bacon.

Nicholls, J. (1989). *The competitive ethos and democratic education*. Cambridge: Harvard University Press.

O'Neil, H.F. & Drillings, M. (1994). *Motivation: Theory and research*. Amazon: Psychology Press.

Ozmete, E. (2007). An evaluation of locus of control as a system related to life management: A case study on youth. *World Applied Sciences Journal*, 2(5), 691-698

Payne, R. (2005). *Relaxation techniques – A practical handbook for the health care professional* (3rd Ed.). New York: Churchill Livingstone.

Peacock, E.J., Wong, P.T. and Reker, G.T. (1993). Relations between appraisals and coping schemas: support for the congruence model, *Canadian Journal of Behavioural Science*, 25, 64±80.

Pinder, C.C. (1998). *Work motivation in organisational behaviour*. Upper Saddle River: Prentice Hall.

Pintrich, P.R. (1999). The role of goal orientation in self-regulated learning. In Boekaerts, P.R., Pintrich, M. & Zeider, M. (Eds.). *Handbook of self regulation: Theory, research and applications*. San Diego: Academic.

Quaglia, R.J. & Cobb, C.D. (1996). Toward a theory of student aspirations. *Journal of Research in Rural Education*, Winter.12(3), 127-132. Retrieved from [php.scripts.psy.edu/dept/articles/Quagliapdf](http://php.scripts.psy.edu/dept/articles/Quagliapdf).

Quick, J.P., Quick, J.D., Nelson, D.L. & Hurrell, J.J. (1997). *Preventive stress management: An organisational approach*. Hampshire: Palgrave.

Ramchander, P. (2004). *Research design & methodology*. Pretoria: University of Pretoria.

Rich, J. & Delgado, A. (2010). Measurement of vocational & educational aspiration & satisfaction among mental health clients. *International Journal of Psychosocial Rehabilitation*, 15(2), 91-98.

Rietchie, G., Fourie, E. & Buchanan, N. (2007). *Aspiration & expectations: research*

& *policy for the real world*. Oxford: University of Oxford.

Robbins, R.W., Tracy, J.D., Trzesniewski, K., Potter, J. & Gosling, S.D. (2001).

Personality correlates of self-esteem. *Journal of Research in Personality*, 35, 463-482.

Robbarts, G.C. (1992). Motivation in sport and exercise: conceptual constraints and

convergence. In Roberts, C.G. (Ed.). *Motivation in sports and exercise*.

Champaign IL: Human Kinetics.

Rowjensky, J.W. & Yang, B. (1997). Longitudinal analysis of influences on

adolescents' occupational aspirations: *Journal of Vocational Behaviour*, 51, 375 – 410.

Rollinson, D. (2005). *Organisational Behaviour and Analysis: An integrated*

*approach*. London: Prentice Hall.

SAPA (2012). *Limpopo schools intimidated into silence over textbook*. Retrieved

from: <http://www.citypress.co.za/South Africa/News/Limpopo...>

Saunders, M., Lewis, P. & Thornhill, A. (2003). *Research methods for business*

*students*. (3<sup>rd</sup>Ed.). England: Prentice Hall.

Scheider, B.H., Grazia, A., Nadel, J. & Weissburg, R.P. (Eds.). (1989). Competence

in Developmental perspective: Series D Behavioural & Social Sciences 51. Nato:Asi Series.

- Scheider, K. & Northcraft, G.B. (1999). Three social dilemmas of workforce diversity in organisations: A social identity perspective. *Human Relations*, 52 (11), 1445-1467.
- Schell, B.H. (1997). *A self-diagnostic approach to understanding organisational & personal stressors*. Connecticut: Quorum Books.
- Schooling 2025- *Education that pays for itself*. Retrieved @ [www.educationthatpaysforitself.com/documents/schooling 2025](http://www.educationthatpaysforitself.com/documents/schooling%2025)
- Sekaran, U. (2003). *Research methods for business: A skill-building approach*. (3<sup>rd</sup>Ed.). New York: John Wiley & Sons.
- Seyle, H. (1974). *Stress without distress*. Philadelphia: J.B. Lippincott.
- Seyle, H. (1976). *The stress of life* (Rev. Ed.) New York: Mc Graw Hill.
- Shaungnessy, J.J. & Zeichmeister, E.B. (1997). *Research methods in psychology*. Singapore: McGraw-Hill.
- Sheeran, P. (2002). Intention-behaviour relations: A conceptual and empirical review. *European Review of Social Psychology*, 12(1) 1-36.
- Sherwood, R.A. (1989). In Quaglia (Ed.) A conceptual framework for the study of aspirations: *Research in Rural Education*, 6 (2) 61-66. .
- Smith, C.A. & Lazarus, R.S. (1990). Emotion and Adaptation. In Pervin, L.A. (Ed.). *Handbook of Personality: Theory and Research*, 609-637).

