# A QUALITATIVE EVALUATION OF SELF-MOTIVATION IN A

# **MEASURE OF TRAIT EMOTIONAL INTELLIGENCE**

by

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# STATEMENT

# **STUDENT NUMBER: 4230-893-3**

I declare the thesis titled "A QUALITATIVE EVALUATION OF SELF-MOTIVATION IN A MEASURE OF TRAIT EMOTIONAL INTELLIGENCE" is my own work and that all the sources that I have used or quoted have been indicated and acknowledged by means of complete references.

SIGNATURE

**PIETER J. ROSSOUW** 

DATE

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I could not imagine the joys and excitement or the challenges and trials that my master's degree would involve when I first embarked on this journey. It will always be a concrete reminder of the true meaning of self-discipline, persistence and ironically, the meaning that self-motivation has for me. Looking back, I cannot but feel a deep sense of gratitude, love and appreciation towards the following individuals:

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| DEGREE:     | MA                   |
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## SUMMARY

In this study, the author provided a discussion of international cross-cultural validation studies which reported low internal consistency reliabilities for the self-motivation facet of the Trait Emotional Intelligence Questionnaire (TEIQue). A review of salient models of emotional intelligence (EI) revealed that self-motivation was consistently conceptualised as part of the sampling domain of trait and mixed models of EI, but not ability-based conceptualisations of the construct. The author provided a qualitative evaluation of the ten self-motivation test items as they appeared in the TEIQue with the purpose of exploring the operationalisation of the construct in a multi-cultural South African sample. The exploratory-descriptive research was conducted amongst permanent employees who have all completed the TEIQue as part of on-going employee assessments. The present study found limited support for a satisfactory operationalisation of the self-motivation facet of the TEIQue as it related to a multi-cultural South African research sample.

## **KEY TERMS**:

self-motivation, item-homogeneity, trait EI theory, motivational theory

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#### **CHAPTER 1: INTRODUCTION**

Contemporary trends in human resource management reveal a growing reliance on psychometric evaluation and data to support the effective management of human capital (Hoffman, 2002). A typical component of this process involves the screening and selecting of candidates to ascertain their performance and possession of characteristics predictive of successful functioning in complex occupational settings.

In an analysis of generic job competencies across 268 companies worldwide, Spencer and Spencer (1993) found that over eighty percent of the job competencies that distinguished superior performers from average performers were based on aspects related to EI. Daniel Goleman's book *Emotional Intelligence* (Goleman, 1995) generated great interest in the construct amongst the general public given its claimed impact on job performance, subjective well-being, motivation and other related areas of functioning.

According to Goleman (2001), IQ is a better proxy of the level of cognitive complexity individuals can master and therefore a more decisive factor when it comes to determining whether an individual will meet the intellectual demands associated with a position. However, once appointed, individual levels of EI contributes more significantly to the degree of success that will ultimately be achieved. Higher levels of EI have also been associated with greater degrees of individual adaptability (Austin, Saklofske & Egan, 2005) and more effective functioning in demanding occupational and interpersonal situations (Caruso, 1999). Numerous studies on EI have since offered support for the significant impact that personal skills like negotiation and listening skills, conflict management skills and personal qualities such as self-

awareness, integrity and self-motivation could have on an individual's ability to thrive in high-performance environments (Goleman, 2001).

The present study offers a qualitative evaluation of the item content of a particular facet of an EI questionnaire, namely the self-motivation facet as it is operationalised in the TEIQue. This chapter provides the justification for the study, indicates the research problem and hypotheses, and gives a brief explication of the research model and method. The chapter concludes with an outline of the remaining chapters.

## 1.1 MOTIVATION FOR THE RESEARCH

As a self-report measure of trait EI, the TEIQue was originally developed in 2001 at the London Psychometric Laboratory at University College. Over the last decade, the TEIQue has been extensively researched and used internationally, with norms available in more than 15 countries (Petrides, 2009). Despite the widespread interest in the construct and its acclaimed relevance to successful functioning in a variety of personal and occupational domains, researchers and practitioners have pointed out that critical questions about the nature, definition, underlying theory and especially the measurement of EI and its constituent competencies remained to be explored (Conte, 2005).

The TEIQue conceptualises trait EI as a constellation of emotional self-perceptions located at the lower levels of personality hierarchies (Petrides, Pita & Kokkinaki, 2007). The instrument consists of one hundred and fifty-three test items, which are grouped into four factors and fifteen facets (Petrides, 2009). The fifteen facets of the TEIQue clusters around the four factors of emotionality, sociability, well-being and self-control. Two global factors exist namely self-motivation and adaptability, which feed directly into the global trait EI score instead of going through any of the aforementioned factors (Petrides, 2009).

Based on an analysis of the original normative sample (n = 1 721) in the United Kingdom, the TEIQue technical manual reported satisfactory validity and reliability for the instrument (Petrides, 2009). A factor analysis of the fifteen facets of the TEIQue revealed that the four factors explained sixty nine percent of the variance in the 15 facets (Petrides, 2009). The best represented facets were happiness, social awareness and emotion regulation and therefore these facets were considered as most representative of trait EI. Self-motivation, adaptability and impulsiveness were less well represented and therefore considered as least characteristic of EI. Despite this lack of construct representation, these facets were still considered part of the sampling domain of trait EI (Petrides, 2009). Of particular relevance to the present study was the reported internal consistency for the self-motivation facet ( $\alpha$ =0,69), which was at the lower end of acceptable internal consistency (George & Mallery, 2003). After the relationship facet, the self-motivation facet was shown to have the lowest internal consistency reported for all the facets of the TEIQue.

In recognition of the importance of providing adequate internal consistency scores for psychometric instruments, the APA Committee on Test Standards (1954) stated the following: "A coefficient of internal consistency should be reported if the manual suggests that a score is a measure of a generalized, homogeneous trait" (1954, p, 472). The internal consistency reliability of item scores is one of a series of indicators that reflects the degree to which test items in psychometric instruments measure a latent, hypothesised construct (Henson, 2001; Wells & Wollack, 2003). The internal consistency reliabilities of test items are commonly expressed in terms of Cronbach's Alpha coefficient (Gignac, 2009). Adequate internal consistency coefficients ( $\alpha$ >0.70) are desirable for standardised tests (George & Mallery, 2003) since conclusions about the degree to which the construct in question is adequately measured, is made on the basis of a single administration of the test (Wells and Wollack, 2003).

Sound test development and adaptation practices rely on consistent evaluations of the psychometric properties of instruments. In alignment with this approach, Petrides (2009) emphasised the importance of establishing the cross-cultural stability of the TEIQue as informed by reliability and validity data. To this end, the next section of the discussion makes reference to the psychometric properties of the TEIQue in a German-speaking and French-speaking population.

Freudenthaler, Neubauer, Gable, Scherl and Rindermann (2008) tested and validated the TEIQue in a German-speaking sample (n = 352). Their findings provided evidence in support of the reliability and validity of the TEIQue at facet, factor and global levels. Considering the reported internal consistency of the self-motivation facet specifically, the authors stated that: "Twelve of the 15 facets had solid internal reliabilities (between .71 and .91)". However, another three (impulsiveness, relationships and self-motivation) displayed alphas below .70" (Freudenthaler et al., 2008, p. 675). The internal consistency for the self-motivation facet was ( $\alpha$ =0.63).

Mikolajczak, Luminet, LeRoy and Roy (2007) investigated the psychometric properties of the TEIQue in a French-speaking population (n = 740). The test items were translated into French and then back-translated into English by fully bilingual translators. Eight test items with problematic translations were identified and amended to remove Belgian-French expressions. The authors concluded that the TEIQue scores were globally normally distributed and reliable and that the four-factor

structure of the TEIQue, as established in the United Kingdom, was replicated in the data. With regards to the self-motivation facet, the authors stated: "Among the 15 subscales, 10 had acceptable to excellent reliability (varying between .71 and .91) among both men and women. Two sub-scales, namely Self-Motivation and Empathy, had acceptable reliability among men but lower reliability among women" (Leroy et al., 2007, p. 342). In their final conclusion the authors stated that all internal consistencies were generally good, but that the internal consistencies for the self-motivation facet along with four other facets needed to be improved (Leroy et al., 2007).

The practice of test-adaptation involving the translation of test items was performed in the validity study for the French-speaking population described above. Another case of this process was described by Martskvishivili, Arutinov and Mestvirishvili (2013) in the adaptation of the TEIQue for the Georgian<sup>1</sup> population. The discussion of the translation and subsequent validation of the Georgian Trait Emotional Intelligence Questionnaire (G-TEIQue) made reference to three independent translations that were prepared by a panel of experts. The results of this study indicated that the factor structure of the TEIQue as established in the United Kingdom was broadly replicated in the Georgian translation. However, the authors made reference to the difficulties associated with translating from English to Georgian given the highly distinct histories, cultures and languages of both populations. In this regard, eighty-nine percent of the original test items on the facets of self-motivation and adaptability required some form of revision. "Although this was not directly investigated, the large number of revised test items strongly suggested

<sup>&</sup>lt;sup>1</sup> The Georgian language is a Kartvelian language spoken by approximately 4.2 million people in Georgia, a country in the Caucasus region of Eurasia.

that the connotative meaning of emotion-related constructs may be influenced by the Georgian cultural norms" (Martskvishivili et al., 2013, p. 87). According to the authors, this finding was due to the absence of any direct translations of the concepts of motivation and adaptability in the Georgian language (Martskvishivili et al., 2013). Finally, the internal consistency reliability of the self-motivation facet was reported as ( $\alpha$ =0.66).

Shi and Wang (2007) argued that the construct of EI was based on Western culture and whilst the general tendency was to explain the construct as universal, this may have led to an underestimation of the influence that cultural differences may have on affective personality. De Klerk (2008) argued that it was imperative to explore the influence of culture on the measurement of a particular psychological construct. An understanding of this influence enabled the development of equivalent and comparable measures which allowed for accurate comparisons between individuals from different cultural backgrounds (De Klerk, 2008).

All three the aforementioned studies represented an investigation of the psychometric properties of the TEIQue from the perspective of Western cultures. Turning towards the East, a validation study of the TEIQue amongst Chinese adolescents in Hong Kong is briefly discussed next.

Mavroveli and Siu (2013) investigated the cross-cultural stability of trait EI in a sample of Hong Kong adolescents (n = 357). The results obtained from this study fitted well with other studies which examined the stability of the TEIQue across cultures. However, as was the case with Petrides' (2009) study, the study also found that the facets of self-motivation, adaptability, assertiveness and relationships were less well represented in the EI factor space and were therefore considered less

characteristic of trait EI (Mavroveli & Siu, 2013). Regarding the internal consistency of the self-motivation facet, the authors reported an alpha coefficient of ( $\alpha$ =0.60), stating that this value, amongst those of other facets, was less than ideal.

In review of the original validation study conducted by Petrides (2009) and the crosscultural validation studies described above, it was evident that the internal consistency of the self-motivation facet was frequently pointed out as amongst the lowest of the fifteen facets of the TEIQue. Both Petrides (2009) and Mavroveli and Siu (2013) found that the self-motivation facet was less representative of trait EI. The German, French, Georgian and Chinese studies each revealed similar findings regarding the self-motivation facet. However, in the latter two studies, it was noteworthy to observe that the operationalisation of self-motivation in trait EI was subject to the indeterminate influence of cultural and linguistic differences.

Karim (2011) offered a comparative analysis of the psychometric properties of the Mayer-Salovey-Caruso Emotional Intelligence Test (MSCEIT), the Self-Report Emotional Intelligence Test (SREIT) and the TEIQue between Eastern, collectivist (Pakistani) and Western, individualist (French) cultural contexts. Of significance to the present study was the finding that French participants scored higher than their Pakistani counterparts on the self-motivation facet. According to Karim (2011), in Western culture, self-determined behaviour was an essential driving force of behaviour, but in Asian culture, the direction and energy of behaviour resided in the expectation of significant others (Karim, 2011). Put differently, the motivation to achieve was socially oriented in Asian cultures, whereas in Western cultures it was individually oriented (Karim, 2011). De Klerk (2008) also pointed out that it was erroneous to assume that a psychometric instrument developed for one linguistic and cultural context can simply be transported to another linguistic and cultural

context without understanding the universality, or equivalence of the individual cultures' conceptions of the psychological processes in question.

In tandem with the international trends of increased reliance on psychometric data to guide human capital management (Hoffman, 2002), growing concerns were raised regarding the use of psychometric instruments not specifically adapted or validated for a multi-cultural South African population (Foxcroft, 1997). In order to ensure that assessment results obtained from psychometric evaluations in South Africa were valid and reliable, practitioners needed access to instruments of a high quality (Foxcroft, Herbst, Le Roux & Paterson, 2004). A primary challenge to this requirement related to the development of psychometric instruments that were suitable for administration in South Africa's multi-cultural and multi-lingual context (Foxcroft et al., 2004). Formal legislation such as The Employment Equity Act no. 55 of 1998, Section 8 (Government Gazette, 1998) clearly outlined the criteria for a sound psychometric test when it stated that the use of information obtained from psychological tests or similar assessments were only to be used if the tests or assessments have been subjected to scientific scrutiny and found to be valid and reliable, unbiased and fairly applicable to all employees. Compliance with the stipulated legislation therefore required that all tests applied in South Africa were to provide scientific evidence of validity and reliability for the target population.

In light of the above, the TEIQue was validated in South Africa for the purposes of registering the instrument with the Health Professions Council of South Africa. Unfortunately however, the relevant information could not be accessed as the South African test publisher did not consider the validation report a public publication. Provided with the results of the international cross-cultural validation studies of the TEIQue referred to above, there was however reason to believe that the self-

motivation facet of the TEIQue in South Africa did not yield a satisfactory coefficient of internal consistency.

#### **1.2 PROBLEM FORMULATION**

In the previous section, various international validation studies made reference to the internal consistency of the self-motivation facet of the TEIQue. Provided with limited research that explored the relationship between self-motivation and the way it was conceptualised and operationalised in the different cultures and their associated linguistic contexts, the internal consistencies reported for the different validation studies only suggested that the test items did not consistently and uniformly measure self-motivation. However, beyond an indication of poor item homogeneity, the internal consistency data could not provide information about the conceptualisation of the construct or the properties of test items that shaped the way in which the test items were understood, interpreted and subsequently responded to.

In response to this legitimate limitation of internal consistency data, the present study aims to explore the suspected lack of item homogeneity amongst a South African sample. This evaluation is done by means of a qualitative exploratory- descriptive study that will evaluate a sample of South African respondents' conceptualisation of self-motivation as well as their interpretation of the self-motivation test items as they appear in the TEIQue.

# 1.3 RESEARCH QUESTIONS

The following research questions are formulated in an attempt to address the research problem:

- 1.3.1 Do South Africans understand the construct of self-motivation as intended in the TEIQue?
- 1.3.2 Do the test items in the self-motivation facet of the TEIQue measure selfmotivation?