Smith, A.P., Ncnamara, R. &Wellens, B.J. (2011). A holistic approach to stress and well being. *Occupational Health [at work]*. 8 (2), 34-35.

Smith, M.A., Segal, R. & Segal, J. (2013). Stress, symptoms, signs and causes. *Help Guide.org*

Spenner, K. &Featherman, D. (1978). Achievement ambitions. *Annual Review OfSociology*. (4), 373-420.

Strand. S. (2007). *Minority ethnic pupils in the longitudinal study of young people in England* (LSYPE). England: University of Warwick.

Strauss, R. (2012). *Five approaches to qualitative research*. Global Perspective Consulting.

Study mode (2011). *Stress and Emotional Intelligence at the Workplace*. Retrieved from [Http://www.studymode.com/essay/stress-And-Emotional-Intelligence-At-The-682661/htm](http://www.studymode.com/essay/stress-And-Emotional-Intelligence-At-The-682661/htm).

Super, D. (1990). A life-span, life-space approach to career development. In Brown, D.& Brooks, L.& Associates (Eds.), *Career choice and development: Applying contemporary theories to practice* (2<sup>nd</sup>Ed.).(197-261). San Francisco: Jossey-Bass.

Sutherland, V.J. & Cooper, C.L. (1990). *Understanding stress: A Psychological perspective for health professionals*. London: Chapman & Hall.

Sutherland, V.J. & Cooper, C.L. (2000) *Strategic stress management: An*

*Organizational approach*. London: Macmillan Press.

Taylor, S.E., Cousini-Klein, L., Lewis, B.P., Gruenewald, T.L., Gurug, R.A.R. &

Updegraff, J.A. (2000). Biobehavioural responses to stress in females: Tend

Andbefriend, not fight-or-flight. *Psychological Review*, 107(3), 411-429.

Urdu, T. (1997). Achievement goal theory: Past results, future directions. In

Pintrich, P.R. & Maehr, M.L. (Eds.).*Advances in Motivation and Achievement*.

Greenwich : Jai

Van den Broek, A., Vansteenkiste, M., De Witte, H. & Lens, W. (2008). Explaining

the relationship between job characteristics, burnout and engagement. *The*

*role of basic psychological need satisfaction, work and stress*, 22, 277-

294.

Van Zyl, E.S. (1993). Stress. *Journal of Industrial Psychology*, 19(3), 36-39.

Van Zyl, E.S. (2002). The measurement of work stress within South African

companies: A luxury or a necessity? *South African Journal of Industrial*

*Psychology*, 28(3) 26-31.

Van Zyl, E.S. & Pietersen, C. (1999). An investigation into work stress experienced

by a group of secondary school teachers. *South African Journal of Industrial*

*Psychology*, 28(3), 26-31.

Van Zyl, E.S. (1998). The effects of Industrial Psychology. *The Journal of Industrial Psychology*, 24 (1), 22-25.

Wambach, R.L. & Panackal, A.A. (1979). Age, sex, neuroticism and locus of control. *Psychological Reports*, 44, 1055-1058.

Wainwright, D. & Calnaan, M. (2000). *Stress: The making of a modern epidemic*. Buckingham: Open University Press.

Webster, M. (2014). *Merriam-Webster Online* (www. Merriam-webster.com)

Weijer, C., Goldsand, G. & Emmanuel, E.G. (1999). *Protecting communities in research. Current guidelines and limits of extrapolation*. Institutes of health: Pubmed.

Welman, J.C. & Kruger, S.J. (2001). *Research methodology* (2<sup>nd</sup>Ed.). New York: Oxford.

Wilburn, M. (2006). *Managing the customer experience: a measurement-based approach*. Wisconsin: Quality Press.

Zimmerman, B.J. (1990). Self-regulated learning and academic achievement: The emergence of a social cognitive perspective. *Educational Psychology Review*, 2, 25-31.

# Appendices

## Appendix A



### DEPARTMENT OF INDUSTRIAL PSYCHOLOGY

I am Nomzamo Gabelana who is currently doing a Masters Degree at the University of Fort Hare (Department of Industrial Psychology). To complete my studies, there is an urgent need to conduct a mini research as part of the requirements for the study. This study seeks to investigate 'Core self-evaluations, stress and work aspirations of the officers of the Department of Education (Senior Education Specialists and Deputy Chief Education Specialists) in the selected districts in the Eastern Cape.'