# 1.4 AIMS OF THE RESEARCH

In answering the research questions, the present study addresses the aims set out below:

## 1.4.1 General aims

The general aim of this research is to determine how the understanding of selfmotivation by the research sample in question compares to the intended understanding of self-motivation as conceptualised and operationalised during the development of the TEIQue (Petrides, 2009).

# 1.4.2 Specific aims

The specific aims as set out below are formulated for the literature review and qualitative study.

#### 1.4.2.1 Literature review

In terms of the literature review, the specific aims are:

*Research aim 1:* to provide a detailed overview of the scope and content of ability and trait-based models of EI with particular reference to the inclusion or exclusion of self-motivation as a construct within these models; and,

*Research aim 2*: to determine the operational definitions of self-motivation and the conceptual relationships self-motivation may have with other constructs as it emerges from ability and trait EI theory; and,

*Research aim 3*: to determine the degree of similarity between operational definitions of self-motivation in EI theory relative to operational definitions of self-motivation as derived from general theories of motivation.

# 1.4.2.2 The qualitative exploratory study

In terms of the qualitative exploratory study, the specific aims are:

*Research aim 1:* to determine the extent to which the test items in the self-motivation facet of the TEIQue conform to the theoretical justifications for the operationalisation of self-motivation as outlined by the relevant models of EI; and,

*Research aim 2*: to determine the extent to which the test items in the self-motivation facet of the TEIQue are linguistically appropriate and culturally relevant for a multi-cultural South African sample; and,

*Research aim 3:* to determine the degree of equivalence between the South African populations' conceptualisation of self-motivation and the conceptualisation and operationalisation of self-motivation as set forth in the TEIQue: and lastly,

*Research aim 4*: to determine the extent to which the test items in the self-motivation facet of the TEIQue represents a uniform measurement of the construct.

#### 1.5 THE RESEARCH DESIGN AND METHODOLOGY

The research process employed in the present study started with a consideration of the empirical results of the self-motivation facet as it emerged from the various international validation studies previously discussed. This was followed by a review of the literature on salient models of EI and theories of motivation. A semi-structured interview guide was designed with the purpose of addressing the research questions as previously formulated. A total number of twenty seven semi-structured interviews of sixty minutes in duration were conducted with respondents who have all completed the TEIQue as part of general assessments in their workplace. The contact details of the respondents were provided by the test publisher.

The ten individual self-motivation test items were presented to the respondents during the semi-structured interview and a number of questions were asked in order to evaluate the efficiency and accuracy with which the test items measured self-motivation. The interviews were followed by verbatim transcriptions of the collected data. The data were organised into an appropriate format for content analysis. The data were coded and analysed and the results of each individual self-motivation test item were reported and interpreted in order to formulate conclusions, limitations and recommendations.

#### 1.5.1 Delimitations

The present study focuses on the model of trait EI as developed by Petrides (2009) and Petrides and Furnham (2001), with a particular emphasis on the self-motivation facet in the instrument. The present study neither attempts to build on the existing model of trait EI, nor argues for or against the inclusion of self-motivation in the sampling domain of trait EI. Therefore, the present research only serves as an

exploration of the functioning of the self-motivation facet of the TEIQue in a multicultural South African context.

#### 1.6 CHAPTER DIVISION

The study is reported in the chapters described below.

#### **Chapter 2: Literature review**

The aim of this chapter is to provide the theoretical background to the development and content of the main EI theories as well as the content and scope of contemporary theories of motivation as it related to the self-motivation test items in the TEIQue.

## Chapter 3: Qualitative exploratory-descriptive study

The qualitative exploratory-descriptive study is described in this chapter. The aims of the study, the sample, the design of the semi-structured interview guide, the methods of data collection and the content analyses of the data are discussed.

#### **Chapter 4: Research results**

The purpose of this chapter is to report on the results of the content analysis of the self-motivation test items. Based on the outcomes of this study, the research questions of the present study are informed.

#### Chapter 5: Conclusions, limitations and recommendations

This is the final chapter in which the results are integrated and conclusions are drawn. The limitations of this study are discussed and recommendations for future research are made on the basis of the findings.

# 1.7 CHAPTER SUMMARY

In this chapter the scientific orientation, the nature of the research problem and the aims of the present study were discussed. Related to this, the research design and method were outlined and the chapter concluded with a view of the remaining chapters that were covered in this study.

#### **CHAPTER 2: THEORETICAL FRAMEWORK AND LITERATURE REVIEW**

Against the background of the research problem provided in chapter 1, the literature review starts with a discussion of EI, the various theoretical models of EI and their corresponding measuring instruments. The purpose of the review is twofold. Firstly, to indicate where the TEIQue, as featuring in the present study, fits within the framework of EI literature and secondly, to indicate how the different theories of EI conceptualise and assess self-motivation as an emotionally intelligent behaviour, if at all.

The next section of the review focuses on the theories of motivation with the purpose exploring degree correspondence between definitions of the of and operationalisations of self-motivation as put forth in theories of motivation, relative to the definitions and operationalisations put forth in theories of EI. The literature review concludes with a distillation of the core constructs or elements characteristic of selfmotivation as described by EI and motivation literature. This is followed by an evaluation of the fit between the operationalisation of the self-motivation test items in the TEIQue and the core constructs and elements characteristic of self-motivation as proposed by the literature.

## 2.1 THE DEVELOPMENT OF THE CONSTRUCT OF EI

In order to discuss the development, nature and definitions of EI, it is necessary to briefly consider the definitions of emotion and intelligence respectively. Regarding the nature of emotions, it was clear that considerable confusion existed around definitions of emotion (Gross, 1999; Mayer, Salovey, Caruso & Sitarenios, 2001).

Sternberg (1998) believed that emotions consisted of two aspects, a somatic component that related to specific physiological reactions to emotions, and a cognitive component that related to an individual's interpretation of the emotions they experienced. Mayer, Caruso and Salovey (1999, p. 267) defined emotions as: "internal events that coordinate many psychological subsystems including physiological responses, cognitions and conscious awareness".

Early definitions of El provided by Wechsler (1958, p. 7) described intelligence as: "the aggregate or global capacity of the individual to act purposefully, to think rationally and to deal effectively with his environment". Interestingly, the element of successfully dealing with or adapting to the environment, amongst other elements, was also contained in the definition of intelligence provided by Wade and Tavris (2006). Here the authors defined intelligence as: "the ability to profit from experience, acquire knowledge, think abstractly, act purposefully, or adapt to changes in the environment" (Wade & Tavris, 2006, p. 321).

Given the respective definitions of emotion and intelligence it was clear that both constructs involved cognition, and as such it was not surprising that early traces of the development of EI could be found in the work of theorists such as Thorndike (1920) and Wechsler (1958) whose work have been traditionally associated with the study of cognitive intelligence.

However, it was only during the 1970's that research truly began to focus more on the interrelationship between cognition and emotion (Sternberg, 1998). Thorndike touched on the relationship between cognition and emotion when he hypothesised intelligence to consist of abstract, mechanical and social facets (Landy, 2006). He noted that the social facet of intelligence referred to the understanding of other

people, the comprehension of their internal states and their ability to act wisely in human relationships (Morrison, 2007; Salovey & Mayer, 1990; Thorndike & Stein, 1937). Thorndike differentiated between social and abstract or mechanical intelligence when he noted that the former involved the understanding of social interactions and behaviours, whereas the latter involved the understanding of and engagement with ideas, symbolic principles and mechanisms (Landy, 2006).

As previously mentioned, Wechsler (1958, p. 14.) referred to non-intellective factors in general intelligence and described them as involving: "...such items as the subject's interest in doing the tasks set, his persistence in attacking them and his zest and desire to succeed - items which might more familiarly be described as temperamental or personality factors, but which nevertheless must be recognized as important in all actual measures of intelligence".

Early traces of the development of EI could also be found in Gardner's (1983) theory of multiple intelligences. Gardner did not think of intelligence as a single construct, but rather as comprised of other intelligences such as linguistic intelligence, spatial intelligence, bodily-kinaesthetic intelligence, logical mathematical intelligence and two forms of personal intelligences namely, interpersonal or social intelligences and intrapersonal or emotional intelligences (Goleman, 2001). Gardner (1983, p. 239) defined interpersonal intelligences as involving one's: "ability to notice and make distinctions among other individuals", and intrapersonal intelligence as having: "access to one's own feeling life".

The term *emotional quotient* (EQ) originated from the work of Reuven Bar-On (Bar-On, 1988). Bar-On was strongly influenced by the work of Darwin, Thorndike and Wechsler. The result was Bar-On's conceptualisation of EI as emotional-social intelligence, which he described as a set of non-cognitive, emotional and social competencies that influenced an individual's ability to cope with environmental demands. This conceptualisation of EI described the construct in terms of a model of wellbeing, and as such situated the construct within the framework of personality theory (Goleman, 2001).

The first theoretical conceptualisation and definition of the term *emotional intelligence* was used by Salovey and Mayer in 1990. The authors conceptualised EI as the ability to reason about emotions and to use them to promote positive mental health (Salovey & Mayer, 1990). Whilst the initial 1990 model considered the construct to involve elements of social intelligence, the 1997 revision conceptualised the construct purely as a cognitive ability.

The publication of the book *Emotional Intelligence: Why it can matter more than IQ* by Daniel Goleman in 1995 (Goleman, 1995) popularised the belief that the experience and expression of emotion was a form of intelligence superior to traditional notions of cognitive intelligence (Schutte, Malouff, Hall, Haggerty, Cooper, Golden and Dornheim, 1998). Goleman extended the definition of the construct to include factors such as social and communication skills. Goleman positioned his theory of EI as a theory of performance in the workplace which was expressed through various emotional competencies (Goleman, 2001).

Provided with the respective definitions of emotion and intelligence as well as a glimpse into the early roots of EI, there was reason to believe that cognition and emotion were interrelated and shared a reciprocal relationship. Since EI has roots in both intelligence and personality testing, it was not surprising that some approaches to conceptualising EI suggested a cognitive basis for the construct, whereas others

emphasised the involvement of personality aspects, albeit to various degrees. This trend has led to a fair degree of confusion regarding the nature and definition of EI either as a trait, cognitive ability or a combination of both. Despite these differences in emphasis, Sternberg (1998) pointed out that the definitions of both cognitive and trait based conceptualisations of EI contained two fundamental aspects. Firstly, that emotionally intelligent individuals had the ability to learn from experience and secondly, they had the ability to adapt to the demands of the environment. The next section of the literature review discusses these different theoretical conceptualisations of EI in more detail.

#### 2.2 THEORETICAL CONCEPTUALISATIONS OF EI

Matthews, Roberts and Zeidner (2004) argued that the construct of EI faced significant challenges in terms of its conceptualisation, psychometric measurement and its claimed relevance and applicability to real life. These three aspects concerning the construct could be summarised in terms of three questions. The first question asked if EI was to be conceptualised as a cognitive ability or a personality trait, and how either conceptualisation was subsequently measured. The second question asked how different EI was from existing ability and personality theories. Finally, the third question asked how relevant or important EI really was (Matthews et al., 2004).

## 2.2.1 Is EI a cognitive ability or a personality trait?

In response to the first question, two theoretical approaches to the conceptualisation of EI applied, namely ability models and mixed models (Goleman, 2001; Matthews et al., 2004; Petrides & Furnham, 2000). Ability-based models have their origin in the work of Mayer and Salovey (1997) who viewed EI as a cognitive ability, and not a trait, since it met the criteria of a true intelligence (Mayer, Caruso & Salovey, 1999). Mayer and Salovey (1997, p. 8) distinguished a trait from a true intelligence and defined a trait as: "characteristic or preferred ways of behaving". Mayer and Salovey's (1997) ability-based model conceptualised EI as the cognitive aptitude for perceiving, appraising and expressing emotions and defined EI as: "one's actual ability to recognise, process, and utilise emotion-laden information" (Petrides, Frederickson & Furnham, 2004, p. 278). Ashkanasy and Daus (2005) similarly maintained that ability-based measures of EI provided the most comprehensive and empirically valid assessments of the construct.

Mixed-models of EI viewed the construct as inclusive of both cognitive abilities and personality traits such as self-concept, motivation, empathy, warmth, persistence, optimism and so forth (Mayer, Salovey and Caruso, 2000; Zeidner, Matthews & Roberts, 2004). The theoretical conceptualisations of EI as proposed by Bar-On (1997; 2006) and Goleman (1995) were leading examples of mixed-model conceptualisations of EI.

Further to the ability and mixed model approaches, another theoretical approach existed, namely the conceptualisation of EI purely as a trait. Petrides (2009) conceptualised trait EI as a person's self-perceived emotional abilities and behavioural tendencies and positioned this conceptualisation within the framework of personality theory.

Petrides (2009) provided an intriguing answer to the question about EI's conceptualisation as either a cognitive ability or personality trait. He argued that the conceptualisation of the construct on the basis of its underlying theory was incorrect. This observation was made in respect of the understanding that former theoretical

conceptualisations of the construct did not pay careful attention to the psychometric distinction between tests of typical and maximal performance. As such, Petrides (2009) argued that theoretical conceptualisations of EI should be classified on the basis of the assessment approach instead of its underlying theory, because it was the measurement approach, and not the underlying theory of a construct, that determined its operationalisation and subsequent validation. As such, Petrides and Furnham (2000) disagreed with Mayer, Salovey and Caruso's (2000) classification of EI in terms of ability or mixed model approaches, since the content of the two domains indicated considerable conceptual overlap. On the contrary, Conte (2005) pointed out that few studies have examined the overlap between the ability-based and trait-based conceptualisations of the construct.

Expanding on Petrides' (2009) observation regarding the classification of El conceptualisations on the basis of measurement approaches, the measurement approaches involved in each of the models are discussed below.

In terms of the measurement of ability-based conceptualisations of EI, Mayer, Salovey and Caruso (2000) noted that the most valid measurement of ability-based, or true intelligence EI, would be on the basis of test items that had objectively correct or incorrect answers. One such approach was consensus-based measurement. Consensus-based measurement was a process whereby test items were scored using a scoring standard derived from a large group of participants (Legree, Psotka, Tremble & Bourne, 2005). As such, the authors considered EI to be particularly amenable to consensus scoring since there were few experts on ability-based conceptualisations of EI, and furthermore, little knowledge from which to develop scoring standards for test items. However, Petrides (2009) argued that ability-based conceptualisations of EI could not be measured via self-report inventories since it

was considered psychometrically invalid to expect self-report inventories to provide objective assessments of mental abilities, competencies and skills (Petrides, 2009). Similarly, Pérez, Petrides and Furnham (2005) also considered this lack of objectivity in consensus scoring techniques to be one of the primary difficulties associated with conceptualising EI as a cognitive ability.

Averill (2004) furthermore pointed out that consensus scoring techniques were not sensitive to unusual or idiosyncratic emotional responses since it evaluated convergence in EI skills, and not the single, specific traits that marked superior EI. In this regard, Zeidner, Matthews and Roberts (2004) also pointed out that when one dealt with emotional content, there was a substantial challenge involved in the development of objectively correct answers.

Trait-based measures of EI were however measured with self-report inventories since it was believed that individuals themselves were in the best position to assess their beliefs and perceptions regarding their own behaviour (Bergh & Theron, 2006). In line herewith, Bandura (1977) proposed that the measurement of intelligence on the basis of self-report questionnaires was valuable since people often acted on their personal beliefs of self-efficacy rather than their actual abilities. Petrides (2009) agreed with this observation when he stated that the intrapersonal component of EI was by its very nature subjective and therefore not responsive to objective scoring. The subjective nature of emotions therefore rendered emotions impervious to measurement as abilities (Petrides, 2009).

The measurement of EI through self-report inventories has however been criticised for lacking accuracy given its reliance on an individual's honesty and degree of selfknowledge (Salovey & Grewal, 2005). Furthermore, self-report inventories were seen

to be amenable to social desirability responses which were difficult to detect, and as such the legitimacy of responses was suspicious (Roberts, Zeidner & Matthews, 2001; Salovey & Grewal, 2005). Despite these criticisms, self-report questionnaires remains the most common format for the assessment of trait EI.

# 2.2.2 How different is EI from existing theories of personality and cognitive ability?

In response to the second question regarding EI's distinctiveness from established models of cognitive ability and personality theory, strong criticism has been levelled against the construct in terms of its predictive value. (Matthews, Zeidner and Roberts, 2003). In this regard, Goleman (1995, 1998) has claimed that EI accounted for more variance in performance than cognitive ability. Goleman's mixed model conceptualisation of EI has consequently been harshly criticised for including a large number of personality traits, therefore not clearly distinguishing it from established personality inventories. (Matthews et al., 2003).

## 2.2.3 What is the true relevance and value of EI?

In response to the third question regarding the true relevance and value of EI, different opinions existed. Goldenberg, Matheson and Mantler, (2006) considered the conceptualisation of EI as a trait as valuable in its acknowledgment of the relationships between personality and emotion. (Goleman, 1995, 1998) considered EI to play a significant role in enhancing success in professional and occupational environments since it was a better predictor of success than IQ. Given the various theoretical conceptualisations of EI, different measurements of EI have been proposed (MacCann, Matthews, Zeidner & Roberts, 2003). This state of affairs yielded models that varied broadly in their content and assessment approaches

(Conte, 2005), which essentially left the issue of El's conceptualisation as either a cognitive ability or personality trait, unresolved. Landy (2005) also noted that the question regarding the true relevance and importance of El remained to be answered as it was not clear whether the construct was a combination of personality and intelligence, or simply another theory of personality. Research conducted towards an understanding of the relationship between trait and ability conceptualisations of El offered inconclusive answers to the issue of its distinctiveness from already well defined constructs (Landy, 2005).

#### 2.3 SELF-MOTIVATION IN ABILITY-BASED, MIXED AND TRAIT MODELS OF EI

The following section of the discussion provides a more detailed overview of the scope and content of ability and trait-based models with particular reference to the inclusion of self-motivation as a construct within these models. Reference is made to Goleman's Emotional Competency Inventory (ECI, Goleman, 1995), Reuven Bar-On's Emotional Quotient (EQ-i, Bar-On, 1997) and the Mayer, Salovey and Caruso Emotional Intelligence Test (MCSEIT, Mayer, Salovey, Caruso & Sitarenios, 2003). Finally, the TEIQue (Petrides & Furnham, 2001) is discussed in more detail.

#### 2.3.1 Ability-based El

Ability-based conceptualisations of EI viewed the construct as a form of cognitive intelligence that was informed by a number of intelligence factors that enabled the development of EI skills. These EI skills were related to the ability of understanding and reasoning with emotions and so capitalised on the interrelationship between emotion and cognition, which consequently enabled healthy emotional functioning in various situations (Mayer & Salovey, 1997; Wakeman, 2006).

#### 2.3.1.1 Salovey, Mayer and Caruso

The first ability-based model of EI was developed by Salovey and Mayer in 1990. This model defined EI as a subset of social intelligence involving: "...the ability to monitor one's own and others' feelings and emotions, to discriminate among them and to use this information to guide one's thinking and actions" (Salovey & Mayer, 1990, p. 189). The model contained three branches. The first branch described the appraisal and expression of emotion, the second branch the regulation of emotion and the third branch the utilisation of emotion. An adapted version of this model is provided in table 1 (Salovey & Mayer, 1990).

| Branch name                            | Constituent components of the branch  |
|--|---|
| 1) Appraisal and expression of emotion | In self: Verbal & Non-verbal<br>In others: Non-verbal perceptions & empathy |
| 2) Regulation of emotions              | In self & in others   |
| 3) Utilisation of emotions             | Flexible planning; Creative thinking; redirected attention; motivation      |

Motivation was positioned in the third branch that dealt with the utilisation of emotion. The utilisation of emotion referred to the ability to control emotions in order to solve problems (Salovey & Mayer, 1990). For example, an individual could use the anxiety they experience before a test to enable more thorough preparation for the test. In the discussion of motivating emotions, Salovey and Mayer described motivation as being facilitated by mood and defined motivation as "...persistence at challenging tasks...use good moods to increase their confidence in their capabilities and thus persist in the face of obstacles and aversive experiences" (Salovey & Mayer, 1990, p. 200).

Mayer and Salovey (1997) reviewed their initial three-branch conceptualisation of EI and developed a four-branch model of the construct. The four branches were: 1) the perception, appraisal and expression of emotion, 2) emotional facilitation of thinking, 3) understanding and analysing emotions, and employing emotional knowledge and lastly, 4) reflective regulation of emotions to promote emotional and intellectual growth. Given the new model, EI was redefined as: "the ability to perceive emotions, to access and generate emotions so as to assist thought, to understand emotions and emotional knowledge, and to reflectively regulate emotions so as to promote emotional and intellectual growth" (Mayer & Salovey, 1997, p. 5). This model was exclusively cognitive in its foundation and emphasised the cognitive components of EI and its potential to promote growth through the reflective regulation of emotion. The four branches of the model were designed as developmental stages (Boyle, Matthews & Saklofske, 2008) where each level built on the previous and involved more psychologically complex and integrated processes (Mayer & Salovey, 1997). An adapted version of this model is provided in table 2.

| Table 2: Mayer and Salovey | 's four-branch model of El (1997) |
|----------------------------|-----------------------------------|
|----------------------------|-----------------------------------|

| Branch name   | Description of abilities  |
|---|---|
| 1) Identification, evaluation and expression of emotion (least complex processes) | <ul> <li>Ability to identify emotions in oneself;<br/>identify emotions in other people and in<br/>other stimuli (language, sound,<br/>appearance); express emotions and related<br/>needs; ability to discern between accurate,<br/>inaccurate, and honest, dishonest<br/>expressions of emotions</li> </ul> |

| 2) Impact of Emotions on thinking                                      | <ul> <li>Ability to have emotions prioritise thinking<br/>by directing attention to important<br/>information; consciously generate emotion<br/>to facilitate problem solving; use emotions<br/>and mood swings to facilitate the<br/>consideration of multiple points of view;<br/>consciously generate emotion to facilitate<br/>judgment and memory regarding feelings</li> </ul>  |
|--|---|
| 3) Understanding and utilisation of emotion                            | <ul> <li>Ability to understand the relationship and<br/>intensity between various emotions;<br/>understand the origin and subsequent<br/>results of emotions; understand the<br/>experience of conflicting or contrasting<br/>emotions and emotional blends; understand<br/>the possible flow of one emotional state to<br/>another</li> </ul>  |
| 4) Regulation and management<br>of emotion<br>(most complex processes) | <ul> <li>Ability to remain open to both pleasant and<br/>unpleasant emotions; monitor and reflect on<br/>emotions; reflectively engage with, or<br/>detach from a particular emotion as judged<br/>from its usefulness to a given situation;<br/>manage emotions in oneself and others by<br/>enhancing positive emotions and<br/>moderating negative emotions without<br/>negating or exaggerating their importance</li> </ul> |

From the above it was clear that motivation, which was previously considered a constituent construct of EI (Salovey & Mayer, 1990) did not form part of Mayer and Salovey's (1997) conceptualisation of EI as a cognitive ability. Christie, Jordan, Troth and Lawrence (2007) conducted a study that explored the various factors that comprised EI using Goleman's competency based model of EI (Goleman, 1995), Mayer and Salovey's ability-based model of EI (Mayer & Salovey, 1997) and McClelland's (1987) theory of motivation. The results from the study indicated that motivation, as presented in trait based needs, did not form part of Mayer and Salovey's ability-based model of EI, but instead were only linked to EI. In terms of motivation and EI, the results of this study found that self-motivation could be

perceived as an emotional competency related to work performance as specified in Goleman's model.

# 2.3.1.2 Measurement of ability based EI: Salovey, Mayer and Caruso (MSCEIT

V2.0)

Mayer et al., (1999) have argued that EI met the three criteria necessary to be qualified as a traditional intelligence since EI test items had objectively correct answers, shared correlations with known intelligences and developed with age. In the view of EI as a cognitive ability, it was determined that the construct would be measured by performance tests indicative of maximal attainment (Petrides & Furnham, 2000).

The MSCEIT V2.0 is the most recent test that measures the four branches of abilitybased EI (Mayer, Salovey & Caruso, 2002). This test consists of four branches of EI abilities as previously discussed. They are 1) the perception, appraisal and expression of emotion, 2) emotional facilitation of thinking, 3) understanding and analysing emotions and employing emotional knowledge and 4) reflective regulation of emotions to promote emotional and intellectual growth. (Mayer & Salovey, 1997; Mayer, Salovey, Caruso & Sitarenios, 2003).

The test contains one hundred and forty-one test items, which represents a total of eight tasks. Each branch measures two of the tasks described by Mayer, Salovey, Caruso and Sitarenios (2003) and Mayer and Salovey (1997).

The reliability of the instrument was reported to be satisfactory at both the full-scale and branch level of the instrument (Mayer et al., 2003). The structural validity of the instrument revealed an adequate goodness-of-fit on a four factor model as explored with confirmatory factor analysis. Mayer, Salovey, Caruso and Sitarenios (2003) also believed that the four factor model provided a good description of the domain of ability-based EI.

As previously mentioned, this ability-based conceptualisation of EI does not measure self-motivation as an ability related to EI and therefore a more detailed overview of the test content is not provided.

#### 2.3.2 MIXED AND TRAIT-BASED MODELS OF EI

Trait theory is still one of the most prominent and widely accepted theories used to explain personality and the dynamics that underlie behaviour (Stys & Brown, 2004). Traits are seen as personality dispositions and characteristic ways of behaving that remain mostly stable across a person's life (Stys & Brown, 2004). Trait-based EI encompasses both mental abilities associated with intelligence and personality traits such as empathy, warmth and motivation (Matthews et al., 2003; Mayer et al., 1999; Mayer et al., 2000).

A multitude of theoretical conceptualisations and models of EI as a trait exist at present. The predominant models are those of Goleman (1995, 1998), Bar-On (1997), Schutte et al. (1998) and Petrides and Furnham (2001). For the purposes of exploring the existence of self-motivation as a construct in the sampling domain of trait EI theories, the theories, models and accompanying EI tests developed by Goleman (1995,1998), Bar-On (1997) and Petrides and Furnham (2001) are discussed. The SSREIT as developed by Schutte et al. (1998) will not be discussed here since their model is largely based on the Salovey and Mayer (1990) model which was previously discussed in this chapter.

#### 2.3.2.1 Bar-On (1997)

Reuven Bar-On developed the first commercially available test of EI test as a measure of well-being (Matthews et al., 2003). Bar-On defined EI as a collection of non-cognitive, emotional and social capabilities that influenced an individual's ability to cope with environmental demands and therefore positioned the construct in the context of personality theory (Goleman, 2001; Matthews et al., 2003). The Bar-On EQ-i measures self-reported abilities in five domains. They are 1) intrapersonal skills, 2) interpersonal skills, 3) adaptability, 4) stress management and 5) general mood. As was the case with Goleman's model of EI, Zeng and Miller (2003) have criticised the scope of Bar-On's definition of EI stating that it was too broad and contained too many aspects of personality.

#### 2.3.2.2 The Emotional Quotient Inventory (Bar-On, EQ-i)

The EQ-i is based on Bar-On's (1997) model of emotional and social intelligence (ESI). The EQ-i consists of one hundred and thirty-three test items that provide an overall emotional quotient (EQ) along with scores on five composite scales. Contained within the composite scales are fifteen clinical subscales. The clinical subscales measure emotional self-awareness, assertiveness, self-regard, self-actualisation, independence, empathy, interpersonal relationships, social responsibility, problem solving, reality testing, flexibility, stress tolerance, impulse control, happiness and optimism (Bar-On 1997, 2006). An adapted version of this model is provided in table 3.

|    | Areas of functioning   | Constituent factors  |
|----|--|--|
| 1) | Intrapersonal EQ / Self-<br>awareness and<br>expression            | Emotional self-awareness; assertiveness; self-<br>regard; self-actualisation; independence |
| 2) | Interpersonal EQ / Social<br>awareness and social<br>relationships | Empathy; social responsibility; interpersonal relationships                                |
| 3) | Adaptability EQ /<br>Emotional management<br>and regulation        | Problem solving; flexibility; reality testing  |
| 4) | Stress Management EQ /<br>Change management                        | Impulse control; stress tolerance  |
| 5) | General Mood EQ / Self-<br>motivation                              | Optimism; happiness  |

In terms of the model described above, the measurement of self-motivation was present in the factor concerned with general mood, which described the construct of happiness as well as the ability to be optimistic. Happiness was defined as the experience of feelings of contentment with oneself, others and with life in general (Bar-On, 2006), whereas optimism was defined as the ability: "to be positive and look at the brighter side of life" (Bar-On, 2006, p. 23). Self-motivation was connected to optimism since it was theorised that feelings of optimism enabled an individual to be self-motivated and therefore able to cope with pressure and environmental demands (Bar-On 2006; Goleman, 2001).

The reliability of the instrument was studied extensively and reported to be satisfactory (Bar-On, 2006). Regarding the validity of the instrument, it was suggested that Bar-On's conceptualisation of EI corresponded considerably well to

the factor-model of the Big-Five personality theory. However, Bar-On contended that his model was distinct from the factor model described in the Big-Five personality theory (McCrae, 2000). Bar-On (2006) and Van Rooy and Viswesvaran (2007) confirmed the EQ-i's distinctiveness from personality measures in studies that showed the overlap between the EQ-i and the Big-Five factor model to be less than twenty percent. However, Matthews et al., (2003) criticised the lack of conceptual interrelatedness between the subscales and therefore challenged the validity of the instrument.

#### 2.3.3 Daniel Goleman (1995, 1998)

Goleman conceptualised EI within the framework of a theory of performance in organisational and occupational settings. Goleman defined EI as: "abilities such as being able to motivate oneself and persist in the face of frustrations, to control impulse and delay gratification, to regulate one's moods and keep distress from swamping the ability to think, to empathise and to hope" (Goleman, 1995, p. 34). Goleman's (1998) definition of EI emphasised the role of emotional competencies that resulted in superior performance in occupational settings. Emotional competencies were defined as learned abilities based on EI (Goleman, 1998). The competencies measured by Goleman's Emotional Competence Inventory are self-awareness, self-control, motivation, empathy and social skills.