Participation in this study is completely voluntary. I appreciate your taking time to complete the questionnaire. It should take you 10 – 15 minutes. Your responses will be treated with utmost confidentiality as there is no provision for you to write your name in the questionnaire. All questionnaires are to be returned within **one week** of the receipt thereof.

I would like to assure you that the information provided will be for research purposes only. Should you require further information, don't hesitate to contact me on 0824604877. I would like to take this opportunity to thank you for availing yourself and thereby contributing to making this research study a success.

**SECTION A: BACKGROUND INFORMATION.**

**1. GENDER**

MALE		FEMALE	
------	--	--------	--

**2. AGE**

25-34		35 – 44		45 - 54		55+	
-------	--	---------	--	---------	--	-----	--

**3. EXPERIENCE IN THE CURRENT POSITION**

Less than one year		1 – 5 years		6 – 10 years		More than 10 years	
--------------------	--	-------------	--	--------------	--	--------------------	--

**4. QUALIFICATIONS**

Teaching certificate		Teaching Diploma		Bachelors Degree		Honours Degree		Masters Degree		Doctors Degree	
----------------------	--	------------------	--	------------------	--	----------------	--	----------------	--	----------------	--

**5. CURRENT POSITION**

Deputy Chief Education Specialist		Senior Education Specialist	
-----------------------------------	--	-----------------------------	--

**6. JOB TITLE**

DCES (IDS&G)		DCES (CURR)		DCES (ESSS)		SES (IDS&G)		SES (CURR)		SES (ESSS)	
--------------	--	-------------	--	-------------	--	-------------	--	------------	--	------------	--

OTHER SPECIFY .....
------------------------



13	Considering all my efforts and achievements, my work prospects are adequate.	1	2	3	4	5
14	Considering all my efforts and achievements, my salary/income is adequate.	1	2	3	4	5
16	My job security is poor.	1	2	3	4	5

### SECTION C: Achievement Goal Questionnaire-Revised (AGQ-R)

Circle the appropriate number to the right of each statement. Rating Scale

1	Strongly disagree	2	Disagree	3	Neutral	4	Agree	5	Strongly agree
---	-------------------	---	----------	---	---------	---	-------	---	----------------

ITEM	1	2	3	4	5
My aim is to completely master the material presented at work.	1	2	3	4	5
I am striving to do well compared to other workers.	1	2	3	4	5
My goal is to perform as much as possible.	1	2	3	4	5
My aim is to perform well relative to other workers.	1	2	3	4	5
My aim is to avoid working less than I possibly could.	1	2	3	4	5
My goal is to avoid performing poorly compared to others.	1	2	3	4	5
I am striving to understand the content of my work as thoroughly as possible.	1	2	3	4	5
My goal is to perform better than the other workers.	1	2	3	4	5
My goal is to avoid learning less than it is possible to learn.	1	2	3	4	5
I am striving to avoid performing worse than others.	1	2	3	4	5
I am striving to avoid an incomplete understanding of the course material.	1	2	3	4	5

## SECTION D: CORE-SELF EVALUATIONS SCALE

Below are several statements with which you may agree or disagree. Using the response scale below, indicate your level of agreement or disagreement with each statement by circling the appropriate number to the right of each statement.

1	Strongly disagree	2	Disagree	3	Neutral	4	Agree	5	Strongly agree
---	-------------------	---	----------	---	---------	---	-------	---	----------------

Item No.	Questions	1	2	3	4	5
1	I am confident I get the success I deserve	1	2	3	4	5
2	Sometimes I feel depressed	1	2	3	4	5
3	When I try, I generally succeed	1	2	3	4	5
4	Sometimes when I fail, I feel worthless	1	2	3	4	5
5	I complete tasks successfully	1	2	3	4	5
6	Sometimes I do not feel in control of my work	1	2	3	4	5
7	Overall I am satisfied with myself	1	2	3	4	5
8	I am filled with doubts about my competence	1	2	3	4	5
9	I determine what will happen in my life	1	2	3	4	5

10	I do not feel in control of my success in my career	1	2	3	4	5
11	I am capable of coping with most of my problems	1	2	3	4	5
12	I sometimes feel as if things look pretty bleak and hopeless for me	1	2	3	4	5

THANK YOU