Like Bar-On, Goleman's conceptualisation of EI was criticised for including too many aspects of personality, which Matthews, Zeidner and Roberts (2003) described as a cluster of constructs that presumably measured EI.

# 2.3.3.1 The Emotional Competency Inventory (Goleman ECI)

The initial version of the ECI was based on the model developed by Goleman (1998) and included one hundred and ten test items, which measured twenty-five competencies across five clusters namely 1) self-awareness, 2) self-regulation, 3) motivation, 4) social competence and 5) social skills (Goleman 1998; Goleman, 2001; Wolff, 2006). An adapted version of Goleman's (1998) emotional competence framework is provided in table 4.

# Table 4: Goleman's emotional competence framework and associatedcompetencies

| Competencies         | Description  |
|----------------------|--|
| 1) Self-awareness    | <ul> <li>Emotional awareness; accurate self-<br/>assessment ;self-confidence</li> </ul>  |
| 2) Self-regulation   | <ul> <li>Self-control; trustworthiness;<br/>conscientiousness; adaptability; innovation</li> </ul>   |
| 3) Motivation        | <ul> <li>Achievement drive; commitment; initiative;<br/>optimism</li> </ul>  |
| 4) Social competence | <ul> <li>Empathy; understanding others; developing<br/>others; service orientation; leveraging<br/>diversity; political awareness</li> </ul>                                 |
| 5) Social skills     | <ul> <li>Influence; communication; conflict<br/>management; leadership; change catalyst;<br/>building bonds; collaboration and<br/>cooperation; team capabilities</li> </ul> |

In this model the motivation cluster was defined as: "emotional tendencies that guide or facilitate reaching goals" (Goleman, 2001, p. 88). Goleman (1998) described highly motivated individuals as those driven by the desire for achievement itself, and not by external rewards. These individuals were characterised as optimistic and passionate about what they do. They sought new challenges, enjoyed learning new things and took pride in their work. They persistently challenged the status quo and were constantly looking for better ways in which things could be done. A final characteristic of these individuals was that they were committed to their work when they enjoyed their job for the work itself.

Within the motivation cluster above, four motivational competencies were described namely, 1) achievement drive, 2) commitment, 3) initiative and 4) optimism. The competencies *achievement drive* and *optimism* are of particular interest to the present study in the sense that they are related to the self-motivation facet in the TEIQue. Achievement drive referred to the motivation to meet and improve standards of excellence, whilst optimism was defined as: "persistence in pursuing goals despite obstacles and setbacks" (Goleman, 2001, p. 110).

The second version of the test, the ECI 2.0 followed after a series of factor analyses indicated overlaps between the clusters. This resulted in seventy-two test items that measured eighteen competencies, which were again organised into four clusters. The new clusters were: self-awareness (remained intact from initial version), self-management (motivation and self-regulation combined), social awareness (motivation and empathy combined) and social skills (motivation, social skills and empathy combined) (Matthews et al., 2003, Wolff, 2006). Matthews et al., (2003) raised the lack of consensus between the different models as a key criticism against Goleman's model of EI.

Several studies reported satisfactory reliability and validity for the ECI 2.0 (Wolff, 2006) despite Pérez et al., (2005) who indicated that limited scientific information existed regarding the psychometric properties of the ECI.

#### 2.3.4 Trait EI (Petrides and Furnham, 2001)

Trait EI, or trait emotional self-efficacy, was conceptualised as a constellation of emotional self-perceptions located at the lower levels of personality hierarchies (Petrides, Pita & Kokkinaki, 2007). Petrides, Frederickson and Furnham (2004, p. 278) defined trait EI as: "a constellation of behavioural dispositions and self-perceptions concerning one's ability to recognize, process, and utilise emotion-laden information". As such, trait EI was viewed as a personality trait and not a cognitive ability, and was explicitly hypothesised to lie outside the domain of cognitive ability (Petrides, 2009). This view was also supported by a cross-cultural study that explored the discriminant and concurrent validity of the TEIQue and the MSCEIT (Karim and Weisz, 2010). The results provided evidence that trait EI was uncorrelated with cognitive ability, and as such trait EI was to be considered distinct from cognitive intelligence.

The trait EI model proposed by Petrides (2001) covered a sampling domain of trait EI as generated by a content analysis of the salient EI models, including, but not limited to the models proposed by Bar-On (1997), Goleman (1995) and Salovey and Mayer (1990). Therefore, this model included constructs like empathy and impulsivity along with constructs from Thorndike's and Gardner's intelligence theories (Petrides et al., 2004). The resulting model described trait EI in terms of four interrelated branches namely, 1) well-being, 2) self-control, 3) emotionality and 4) sociability (Petrides, 2009). Well-being consisted of traits related to dispositional mood. Self-control consisted of traits that pertained to impulse control and the regulation of emotion. Emotionality consisted of traits that pertained to the expression and perception of emotion, and lastly, sociability consisted of traits that pertained to interpersonal management and utilisation of emotion (Petrides 2009). The next section of the

discussion focuses on the constructs, composite scales and sub-scales measured by the relevant EI tests.

# 2.3.4.1 The Trait Emotional Intelligence Questionnaire (TEIQue, 2001)

As previously indicated, the TEIQue was based on the conceptualisation of EI as constellation of traits and self-perceived abilities (Petrides, 2001, Petrides & Furnham, 2001). With reference to established models of personality, the conceptualisation of EI as a trait was distinct from models of personality (Petrides, 2001, Petrides & Furnham, 2001). The TEIQue consists of one hundred and fifty-three test items that each taps into one of fifteen facets hypothesised to be part of trait EI. The fifteen facets of the TEIQue clusters into four factors and two global factors. The four factors are emotionality, sociability, well-being and self-control. The two global factors are self-motivation and adaptability, which feed directly into the global trait EI (Petrides, 2009). An adapted version of Petrides' (2009) trait EI framework is provided in table 5.

| Global Trait El |             |            |                                       | <b>Global factor:</b> Self-<br>motivation |  |
|-----------------|-------------|------------|---------------------------------------|---|--|
|                 |             |            | <b>Global factor:</b><br>Adaptability |   |  |
| Factor 1        | Factor 2    | Factor 3   | Factor 4                              |   |  |
| Emotionality    | Sociability | Well-being | Self-control                          |   |  |

 Table 5: The trait El framework

Individuals who scored high on self-motivation viewed themselves as: "driven and unlikely to give up in the face of adversity" (Petrides, Pita & Kokkinaki, 2007, p. 274). Petrides (2009) described high scorers on the self-motivation facet as individuals who were determined and persistent and motivated from within. These individuals typically displayed a strong sense of achievement. On the contrary, individuals who scored low on self-motivation required a lot of motivation from external sources such as incentives. These individuals were also more likely to give up when faced with a challenge. They also tended to have reduced levels of drive and persistence. As such, the self-motivation facet was positively associated with constructs such as job satisfaction and conscientiousness, but negatively associated with constructs such as anger and stress.

Global Trait EI encompasses all the factors listed above. A factor analysis of the fifteen facets of the TEIQue revealed that the four factors explained 69% of the variance in the 15 facets (Petrides, 2009). The best represented facets were happiness, social awareness and emotion regulation and these facets were considered as most representative of trait EI. On the contrary, self-motivation, adaptability and impulsiveness were less well represented and were considered as least characteristic of trait EI, albeit still considered part of the sampling domain of trait EI (Petrides, 2009). In terms of the reliability and validity of the instrument, numerous studies were conducted over the last decade, with norms available in more than fifteen countries (Petrides, 2009).

#### 2.4 SUMMARY OF THE MEASUREMENT OF SELF-MOTIVATION

#### WITHIN THEORIES OF EI

Following the review of the literature regarding the history of the concept of EI, the various theoretical conceptualisations and accompanying measurement approaches, it is clear that an aspect such as the *perception of emotion* is commonly found

amongst both ability-based and trait-based conceptualisations of the construct (Petrides, 2009). In terms of ability-based conceptualisations of EI, the measurement self-motivation is however only present in Salovey and Mayer's (1990) model of EI. In terms of trait-based conceptualisations of EI, self-motivation is present in Bar-On's (1997) model, Goleman's (1998) model, and Petrides' (2009).

Table 6 summarises the arrangement and definition of self-motivation as it pertains to the different EI models previously discussed.

# Table 6: Summary of self-motivation in the different theoretical conceptualisations of El

| CLASSIFICATION<br>OF EI MODEL | THEORETICAL<br>CONCEPTUALISATION | POSITION OF SELF-<br>MOTIVATION (SM)          | DESCRIPTION AND DEFINITION OF SELF-<br>MOTIVATION (SM)  |  |  |
|-------------------------------|----------------------------------|---|---|--|--|
| Ability model of El           | Mayer and Salovey, 1997          | SM not measured                               | SM not measured   |  |  |
| Mixed Models of El            | Salovey and Mayer, 1990          | In Branch 3: Utilisation of emotions.         | Refers to the ability to control emotions in order to<br>solve problems. As such, motivation is facilitated by<br>mood. Motivation is defined as the ability to persist at<br>challenging tasks and to use moods to increase<br>confidence and persist in the face of obstacles.  |  |  |
|                               | Bar-On, 1997                     | In General mood:<br>Happiness and<br>optimism | Optimistic individuals are considered self-motivated<br>and are able to cope with pressure and environmental<br>demands.  |  |  |
|                               | Goleman, 1998                    | Third personal<br>competency in model.        | Motivation consists of achievement drive,<br>commitment, initiative, optimism. Achievement drive<br>points to achieve for the sake of achievement itself.<br>Commitment refers to being passionate and enjoying<br>a job for the job itself. Initiative involves the readiness<br>to act on opportunities, to be pro-active rather than<br>reactive and, to act by oneself instead of being forced<br>to do so by external factors. Optimism refers to<br>persistence in achievement of goals, regardless of<br>setbacks. |  |  |
| Trait model of El             | Petrides and Furnham, 2001       | Global factor                                 | Self-motivated individuals are persevering, determined and have a high achievement drive. Do not easily give up.  |  |  |

A number of observations could be made with regards to the operational definitions of self-motivation and the conceptual relationships self-motivation shared with other constructs as it emerged from EI theory. These observations suggested that:

- Self-motivation was only present in mixed models and trait models of EI, but not pure ability-based models
- Self-motivation seemed to form part of individuals' ability to regulate emotion, or to use their mood in adaptive ways, which suggested the involvement of conscious choice in the regulation and utilisation of emotions
- Self-motivation was conceptually related to the constructs of happiness and optimism, and therefore also related to coping with pressure and a demanding environment
- Self-motivation was associated with the desire for accomplishment
- Self-motivation was associated with being passionate about your job
- Self-motivation was associated with the achievement of goals
- Self-motivation was associated with commitment to a task
- Self-motivation was associated with persistence, despite challenges or obstacles
- Self-motivation was related to autotelic activity and interest in a task

These observations posed important questions regarding the extent to which operational definitions of self-motivation in El literature were congruent with operational definitions of self-motivation in contemporary theories of motivation. Also, were self-motivation and intrinsic motivation interchangeable labels for the same construct? In order to explore these questions, the next section of this discussion reviews the major theories of motivation.

#### **2.5 THEORIES OF MOTIVATION**

Against the background of the ten test items which comprise the self-motivation facet of the TEIQue, the next section of the literature review discusses motivation, selfmotivation and intrinsic motivation in terms of a framework provided by Broussard and Garrison (2004). This framework organises contemporary theories of motivation around three questions. They are:

- 1) Do I have the ability to do this task?
- 2) Do I want to do this task, and why?
- 3) What do I have to do in order to succeed in doing this task?

Each question is informed by a number of motivational theories that aim to explain how an individual will respond to the particular question on the basis of their values, beliefs and thoughts about the task at hand.

#### 2.5.1 Do I have the ability to do this task?

According to framework provided by Broussard and Garrison (2004), the first question was informed by a set of theories called attribution theories. Attribution theories explore how individuals attribute causes to behaviour and events. Kelly and Michela (1980, p. 458) explained that: "the study of perceived causation is identified by the term 'attribution theory', attribution referring to the perception or inference of cause". Attribution theory identifies four achievement attributions: effort, luck, task difficulty and ability (Eccles & Wigfield, 2002), which affect an individual's level of motivation depending on whether the attribution is seen as changeable or within the individual's control. For example, when individuals perform poorly at a task, their levels of effort and

motivation will be reduced if they attribute their poor performance to their innate ability to do the task. If, on the other hand, they believe that their poor performance is due to a lack of effort, which can be changed, their level of effort and motivation will be adjusted in order to successfully do the task.

Locus of control is also related to attribution theory. The more an individual can attribute the cause of their achievement to an attribute that is within their control, like effort for example, the more motivated they tend to be. Stipek (1996) found that individuals who held effort attributions displayed a greater ability to persist at difficult tasks.

Self-efficacy theory is a social cognitive theory developed by Albert Bandura, who defines self-efficacy as: "individuals' confidence in their ability to organize and execute a given course of action to solve a problem or accomplish a task" (Eccles & Wigfield, 2002, p. 110). Strecher, DeVellis, Becker and Rosenstock (1986) describe self-efficacy as an individual's confidence in their ability to take action. Some individuals believe that they are efficient on difficult tasks, whereas others believe that they are only efficient on easy tasks. Self-efficacy theory postulates that higher levels of self-efficacy are associated with positive coping behaviour, more effort expended in accomplishing a task, greater persistence at challenging tasks and also higher goal setting (Bandura, 1977).

The last theory that influences an individual's self-perceived ability to successfully execute a task is self-worth theory. Covington (1984) developed self-worth theory and described self-worth as students' tendency to protect their sense of self-worth or personal value by employing different strategies to cope with failure at a task. For

example, failure at a specific task would rather be attributed to a lack of effort, as opposed to a lack of academic competence.

#### 2.5.2 Do I want to do this task, and why?

According to Broussard and Garrison (2004), this question was informed by expectancy-value theory, self-determination theory and goal theory.

Expectancy-value theory involves an individual's expectancies of achieving success on a task, as well as the subjective value attached to the achievement of success on a task. Eccles and Wigfield (2002, p. 110) defined expectancies as references made: "to beliefs about how one will do on different tasks or activities". Values were defined as: "incentives or reasons for doing the activity" (Eccles & Wigfield, 2002, p. 110). Wigfield (1994) described task values in terms of how a task met an individual's needs. Task values consisted of four components namely, attainment value, intrinsic value, utility value and cost. Attainment value referred to the personal value an individual attached to doing something well, and was related to the personal importance the task has for them. Intrinsic value referred to an individual's personal interest in the task and enjoyment derived from doing the task. It was furthermore also related to intrinsic motivation as discussed by Deci and Ryan (1985). The utility value of a task was expressed in terms of the degree to which the completion of a task led to the achievement of current and future goals. Finally, the cost component of a task referred to the negative aspects associated with engagement in a task, such as anxiety or the fear of failure. The cost component furthermore included the sacrifices that had to be made in order to complete the task and the amount of effort that was required to complete the task (Wigfield, 1994). As such, expectancies and values involved the complex interaction of taskspecific beliefs such as self-perceptions of competence, perceptions of task difficulty, personal goals and self-schemas. These aspects all acted as determinants of the level of motivation an individual would display (Wigfield, 1994; Eccles & Wigfield, 2002).

Intrinsic task-value as discussed above was also related to intrinsic motivation, which in turn was related to interests. Hidi and Harackiewicz (2000, p. 152) defined interests as: "an interactive relation between an individual and certain aspects of his or her environment". Interest could be classified as either situational or personal in nature. Personal interest was associated with persistence at a task, increased attention and focus, as well as increased enjoyment of the task. Depending on the task environment, situational interest was considered more transitory, affective and immediate (Hidi & Harackiewicz, 2000). Deci and Ryan (1985, p. 31) stated that when individuals were intrinsically motivated, they: "experience interest and enjoyment, they feel competent and self-determining, they perceive the locus of causality for their behaviour to be internal, and in some instances, they experience flow".

Deci and Ryan (2008, p. 15) stated that intrinsic motivation involved: "doing a behaviour because the activity itself is interesting and spontaneously satisfying", and therefore intrinsically motivated people were driven by the positive feelings they experienced from the task itself (Gagné & Deci, 2005). Extrinsic motivation on the other hand referred to the execution of a task or the engagement in an activity for reasons that had to do with the consequences of the action, such as reward or the avoidance of punishment (Deci & Ryan, 2008, Gagné & Deci, 2005). Whilst Deci and Ryan used the intrinsic-extrinsic distinction in their discussion of motivation, their major theoretical contribution to the study of motivation was found in their development of self-determination theory (SDT).

SDT focused on the degree to which an individual was self-motivated and their behaviour self-determined (Deci & Ryan, 1985).

SDT involved the exploration of human motivation, development and well-being with a specific emphasis on the type of motivation involved, such as autonomous motivation, controlled motivation or amotivation. As a macro theory of human motivation, SDT focused on the social conditions that promoted or inhibited self-motivation as facilitated by the extent to which the basic psychological needs for autonomy, competence and relatedness were satisfied (Deci & Ryan, 2008; Deci & Ryan, 2000). These three psychological needs had their origin in cognitive evaluation theory, a sub-theory within SDT (Deci & Ryan, 1985). In cognitive evaluation theory, autonomy referred to volition and the desire to self-organise and engage in ways that were free and integrated with one's sense of self (Deci & Ryan, 2000). Relatedness referred to the need to feel connected to others, and to feel the experience of being loved and cared for. Competence referred to an individual's need to experience efficacy and feel like the active, causal agent of their behaviour (Deci & Ryan, 2000).

In terms of the degree to which these three basic psychological needs were met, SDT posited that an individual would express self-determined and self-motivated behaviour on a continuum of relative self-determination. On the one end of the continuum, behaviour was considered autonomous and the type of motivation involved was intrinsic in nature. In the middle of the continuum were various degrees of controlled behaviour, accompanied by varying degrees of extrinsic motivation. On the other end, a state of complete amotivation was present. Autonomous or intrinsic motivation involved the engagement in an activity purely for the sake of the enjoyment and satisfaction derived

from the activity itself (Guay, Chanal, Ratelle Marsh, Larose & Boivin, 2010). Deci and Ryan (2008, p. 182) defined autonomous motivation as involving: "both intrinsic motivation and the types of extrinsic motivation in which people have identified with an activity's value and ideally will have integrated it into their sense of self". The authors furthermore noted that autonomously motivated individuals experienced volition and valued the effort applied to the accomplishment of a task.

Ryan and Deci (2000) made an interesting observation in terms of the different definitions of intrinsic motivation. They noted that some definitions of intrinsic motivation stated that a person was motivated to do a task because it was interesting, whereas other definitions emphasised the inherent satisfaction derived just from doing the task. "Because intrinsic motivation exists in the nexus between a person and a task, some authors have defined intrinsic motivation in terms of the task being interesting while others have defined it in terms of the satisfactions a person gains from intrinsically motivated task engagement" (Deci & Ryan, 2000, p. 56). On the other hand, Nakamura and Csikszentmihalyi have defined intrinsic motivation in terms of the satisfaction in terms of the subjective experience of being fully engaged in autotelic activity. This experience was also referred to as flow (Nakamura, Csikszentmihalyi, 2002).

Turning to extrinsic motivation, this construct was described as the engagement in an activity for instrumental reasons rather than for the sake of the satisfaction intrinsic to the activity, which may vary in terms of the degrees of self-determination involved (Guay et al., 2010). When people experienced pressure to behave in a particular way, they no longer acted autonomously, but instead were controlled by an external factor. Research studies in the domain of SDT have revealed that external factors such as pressure or

deadlines diminish intrinsic motivation since they represented an external locus of control (Deci & Ryan, 2000). In such instances, the individuals involved experienced *controlled motivation* which was defined as consisting: "... of both external regulation, in which one's behaviour is a function of external contingencies of reward or punishment, and introjected regulation, in which the regulation of action has been partially internalized and is energized by factors such as an approval motive, avoidance of shame, contingent self-esteem, and ego-involvements" (Deci & Ryan, 2008, p. 182).

Extrinsic motivation could be presented along a continuum as determined by the degree of self-determination involved. The degree of self-determination involved was a function of the type of behaviour regulation at play (Ryan & Deci, 2000). An adapted version of this model is illustrated in table 7 (Ryan & Deci, 2000; Vallerand, Pelletier & Koestner, 2008).

| Table 7: The types | of motivation and | regulation within SDT |
|--------------------|-------------------|-----------------------|
|--------------------|-------------------|-----------------------|

|                                      | Most s                                   | elf-determi           | ned                   | Least self-determined     |                     |                  |
|--------------------------------------|--|-----------------------|-----------------------|---------------------------|---------------------|------------------|
| Type of motivation                   | Intrinsic or<br>autonomous<br>motivation | Extrinsic motivation  |                       |                           | Amotivation         |                  |
| Source of<br>behaviour<br>regulation | Intrinsic<br>regulation                  | Integrated regulation | Identified regulation | Introjected<br>regulation | External regulation | No<br>regulation |

**Degree of self-determination** 

Extrinsic motivation that was least self-determined involved the external regulation of behaviour. That was behaviour exclusively aimed at attaining a reward or avoiding

punishment (Guay et al., 2010). Introjected regulation of behaviour referred to behaviour that was driven by feelings of guilt or obligation, and therefore this type of behaviour was considered controlled although the individual might have endorsed the reasons for doing the task or activity. Identified regulation of behaviour was present when the individual fully endorsed the reasons for doing an activity, or when the activity was of significant personal relevance. Therefore, this behaviour was considered self-determined and independent of external rewards or the avoidance of punishment. Integrated regulation referred to behaviour that was fully self-determined in that it aligned with an individual's values, needs and identity (Guay et al., 2010). Whilst both autonomous and controlled motivation directed and energised behaviour, a state of *amotivation* was marked by a complete absence of intention and motivation – a state that has been related to psychologically maladaptive outcomes (Vallerand et al., 2008).

Finally, goal theories described the reasons an individual had for engagement in a particular task or activity. Ryan and Deci (2000, p. 51) noted that the: "orientation of motivation concerns the underlying attitudes and goals that give rise to action - that is, it concerns the why of actions". Ames (1992) distinguished between ego-involved and task-involved goal orientations. Individuals with ego-involved goal orientations sought tasks and situations that promoted positive evaluations of their competence, and avoided those that stood to minimize evaluations of their competence. Individuals with a task-involved goal orientation sought to develop their competence through mastering their tasks. Of particular relevance to the present study is the observation by Eccles and Wigfield (2002) that the mastery goals or task-involved goal orientations are associated with higher levels of self-competence, self-concept, self-regulation and persistence at challenging tasks. Similarly, Ames (1992, p. 262) noted that: "Research evidence

suggests that a mastery goal is associated with a wide range of motivation-related variables that are conducive to positive achievement activity and that are necessary mediators of self-regulated learning".

#### 2.5.3 What do I have to do in order to succeed in doing this task?

The third question that organised contemporary theories of motivation involved theories that aimed to connect motivation to cognition, such as self-regulation and volition theory (Broussard & Garrison, 2004).

Schunk and Zimmerman (2007) indicated that an individual's motivation was based on the valence of their evaluation of success and failure. Positive reactions were associated with higher levels of motivation, and negative reactions with lower levels of motivation. Self-regulation theory therefore suggested that individuals could motivate themselves by means of self-regulatory behaviour such as realistic goal-setting, consistent assessment of their progress towards the achievement of goals and the application of appropriate learning strategies. The model offered by Linnenbrink and Pintrich (2002) also connected motivation to cognition in the framework of selfregulation theory. They connected social contexts, prior achievements, expectancies and values with cognitive components such as learning strategies, self-regulation and metacognition.

Volition theory was proposed by Corno (1993), where volition referred to an individual's strength of will. Strength of will was also associated with other concepts such as conscientiousness and self-discipline. As such, volition theory stated that although

motivation assisted with the goal identification, it was volition that would eventually determine how and if identified goals were achieved.

# 2.6 EVALUATION OF THE TEIQue SELF-MOTIVATION TEST ITEMS IN TERMS OF

#### **EXISTING EI THEORIES**

Provided with the foregoing review of the theories of EI, the definitions of self-motivation within the theories of EI and the general theories of motivation, the final section of this literature review focuses on a distillation of the eight core constructs or elements characteristic of self-motivation as described in the EI literature. This is followed by an evaluation of the suitability of the TEIQue's self-motivation test items in terms of the core constructs or elements characteristic of self-motivation of self-motivation.

## 2.6.1 Distillation of the key operational characteristics of self-motivation

Self-motivation was predominantly conceptualised as a trait and not a cognitive ability and therefore mixed and trait models of EI described self-motivation in terms of the various elements depicted in figure 1. Figure 1 also indicates the relationships between the various elements.

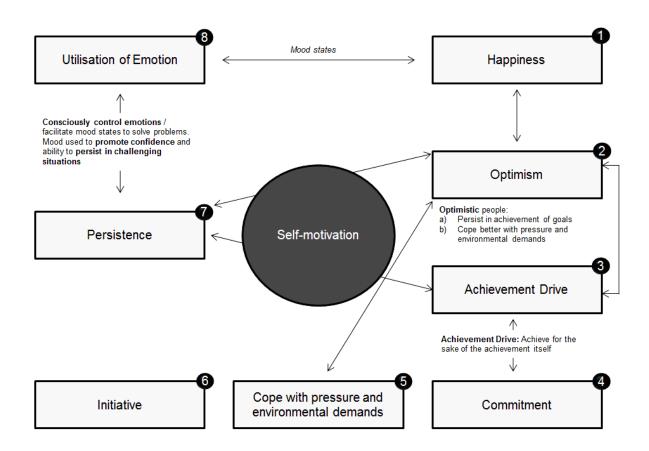


Figure 1: The eight core elements and constructs characteristic of self-motivation

The interpretation of figure 1 starts with the understanding that self-motivation is connected to each of the elements around it, with some of the elements sharing additional relationships with each other. The experience of a mood state is understood to be within an individual's conscious control and can therefore be voluntarily managed. As part of its relation to mood states and the voluntary control thereof, self-motivation is marked by feelings of happiness (element 1) which in turn is connected to a general sense of optimism (elements 1 and 2 connected). Optimism as a construct is related to self-motivation in that optimistic individuals cope better with pressure and environmental demands (element 2 connected to element 5), and are furthermore determined to persist in the face of challenges given their high achievement drive (elements 2,3 and 7

connected). Self-motivation is associated with a high achievement drive (element 3) which characterises an individual that is committed to achieve for the sake of the achievement itself and not merely for an external award (elements 3 and 4 connected). Commitment (element 4) to a task is another definitive feature of self-motivation since self-motivated individuals express a passion for what they do and enjoy doing a task for the task itself. Self-motivated individuals can take initiative (element 6), meaning they are pro-active and initiate action without being forced or manipulated by external events.

In terms of the eight core elements or constructs representative of self-motivation as derived from the descriptions and definitions in the literature, the operationalisation of self-motivation in each of the TEIQue self-motivation test items is evaluated next.

### 2.6.2 Evaluation of the suitability of the self-motivation test items in the TEIQue

Throughout the following evaluation of the suitability of the self-motivation test items in terms of the relevant EI and motivational theories, it is important to note that neither the TEIQue Technical manual (Petrides, 2009), nor Petrides' doctoral thesis (Petrides, 2001) provided theoretical justifications for the operationalisation of self-motivation in the test items. This evaluation is therefore done by the researcher on the basis of the former distillation of the key operational characteristics of self-motivation as they emerged from trait and mixed models of EI theory (figure 1).

In the first test item of the TEIQue, self-motivation is operationalised in terms of the extent to which an individual is forced to work hard by an extrinsically motivating force, in this case pressure. Agreement with this statement reflects lower levels of self-motivation since it implies that hard work or good performance is necessitated by

pressure and is therefore not a result of an individual's own initiative (element 6) or a high achievement drive (element 3). Test item 1 therefore aligns well with the theoretical basis provided by the El literature.

Test item 2 provides a rather forthright operationalisation of the construct since it measures self-motivation in terms of a respondent's subjective appraisal of their level of self-motivation. As such, this operationalisation involves a direct measurement of the construct as opposed to a measurement through any one of the nine interrelated elements discussed in figure 1. Whilst this test item provides an accurate operationalisation of the construct given the reference it makes to the source of motivation ("...motivate myself"), this particular operationalisation did not fit a specific element in the framework.

The third test item operationalised self-motivation by asking respondents if they had many reasons for not giving up easily. In terms of the framework provided, the position of test item 3 is unclear. Element 8 (persistence) may possibly provide a theoretical context for the operationalisation of self-motivation in this test item since persistence enables an individual to not give up. In addition, element 2 (optimism), may provide a theoretical context for the operationalisation of self-motivation given that the existence of reasons to not give up easily can promote feelings of optimism. However, the use of the word *reasons* in the test item makes the position of this test item unclear since the source and nature of the reasons were left to the judgment of the respondent. As such, these reasons can be of an extrinsically or intrinsically motivating nature and therefore not necessarily representative of self-motivation.

Element 4 (commitment) provides a clear theoretical context for test item 4, which operationalises self-motivation in terms of the extent to which an individual is driven by commitment to the task itself, as opposed to being driven by the importance of the task itself. Similarly, element 6 (initiative) can provide a clear theoretical context for test item 4 since the effort an individual expends on a task follows as a result of their own initiative and therefore not an action necessitated by the importance of the task.

Test item 5 also represents a direct operationalisation of the construct. Agreement with the statement suggests higher levels of self-motivation. However, unlike test item 2, which makes clear reference to the source of motivation (from within the individual), test item 5 does not clearly suggest that the source of the motivation in question is internal. As such, there is no context given in the test item that promotes the understanding that the type of motivation involved here is self-motivation specifically. For example, individuals can agree with the statement that they generally feel motivated, but given the way in which the test item is phrased, it is impossible to know if agreement with this test item reflects self-motivation, or extrinsic motivation as promoted by a factor such as a performance bonus scheme. Therefore, it is not clear how this operationalisation fits within the framework provided by the various definitions of self-motivation in the EI literature.

The sixth test item that measures self-motivation operationalises the construct in terms of the effortlessness with which a task is executed. In this test item, low levels of effort required to complete a task are seen as a function of high levels of self-motivation. It is not clear where test item 6 fits into the existing framework since high levels of selfmotivation may be one of many constructs that promoted the seemingly effortless

production of good work. There may also be a number of different circumstances surrounding the task or the individual that facilitate the effortless production of good work. For example, clearly defined processes or ample availability of support can enable the production of good work. From the perspective of the individual, familiarity with the role or high levels of personal competence or job tenure can also promote the production of good work, as opposed to an innate psychological construct such as selfmotivation. This test item therefore lacks the necessary clarity and focus in its operationalisation of self-motivation.

Test item 7 employs the same concept for operationalising self-motivation used in test item 6, but instead makes use of negatively phrased wording. As such, an individual's level of self-motivation is inversely proportionate to the amount of effort involved in the execution of a task. In terms of operationalising self-motivation, test item 7 lacks the same clarity and focus as test item 6, leaving its position in the framework unclear. Individual interpretations of what test item 7 attempts to measure are also open to numerous task and situational conditions or personal skills, other than a lack of selfmotivation, that can explain why individuals feel that most of the things they manage to do well, seem to require a lot of effort.

Element 4 (commitment), provides a clear theoretical context for the operationalisation of self-motivation in test item 8. As previously mentioned, commitment described the enjoyment of a task for the sake of the task itself. Passion for a job or task enables individuals to experience higher levels of self-motivation since they derive pleasure solely from doing the task well, which is noted as an exclusively intrinsic source of motivation.

Given Petrides' definition of self-motivation as previously discussed, test item 9 might have attempted to operationalise self-motivation by drawing on its relationship with persistence (element 8). Individuals with higher levels of persistence and therefore higher levels of self-motivation are expected to remain interested in what they do for a longer period of time. If this was the test author's intention with the design of the test item, it could be said that a more focused operationalisation of self-motivation would have taken place if the wording of the test item was slightly amended. This observation is made in respect of the grammatical structure of the test item. As it stands, the test item is particularly ambiguous, which can result in vastly different interpretations. The first potential interpretation of the test item can lead individuals to understand that the test item refers to the speed with which they lose interest in a task. In this case, losing interest is a matter of time, as possibly regulated by personal levels of persistence. In such a case, the test item succeeds in measuring self-motivation via one of the elements described in figure 1. However, a variable such as attention span or the ability to sustain high levels of concentration for an extended period of time are also relevant, yet misdirecting, possibilities along this line of interpretation. The alternative interpretation puts forth the understanding that individuals lose interest in response to the level of engagement the task offers. In such a case, the loss of interest is attributable to low task engagement or task difficulty that is either too low or too high.

The last test item in the self-motivation facet operationalises self-motivation in terms of the extent to which an individual requires a reward or another form of extrinsic motivation in order to do their best. Element 3 (achievement drive) provides a clear theoretical basis for the operationalisation of self-motivation as it emerged from the El literature.

In summary of the foregoing evaluation of the self-motivation test items, it was clear that for the most part, the test items operationalised self-motivation in a way that was reasonably well aligned with the definitions of self-motivation provided by the trait and mixed models of EI as well as the general motivational theories. However, some test items were somewhat obscure in their operationalisation of self-motivation for the following three reasons:

- 1) The test item did not make clear reference to any of the elements in the framework.
- The test item contained ambiguous information that did not clearly demonstrate the behaviour in question, or,
- The test item lacked a clear conceptual focus given its openness to construct irrelevant influences such as situational or personal circumstances surrounding a task.

#### 2.7 CHAPTER SUMMARY

The present literature review discussed the development of the construct of EI to provide the necessary background for understanding the distinctions between ability, mixed-model and trait EI theory. The literature review revealed that that self-motivation was frequently hypothesised as a constituent construct of EI given its proposed relationships with constructs such as optimism, persistence, achievement drive, initiative and commitment. The definitions of self-motivation in EI literature were therefore consistent in as far as they referred to persistence and being driven to achieve one's goals. However, the definitions of self-motivation as presented in EI theory literature were in some instances substantially different from the definitions of intrinsic motivation provided by the general motivation literature, which suggested that intrinsic

motivation and self-motivation shared conceptual relationships, but that they were not interchangeable labels for the same motivational process. By definition, intrinsic motivation was brought about by the interest in a task and the spontaneous enjoyment following from engagement in the task (Deci & Ryan, 1985, 2008). Therefore, intrinsic motivation was theoretically independent from the elements of persistence, achievement drive and other definitive features of self-motivation as they emerged from EI theories. At best, intrinsic motivation might have promoted self-motivation where individual interest in a task was already present. However, a high degree of task interest was not a prerequisite for the experience of self-motivated behaviour.

With respect to the relationship between self-motivation as it emerged from EI theory and the general theories of motivation as discussed in earlier in this chapter, the fundamental difference between the two theoretical approaches resided in their view on the nature of motivational processes. Firstly, the general theories of motivation involved a number of variables, dispositions and appraisals such as task interest, task difficulty, task values and self-perceptions of competence that were not directly related to selfmotivation as defined and described by the eight core elements that emerged from the EI literature. The relationship between these factors and the expression of selfmotivation in EI literature was unclear. This is however not surprising since the general theories of motivation were almost exclusively cognitive in nature, which positioned them outside the theoretical context of self-motivation in EI theory. Petrides (2009) defined trait EI and its constituent constructs as personality traits and not cognitive abilities, which therefore positioned self-motivation outside the domain of cognitive ability, and therefore also outside the domain of the general theories of motivation. Therefore, the general motivational theories were not entirely suitable to provide theoretical justifications for the operationalisation of self-motivation in the test items.

Against the theoretical background presented in this chapter, the next chapter discusses the methodological approach employed in the present study.

#### **CHAPTER 3: RESEARCH METHODOLOGY**

#### **3.1 INTRODUCTION**

The present study aimed to explore the item content in the self-motivation facet of the TEIQue in South Africa. This chapter outlines the conceptualisation of the study and its theoretical foundations, followed by a brief discussion of the research methodology, the study population, the method of sampling, the method of data collection and the data analysis. The chapter concludes with a discussion of the relevant ethical issues and considerations.

#### **3.2 THE RESEARCH PARADIGM**

Provided with the research questions as informed by the various international validation studies discussed in chapter 1, the present study was designed and approached from a constructivist paradigm. The researcher understood that the various backgrounds, experiences and assumptions of the respondents shaped their experience of the phenomenon in question, and in doing so constructed multiple realities that were not static, but multifaceted and subject to change (Hennink, Hutter and Baily, 2010). During the semi-structured interviews, respondents shared their interpretations, perspectives and experiences as elicited by evaluations of the self-motivation test items. Therefore, the purpose of the present study was aligned with the primary ontological assumption of a constructivist approach which was that realities were socially constructed (Mertens, 2005). The resultant individual constructions were hermeneutically refined, compared and contrasted which allowed the researcher to develop a coherent view of the researcher.

problem as it unfolded, whilst also being led by existing theory (Creswell, 2013; Lincoln & Guba, 1985).

## 3.3 THE RESEARCH METHOD

#### 3.3.1 Qualitative exploratory-descriptive research

In line with a constructivist research approach, the present study employed a qualitative exploratory-descriptive approach that aimed to offer insight into the item homogeneity of the self-motivation facet of the TEIQue for a South African sample. This evaluation was motivated by the international cross-cultural validity studies concerned with the internal structure of the self-motivation fact of the TEIQue (Bogdan & Biklen, 1998; Mertens, 2005: Silverman, 2013).

By evaluating the response processes engaged in by respondents when they answered questions about the interpretation of the test item and what the test item measured, the researcher assessed the fit between the construct and the test items (AERA et al., 1999). This particular approach furthermore provided the opportunity to record the possible interference of construct irrelevant factors at the level of the test item such as words or phrases that could possibly weaken the construct validity of the instrument (Leighton & Gokiert, 2005; Rico, Dios & Ruch, 2012).

A qualitative approach was employed given its ability to provide rich data that is situation-specific, descriptive and cognisant of actions and events (Babbie & Mouton, 2001; De Vos, Strydom, Fouchè & Delport, 2002). The approach furthermore offered the opportunity to understand how the values, opinions and behaviours of the respondents possibly influenced their interpretation of the test item, and thus affect the

ultimate validity and reliability of the test items (Mack, Woodsong, MacQueen, Guest and Namey, 2005).

#### 3.3.2 Validity and reliability

Given the qualitative exploratory-descriptive nature of the study, the transferability and generalisability of the findings in this study to other groups or contexts was not considered the central criteria for establishing the trustworthiness of the data. As such the validity and reliability of the present study was discussed in terms of its truth-value, consistency and neutrality.

According to De Vos (1998) the credibility of the findings was necessary to establish their truth-value. The truth-value of the findings was supported by the co-reviewer of this study who carefully examined the accuracy of the thematic categories derived from the data.

Krefting (1991) stated that the dependability of the findings were to be assessed by determining the consistency of the research process and the resultant findings. In this regard, the consistency of the research was supported by an independent co-reviewer who supervised the coding procedures as well as a research supervisor who monitored the research plan and its implementation. The dependability of the findings and replicability of the study were also supported by the detailed descriptions of the research method, the data collection procedures and the data analysis techniques employed in this study.

The neutrality component of qualitative research was primarily established by the extent to which the data confirmed the general findings of the study and led to the implications thereof (De Vos, 1998). The neutrality of this study was supported in two ways. Firstly, by subjecting the study to review by the research supervisor who followed the development and execution of the research to understand how and why certain decisions were made. Secondly, the researcher employed reflexive analysis throughout the duration of the research by discussing the data gathering and data analysis processes with his colleagues and research supervisor. This was done in order to create an awareness of how his own perspectives, assumptions and characteristics could influence the data gathering and data analysis, and in doing so lead to inaccurate interpretations of the data.

## 3.3.3 The unit of measurement

The present research was conducted from a constructivist paradigm which viewed knowledge as the product of social constructions that were subject to change (Golafshani, 2003; Mertens, 2005). Therefore the unit of measurement in the present study was the individual responses to the self-motivation test items as framed by each respondent's personal, linguistic and cultural background. The focus of the content analyses was therefore on the content and meaning of the individual responses as it related to the comprehension and interpretation of the test items, as well as the respondents' subjective judgment of the extent to which the test items effectively and accurately measured self-motivation.

# 3.4 RESPONDENTS AND SAMPLING

The respondents for this study were drawn from the existing client database of the test publisher of the TEIQue in South Africa. The TEIQue, as previously discussed, is one of a series of psychometric and assessment instruments used by the organisation. The database and the sample parameters described in the database can therefore not be regarded as representative of the South African population at large. Instead, this database was representative only of the profile of individuals who have completed the TEIQue as part of on-going recruitment and development processes. The South African database contained (n = 1.673) individuals who have completed the TEIQue.

The sample for the present study was drawn from four first-language groups as they appeared in the South African TEIQue database. The sample is outlined in table 8.

| First-language Group | Total (n = 1 673) | Percentage of standardisation sample |
|----------------------|-------------------|--------------------------------------|
| English              | 644               | 38%                                  |
| African              | 547               | 33%                                  |
| Afrikaans            | 434               | 26%                                  |
| Other                | 48                | 3%                                   |

 Table 8: The first-language groups in the South African TEIQue normative database

Against the background of the international cross-cultural validation studies of the TEIQue presented in chapter 1, the sample for the present study was drawn using purposive sampling which enabled the composition of a multi-lingual and multi-cultural sample that could best inform the research questions since it included respondents from

all four of the first-language groups in the South African TEIQue database (Marshall, 1996). The resulting sample of twenty-seven respondents interviewed for the present study is indicated in table 9.

| First-language Group | Total (n = 27) | % of qualitative sample |
|----------------------|----------------|-------------------------|
| English              | 15             | 56%                     |
| African              | 7              | 26%                     |
| Afrikaans            | 4              | 15%                     |
| Other                | 1              | 5%                      |

 Table 9: The first-language groups in the current sample

The sample consisted primarily of respondents from an English first-language group, followed by an African first-language group, and so forth.

A summary of the biographical details of the sample for the present study are illustrated in Table 10. More biographical details on each of the individual respondents can be found in Appendix A.

| Table 10: Biographical details | of respondents in th | ne present study (n = 27) |
|--------------------------------|----------------------|---------------------------|
|--------------------------------|----------------------|---------------------------|

|        |             | Ν  | %  |
|--------|-------------|----|----|
| Gender | Male        | 11 | 41 |
| Gender | Female      | 16 | 59 |
| Age    | 20-29 years | 10 | 37 |
|        | 30-39 years | 12 | 44 |

|                                | 40-49 years             | 4  | 15 |
|--------------------------------|-------------------------|----|----|
|                                | 50-59 years             | 1  | 4  |
|                                | Black                   | 7  | 11 |
| Race                           | White                   | 16 | 70 |
|                                | Coloured                | 2  | 4  |
|                                | Indian                  | 2  | 4  |
|                                | Afrikaans               | 4  | 14 |
|                                | English                 | 15 | 56 |
|                                | Ndebele                 | 1  | 4  |
|                                | Sotho                   | 1  | 4  |
| First-language                 | South Indian            | 1  | 4  |
| i not language                 | Tsonga                  | 1  | 4  |
|                                | Tswana                  | 1  | 4  |
|                                | Venda                   | 1  | 4  |
|                                | Xhosa                   | 1  | 4  |
|                                | Zulu                    | 1  | 4  |
|                                | I did not study further | 1  | 4  |
|                                | 3 – 6 month Diploma     | 2  | 7  |
| Highest qualification obtained | 1 – 2 year Diploma      | 10 | 37 |
|                                | 3 year Diploma          | 3  | 11 |
|                                | Bachelors Degree        | 6  | 22 |
|                                | Honours Degree          | 1  | 4  |
|                                | Masters Degree          | 1  | 4  |
|                                | Missing                 | 3  | 11 |

## 3.4.1 Discussion of the sample

The respondents' ages ranged from twenty-two to fifty-nine years of age. The mean age of the sample was thirty-three years. The gender distribution of the sample indicated a majority representation by females (fifty-nine percent). Regarding their first-language, most respondents indicated English as their first-language, thereby representing fifty-six percent of the sample. The racial profile of the sample consisted of black, white coloured and Indian respondents, with white respondents representing the majority of the sample. The educational status of the respondents ranged from no tertiary education to attaining a Master's degree. The majority of respondents attained a 1 - 2 year Diploma. Three respondents did not state their highest level of education obtained.

# 3.5 DATA COLLECTION AND PROCEDURE

As per the ethical requirements and recommendations for research stipulated by the HPCSA (2002), the respondents were contacted by means of the contact information provided by them at the time of their assessment. The respondents were contacted telephonically, after which a letter of invitation to partake in the research was sent to each respondent via e-mail. In the letter, the respondents were informed about the exact nature and purpose of the research, and asked to provide their informed consent to participate in the research as illustrated in Appendix B (Krueger, 1994).

Respondents were again contacted telephonically to confirm their interview appointment. Where required, respondents were interviewed at their place of employment or at their homes. The next section of the discussion details the process by

which the respondents were exposed to the test items and how their answers were captured, transcribed and subsequently organised for analysis purposes.

The ten test items which comprised the self-motivation facet of the TEIQue were each copied verbatim from the test, and compiled in a folder. Each of the ten pages in the folder contained one test item only. Accompanying each test item was the 7-point Likert scale used in the TEIQue to indicate the extent to which a respondent agreed or disagreed that the test item was representative of their typical behaviour. Respondents were reminded that across all ten test items, a rating of one on the scale indicated strong disagreement with the test item, and a rating of seven indicated strong agreement with the test item. The ten test items of the self-motivation facet were exposed in the order they appear in the TEIQue to ensure consistency with the test itself. The entire interview was recorded with a digital recording device and started with each respondent reading the test item out loud from the test sheet provided. This was followed by the researcher asking questions from the set of standardised questions contained in the semi-structured interview guide. The respondents were asked to read the test item out aloud so that any difficulties with the pronunciation of words, any omission of words, hesitation or pausing before saying certain words, could be identified. Where respondents displayed any of the aforementioned difficulties, they were instructed to read the test item again. In most cases, the respondents recognised their omissions on the second reading of the test item and adjusted their interpretation accordingly. If a respondent continued to omit words after having read the test item twice, the researcher pointed out the omission to the respondent, and the semistructured interviewed continued based on a complete and accurate reading of the test item. In cases where respondents did not understand the meaning of a word (e.g.

'effortlessly') they were first asked to provide their own understanding of the word. Where necessary, the researcher provided the correct meaning of the word and the semi-structured interviewed continued on a correct understanding of the meaning of the word. All cases that involved the intervention by the researcher as necessitated by the problems described above were comprehensively documented in terms of the nature of the problem, the frequency of occurrence in the study as well as the specific test item to which the problem related. Questions 1 through to Question 5 listed in table 11 were presented in a rotated order to the respondent in order to minimise monotony and respondent fatigue. Questions 6 through to Question 10 were asked in sequence.

| Table 11: Semi-structured interview guide followed for the self-motivation test |
|---|
| items   |

| the<br>items  | 1  | CORE QUESTION <sup>2</sup> : What do you think I want to know from you if I give you this statement?   |
|---|----|--|
| sked in<br>tivation   | 2  | CORE QUESTION: What is this statement trying to measure in an individual?  |
| e self-mot  | 3  | If person A had to give themselves a "one" for this statement,<br>meaning that they strongly disagree with the statement, how<br>would you describe that individual? |
| Standard questions asked in the evaluation of the self-motivation items             | 4  | If person A had to give themselves a "seven" for this statement,<br>meaning that they strongly agree with the statement, how<br>would you describe that individual?  |
| Stal<br>evalua  | 5  | What is your own personal rating for this statement?   |
| the<br>i test   | 6  | Now that we have come to the end of the interview, are these statements related in any way?  |
| ns asked after the<br>self-motivation test  | 7  | Can you tell me if any of these statements were difficult to understand or ambiguous or contained difficult words?   |
| ns aske<br>self-mo  | 8  | If I was to tell you that they were all written to test one thing in an individual, what do you think that would be?   |
| Standard questions asked after the<br>evaluation of the self-motivation te<br>items | 9  | If I was to tell you that they were all written to test self-<br>motivation, how well, or not, do you think they are measuring<br>self-motivation?                   |
| Standard que<br>evaluation of<br>items  | 10 | Please can you give me your own definition of self-motivation?   |

Throughout the discussion, the researcher referred to the test item as statements rather than test items with the purpose to reinforce the respondents' understanding that there

<sup>&</sup>lt;sup>2</sup> Questions 1 and 2 were considered core questions since they most closely informed the research question as described in chapter 1.

were no right or wrong answers to the questions. Question 1 was designed to evaluate the respondents' basic comprehension of the test item, reflecting their literal understanding of what was being asked. In addition, the response to this first question indicated the presence of any problems with the language used by the test developer.

The purpose of Question 2 was to elicit information with regards to the construct perceived to be measured by the test item. The answer provided by the respondent indicated the accuracy of the test item's intended operationalisation of self-motivation. Questions 3 and 4 were asked alternately between evaluations of the respective test items. Questions 3 and 4 offered the respondent the opportunity to interpret the test items in terms of an extreme rating (either one or seven; strongly disagree or agree), which emphasised their perception of the specific behaviour that accompanied the particular rating. Therefore, the behaviour perceived to be described by the test item and the construct it measured could be compared. Finally, Questions 3 and 4 offered the researcher insight into the difficulties experienced with negatively phrased and inversely scored test items.

Question 5 asked the respondents to apply the test item to themselves as they did at the time of taking the test. This allowed the researcher insight into the respondents' own perceived level of self-motivation as it was operationalised by the test item. Question 5 was also particularly valuable in evaluating the understanding of test items 6 and 7 since both test items employed the same operationalisation of self-motivation, however, test item 7 was negatively phrased. Therefore it should follow logically that a directionally higher rating on test item 6 should be accompanied by a directionally lower rating on test item 7, and vice versa. Question 6 was asked after the evaluation of the

ten test items in order to ascertain the degree to which the respondent felt that the test items were related and therefore demonstrative of a uniform measurement of selfmotivation. Question 6 further offered the value of making the aforementioned observation in a case where the test items were all presented together, and not dispersed among the test items that measured the other facets of trait El. Whilst any non-verbal cues indicative of problems experienced with grammar or vocabulary were recorded throughout the discussion of the test items, Question 7 was an explicit attempt to gather information regarding any difficulty experienced with the grammar or vocabulary used in the test item.

Question 8 served as an extension of Question 6 by focusing the respondent's evaluation of the test item on the identification of a single latent construct. Question 9 elicited information about the respondent's opinion on the fit between the test item and its measurement of self-motivation. Question 10 concluded the interview by asking respondents to provide their own definition of self-motivation. This was done to explore the conceptual framework within which the construct operated, and also to provide information about the potential values or cultural norms or behaviours that might have shaped their conceptualisation of self-motivation. The resultant definitions of self-motivation of self-motivation in trait EI as discussed in chapter 2.

## **3.6 DATA ANALYSIS**

Qualitative data in the form of textual information were obtained from twenty-seven semi-structured interviews conducted with respondents in the South African TEIQue database. The respondents' answers were transcribed from the digital recording of the interview and analysed using content analysis. Hsieh and Shannon (2005, p. 1278) defined as content analysis as: "a research method for the subjective interpretation of the content of text data through the systematic classification process of coding and identifying themes or patterns".

Content analysis was well suited to analyse the ten test items of the self-motivation facet as it addressed the core questions generated from the former empirical research (Zhang & Wildemuth, 2009), whilst also providing insight into the processes by which individuals constructed the meaning of self-motivation within their own cultural and linguistic frameworks. Hsieh and Shannon (2005) referred to conventional, directed and summative content analysis. For the purposes of this research, summative content analyses were conducted since it allowed the researcher to understand the meaning of words or phrases within the contexts they were used by the respondents (Hsieh & Shannon, 2005). The process started with a recording of the frequency of specific types of content in the textual data. The recording of content in the textual data was followed by the interpretation of the data in order to provide an analysis of the latent content of the data. Summative content analysis thus employed both a quantitative and qualitative approach to the evaluation of the data.

The various steps followed for conducting a summative content analysis (Hsieh & Shannon, 2005) of the text generated by the semi-structured in-depth interviews, are summarised below.

## Step 1: Preparation of the data

The data obtained from the twenty-seven interviews were transcribed verbatim, with all verbalisations included. As such, provision was made for recording observations such as pauses, sounds and other audible behaviours. The consideration for including the latter stemmed from the importance of recording any difficulty experienced by the respondents when they read the test item, or difficulty experienced with the pronunciation of the words in a test item. The data were captured in Microsoft Excel, with the interviewer's text in one column, and the respondent's answers in another. An example of this method of interview transcription and data capturing is provided in Appendix C. Each test item was discussed on a single Microsoft Excel sheet, with the discussion on any one particular test item running down the spread sheet. Each sheet therefore contained all the respondents' answers in response to test item 1 only. Sheet 2 contained all the respondents' answers in response to test item 2 only. This particular method of data organisation was employed since it allowed the researcher to become immersed in all the data associated with a particular test item and so form a holistic view of all the answers in response to the test item before the researcher continued to the next test item (Tesch, 1990). An example of this layout is provided in Appendix D.

#### Step 2: Defining the units of analysis

"The unit of analysis refers to the basic unit of text to be classified during content analysis" (Zhang & Wildemuth, 2009, p. 3). The units of analysis in this study were mainly treated as quantitative in nature. The units of analysis were provided by the actual answers to the different questions, such as *what do you think this statement is trying to measure?* (Question 2). It is important to point out that whilst there were

twenty-seven respondents who participated in the study, there were often more than one unit extracted from respondents' answers and therefore the number of units often exceeded the total sample size of twenty-seven respondents. For example, where a respondent was asked what they thought a particular test item measured, they could answer that it measured happiness, or optimism, or perhaps a person's general outlook on life. In such cases, the answer contained three constructs or elements, and all three answers were considered as themes in themselves and coded accordingly.

# Step 3: Category development

As previously stated, the categories were developed deductively from the data as the themes emerged. Therefore, emergent coding was used, as is often the case when describing the existence of particular phenomena (Zhang & Wildemuth, 2009).

A prerequisite for categories and coding frames was that they had to be as internally homogenous (mutually exhaustive), and externally heterogeneous (mutually exclusive) as possible (Tesch, 1990; Weber, 1990) so that they would not violate the assumptions of statistical procedures intended to test the reliability of the data at a later stage. In order to meet this requirement, an example of the units coded for test item 4 in response to Questions 1 and 2 is provided in Appendix E and F respectively.

#### Step 4: Test the Categories on a sample of text

The categories were reviewed for consistency by a registered Research Psychologist who provided feedback on the extracted themes. The feedback was implemented and all the text was re-coded.

#### Step 5: Code all the text

After an adequate coding consistency was achieved, the entire set of twenty-seven interviews were categorised and coded. In terms of this process, the first step was to identify each specific question in the text of the interviewer, and insert the respondent's verbatim response to Question 1 in the cell next to the interviewer's text. The respondent's answer was then read, and the various answers given in response to the guestion were extracted as units to be coded. Units extracted in response to Question 1 were labelled as P1. The same procedure applied to Question 2, in which case a respondent's answer to Question 2 was labelled P2. This procedure was applied to all the questions in the interview guide. Since the data for a single test item across all interviews were organised as running down a single spread sheet, all the units extracted in response to a question was available in a single sheet. Once all the respondents' answers to all the questions on test item 1 were labelled, the column containing the label and associated units were sorted so that all P1's, P2's and so forth were organised together. Once all similar labels were grouped together, the coding commenced and occurred on the basis of categorising units with similar meanings together as themes, which ensured that the themes were mutually exclusive and exhaustive. Once all the units were coded in their respective themes, the number of units comprising the particular theme were counted and divided by the total number of units extracted in response to that particular question. This allowed the researcher to indicate the size of each theme as a percentage. This process was repeated for each of the ten questions on all ten of the self-motivation test items across all twenty-seven interviews.

#### Step 6: Re-assessment of coding consistency

Following the initial evaluation of the coding consistency, new sets of coded data were reviewed externally by the same Research Psychologist.

### Step 7: Interpretation of the data

The data were then interpreted against the objectives set by the research questions provided in chapter 1. The findings of this analysis are presented in chapter 5.

## **3.7 ETHICAL CONSIDERATIONS**

In conducting the present research, the researcher followed the procedures outlined in the Policy of Research Ethics from UNISA and the HPCSA (2002). All respondents were provided with a clear brief on the nature and purpose of the research as well as a clarification of their role in participating in the study. Respondents were asked if they were aware and comfortable with the fact that their discussions of the test items were recorded for analysis purposes. Respondents were also informed that they could withdraw at any time and that a joint decision would be made on what to do with the collected data once they have stated their desire to withdraw from the study. Complete confidentiality was ensured through the use of pseudonyms and the identities of the respondents were not to be revealed without their permission.

## **3.8 CHAPTER SUMMARY**

This chapter outlined the aim of this study and provided an understanding of the methodological approach employed for the purpose of achieving this aim. Reference was made to the research procedures and to the relevant ethical considerations. The

following chapter reports the results obtained from the content analyses of the ten test items of the TEIQue self-motivation facet.

**CHAPTER 4: RESULTS OF ANALYSIS AND DISCUSSION** 

The aim of this chapter is to present the results of the content analysis as described in chapter 3. This discussion follows the same order in which the interview questions were asked for each of the ten self-motivation test items. As such, the discussion of each of the test items starts with a presentation of the results of the content analysis in the form of a summative categorisation of the main themes extracted in response to the core questions (Question 1 and 2). The results of the remainder of the questions asked in the evaluation of the test items (Questions 3, 4 and 5) are integrated into the discussion of the content as described above, the discussion ends with an evaluation of the results of the summative content as described above, the discussion ends with an evaluation theories discussed in chapter 2.

The results of Questions 6 through to Question 9 are presented last. The chapter concludes with the respondents' definitions of self-motivation (Question 10) which reveal the latent content of the results against the background of the EI theories (Baron, 1997; Goleman, 1998; Mayer & Salovey, 1997; Petrides & Furnham, 2001; Salovey & Mayer, 1990) and general motivational theories (Broussard & Garrison, 2004) discussed in chapter 2.

# 4.1 RESULTS AND DISCUSSION OF TEST ITEM 1

In test item 1, self-motivation was operationalised by asking the respondent to indicate to what extent they had to be under pressure to work hard. Those respondents who indicated a strong agreement with the statement were scored as less self-motivated, and those who indicated strong disagreement with the statement as more selfmotivated.

# Table 12: Thematic categories for test item 1 in response to Question 1

# Question 1: What do you think I want to know from you if I give you this statement?

| Emerging themes  | Number of units constituting theme | Size of theme (%) |  |
|--|------------------------------------|-------------------|--|
| <ol> <li>"If" [conditional] or "how<br/>much" [degree] of<br/>pressure I have to be<br/>under in order to work<br/>hard</li> </ol> | 17                                 | 30%               |  |
| <ol> <li>If I have the ability to work<br/>under stress or pressure</li> </ol>   | 14                                 | 25%               |  |
| 3) If I am self-motivated  | 5                                  | 9%                |  |
| <ol> <li>If working under pressure<br/>enhances my<br/>performance</li> </ol>  | 4                                  | 7%                |  |
| <ol> <li>If pressure motivates me<br/>(to really work hard)</li> </ol>   | 4                                  | 7%                |  |
| 6) Other   | 4                                  | 7%                |  |
| 7) What motivates me   | 3                                  | 5%                |  |
| <ol> <li>8) If I have a preference for,<br/>or enjoy working under<br/>pressure</li> </ol>   | 3                                  | 5%                |  |
| 9) How to manage my motivation   | 2                                  | 4%                |  |

(Total units coded: n = 56)

In terms of the content analysis, it was clear that there were a large number of themes extracted in response to Question 1. This indicated that the test item elicited many different interpretations from respondents, thus lacking in its ability to elicit a uniform interpretation and understanding of the test item. The predominant understanding of the test item was that it asked if one had to be under pressure to really work hard, thereby positioning pressure as a condition or motivation necessary for doing hard work. Respondent 9 provided a good example of this view on the meaning of the test item: "Ok. This could mean two things. I don't know what I would choose in this situation, but it says there that you got to be under pressure to really work hard. So I don't know if the pressure is the motivation, or they were saying that pressure works as a catalyst, and increases the amount that you work. I personally would guess that if I had to read this I would assume the former. Although having said that, it's difficult to place this out of context".

Another interpretation of this test item indicated that some respondents required pressure to work really hard since they did not find their daily tasks challenging or stimulating enough. This observation pointed to the complex interaction between pressure, task interest, task difficulty and self-motivation.

Some respondents indicated that they enjoyed pressure and actively sought to manipulate situations in such a way that they could create pressure for themselves, which they thought would then enhance their performance. In this regard, procrastination to the point of having very limited time to execute a task was a common technique used to create the pressure required to do the task in the first place, and to do it well. This process was very well described by Respondent 22: "Yes, my point of

view is that I must be under pressure to really work hard...I mean there are different individuals - others don't like to be under pressure. Like, for example, I like to be under pressure. That pressure is the only way for me that I can keep focus [sic]. Like I could do something, and I can be really good at it, and then, then maybe after two months or so I am so bored. I want a new challenge". This verbatim response again clearly illustrated how the possible influence of constructs such as work engagement, task interest and task difficulty may confound the test item's measurement of self-motivation.

Respondent 16 provided another view on the supportive role of pressure: "Again, I put it down to this - not everything has to be goal-orientated, but for me, I know where I want to go in life. I have goals, and when I don't achieve those goals I am quite upset with myself. To have pressure is... how can I say...it doesn't make achieving goals easier, but more visual. If I am pressurised, I know why am I pressurised and know I am pressurised because I want to get a bursary, for example". In light of the role of pressure in this regard, it was not surprising that a third of the sample indicated to some extent that they have to be under pressure to really work hard. This understanding was closely followed by the interpretation that the test item asked if a person had the ability to work under pressure. Respondent 11: "I think you want to know, how I work under pressure. How I deal with that. I think it is comfortable for me, because that's when you can see what you can do".

Looking at Question 2, it was clear that there was a fair degree of agreement between what respondents thought the statement asked of them and what they thought it subsequently measured. In both cases though, self-motivation or motivation did not emerge as the primary construct in response to Questions 1 and 2. Instead, following the main theme that consisted of various constructs or concepts such as a person's attitude, dedication to their work, drive, ambition, planning abilities and so forth, the test item most frequently reflected a measurement of a person's ability to work under pressure.

# Table 13: Thematic categories for test item 1 in response to Question 2

# Question 2: What is this statement trying to measure in an individual?

| Emerging themes   | Number of units constituting theme | Size of theme (%) |  |
|---|------------------------------------|-------------------|--|
| 1) Other  | 12                                 | 27%               |  |
| <ol> <li>Ability to work under<br/>pressure</li> </ol>                                  | 9                                  | 20%               |  |
| <ol> <li>"If" or "how much"<br/>pressure I have to be<br/>under to work hard</li> </ol> | 6                                  | 13%               |  |
| 4) What motivates me  | 6                                  | 13%               |  |
| 5) My self-motivation   | 3                                  | 7%                |  |
| 6) Productivity   | 3                                  | 7%                |  |
| <ol> <li>If I have a preference for,<br/>or enjoy working under<br/>pressure</li> </ol> | 2                                  | 4%                |  |
| 8) Laziness   | 2                                  | 4%                |  |
| 9) My performance under stress or pressure  | 2                                  | 4%                |  |

# (Total units coded: n = 45)

The understanding that the test item measured a person's ability to cope with or work under pressure might have been driven by the generally accepted fact that this skill is highly valued in the modern working environment. Twelve Respondents (fourty-four percent) disagreed with the statement because they could cope with pressure, and still work hard. Deadlines and time limits were noted as the most frequently mentioned types or sources of pressure (thirty-nine percent). This was followed by having to meet other individuals' expectations of oneself (seventeen percent). Looking at the complete set of pressures, it was clear that most of these pressures were extrinsically located work-related pressures, with fewer pressures of a personal or intrinsic nature being present.

As this test item also indicated strong evidence for the measurement of an individual's ability to cope with pressure, it was likely to be more relevant to the measurement of stress management, one of the constructs also measured in the TEIQue, than to the measurement of self-motivation as such.

In terms of Questions 3 and 4, where respondents were asked what they would interpret other individuals to be saying of them if they strongly agreed or disagreed with the statement, they indicated that a low rating on this statement could have positive or negative meanings. On the positive side, it was suggestive of the ability to work hard without having to be put under pressure to do so, or having a strong ability to cope under pressure. On the negative side, some respondents noted that it would mean that they cannot work under pressure. Where individuals strongly agreed with the statement, the respondents viewed such a person as lacking in their dedication to their work and as such would have to be under pressure to work hard.

## 4.1.2 Re-evaluation of test item 1 in terms of EI and motivational theories

In chapter 2, the researcher evaluated the present test-test item's operationalisation of self-motivation against a summary of the key descriptions and definitions of self-motivation within the theoretical framework of El. It was found that the present test-test item's operationalisation of self-motivation was justified within the theoretical framework of trait El. However, in terms of the results presented here, the test item did not operationalise self-motivation within the framework of El theory as expected.

Self-determination theory (SDT) as discussed in Chapter 2 offered a noteworthy perspective on the operationalisation of motivation in this test item. SDT described what was referred to as autonomous motivation, controlled motivation and amotivation. Autonomous motivation referred to the source of volition as internal, and was therefore related to the concept of initiative in the EI literature.

When individuals experienced pressure to behave in a certain way, they no longer acted autonomously or of their own initiative, but instead were controlled by an external factor, such as pressure. In the evaluation of test item 1, respondents indicated that the test item asked whether they had to be under pressure to work hard, or how much pressure they had to be under in order to work hard. This response suggested the possible operationalisation of a type of extrinsic motivation, in this case controlled (extrinsic) motivation as described in SDT. Controlled or extrinsic motivation referred to behaviour that was externally regulated and affected by the degree to which the individual endorsed the reasons for doing an activity. The evidence suggestive of a possible lack of task engagement, or the necessity to create pressure in order to enhance performance thus pointed toward the introjected regulation of behaviour.

From the vantage point of SDT then, the circuitous way of measuring self-motivation through the description of the extrinsic motivational process described in test item 1 perhaps better represented an operationalisation of the type of *extrinsic* motivation involved as opposed to degree of self-motivation present in an individual. This was especially plausible given the test item's underlying assumption that self-motivation was absent to the degree that an extrinsically motivating force was in operation, thus assuming the relationship between extrinsic motivation and self-motivation to be dichotomous in nature. The former assumption did not align with the motivational continuum described in SDT since self-motivation and amotivation were positioned on the opposite ends of the continuum with degrees of extrinsic motivation positioned in between. Extrinsic motivation was not positioned as the opposite of self-motivation.

# 4.2 RESULTS AND DISCUSSION OF TEST ITEM 2

Test item 2 operationalised self-motivation by asking respondents to what degree they found it difficult to motivate themselves. Respondents who indicated a strong agreement with the statement were scored as less self-motivated, and those who indicated a strong disagreement with the statement as more self-motivated. More than half of the sample in the present study indicated, although to varying degrees, that they disagreed with this statement. Looking at table 14, test item 2 presented few difficulties in terms of its understanding as indicated by the high incidence of self-motivation in response to Question 1.

# Table 14: Thematic categories for test item 2 in response to Question 1 Question 1: What do you think I want to know from you if I give you this statement?

(Total units coded: n = 46)

| Emerging themes   | Number of units<br>constituting theme | Size of theme (%) |  |
|---|---------------------------------------|-------------------|--|
| 1) Other  | 10                                    | 22%               |  |
| 2) If I am self-motivated   | 9                                     | 20%               |  |
| <ol> <li>If I find it difficult to keep<br/>myself motivated</li> </ol> | 9                                     | 20%               |  |
| <ol> <li>If I need external factors to<br/>motivate me</li> </ol>       | 6                                     | 13%               |  |
| 5) What motivates me  | 5                                     | 11%               |  |
| 6) If I am motivated  | 5                                     | 11%               |  |
| 7) If I am focused  | 2                                     | 4%                |  |

The main theme consisted of a variety of distinct concepts possibly related to selfmotivation such as depression and optimism. Depression was mentioned by Respondent 13 when he stated that an individual was likely suffering from depression if they found it difficult to motivate themselves: "You want to know if I am depressive [sic] or not, because that would be a symptom of depression. Someone's not enthusiastic about anything". Optimism was also mentioned in response to Question 1 for this test item, which Respondent 14 described as follows: "No, I don't find it difficult, I don't find it difficult, you know. To motivate yourself, it's something that you just have to be positive every time with yourself. Yes, so if you are positive with your life and with yourself every morning, you wake up, if I may put it in that way". The remainder of the responses included references made to concepts such as task interest, initiative, momentum and locus of control, which indicated that the test item solicited various constructs or concepts that shared some relation to self-motivation. The third theme was represented by respondents merely rewording the test item to become a question of whether a person found it difficult to keep themselves motivated. Themes four and five indicated the understanding that the test item was asking about the absence or presence of external motivating factors as well as what the nature of those motivating factors were. "Hmm, I think they would want to know whether or not you need an external motivating factor, to keep you focused or to keep you going in terms of, you know, meeting whatever deadline that you might have" (Respondent 7).

Theme six indicated that respondents did make the distinction between being motivated and being self-motivated. When merely motivated, reference was made to a combination of extrinsic and intrinsic sources of motivation as illustrated by Respondent 20: "You want to know what really pushes me to have a very good day ahead. What really drives me to have a very good day - in the sense that. I mean, for other individuals to come to work, they just have to wake up because of money. For other individuals to have to come to work they have to wake up because of their passion for what they are doing. Other individuals, if they have to come to work it is because they are desperate, they're just doing it because out of favour you know - as long as it puts food on the table. They don't do it out of passion, out of love, or out of motivation". Given respondents' combined treatment of self-motivation and motivation, it was decided to code self-motivation and motivation as separate constructs unless explicit reference was made to the one or the other.

 Table 15: Thematic categories for test item 2 in response to Question 2

| Question 2: What is this statement trying to measure in a | ו an indi | ividual? |
|---|-----------|----------|
|---|-----------|----------|

| Emerging themes    | Number of units constituting theme | Size of theme (%) |
|--------------------|------------------------------------|-------------------|
| 1) Other           | 13                                 | 37%               |
| 2) Self-motivation | 8                                  | 23%               |
| 3) Motivation      | 6                                  | 17%               |
| 4) Perseverance    | 3                                  | 9%                |
| 5) Drive           | 3                                  | 9%                |
| 6) Happiness       | 2                                  | 6%                |

(Total units coded: n = 35)

In terms of responses to Question 2, the constructs thought to be measured by the test item matched the understanding expressed in Question 1. Following the main theme, which consisted of divergent constructs as self-discipline, ambition, optimism and so forth, test item 2 was thought to be a measurement of self-motivation. The measurement of motivation, perseverance and drive were indicated as the remaining constructs measured by the test item.

In terms of Question 3, individuals who gave themselves a very high score for the test item were predominantly viewed who were highly motivated. As seen previously, these responses were suggestive of a fairly literal interpretation of this test item. However, where individuals provided a very low rating for the test item, (Question 4), they were perceived as unhappy, not knowing what they want, depressed, or having low selfesteem. Questions 3 and 4 did not present any new information on how respondents interpreted the test items, but instead showed consistency in terms of the interpretation of the test item.

# 4.2.1 Re-evaluation of test item 2 in terms of EI and motivational theories

Provided with the results of the content analysis of responses to test item 2, it was clear that the findings were aligned with the definition provided by Petrides (2009), with the exception of a large number of responses which, albeit related to the construct in some ways, were mentioned inconsistently (Theme 1). As such, the test item functioned reasonably well in terms of its intended understanding and measurement of self-motivation as outlined in EI theory. With regards to the general motivational theories there was no specific theory that provided a theoretical basis for rejecting or supporting this test item's operationalisation of self-motivation.

# 4.3 RESULTS AND DISCUSSION OF TEST ITEM 3

Test item 3 operationalised self-motivation by asking respondents to indicate to what extent they had many reasons for not giving up easily. Where respondents agreed with the statement, it reflected higher levels of self-motivation whilst disagreement with the statement reflected lower levels of self-motivation. As with previous test items, the predominant understanding was marked by a variety of disparate constructs or concepts such as coping with emotions, locus of control, patience, self-efficacy and so forth. 
 Table 16: Thematic categories for test item 3 in response to Question 1

Question 1: What do you think I want to know from you if I give you this statement?

(Total units coded: n = 47)

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Other  | 11                                 | 23%               |
| 2) About my motivation  | 7                                  | 15%               |
| <ol> <li>If I have a reason for not<br/>giving up</li> </ol>          | 6                                  | 13%               |
| <ol> <li>If I am someone that<br/>easily gives up</li> </ol>          | 5                                  | 11%               |
| 5) Asks about my<br>determination                                     | 5                                  | 11%               |
| <ol> <li>Asks about my<br/>perseverance or<br/>persistence</li> </ol> | 4                                  | 9%                |
| <ol><li>Asks about my strengths,<br/>strength of will</li></ol>       | 3                                  | 6%                |
| <ol> <li>Asks about my reason to<br/>live</li> </ol>                  | 3                                  | 6%                |
| 9) Asks about my optimism   | 2                                  | 4%                |
| 10)Asks about my self-<br>motivation                                  | 1                                  | 2%                |

Responses to Question 1 indicated that motivation was more frequently mentioned than self-motivation. The remainder of the responses indicated that test item 3 asked about a person's determination, perseverance or persistence, which again aligned well with the behavioural definition of self-motivation in the TEIQue. In addition, test item 3 was also unique in the sense that it consistently elicited personal accounts of previous hardships and challenges that were successfully overcome. "It is has been a long road to where I am. I have never been permanently employed, and I have worked very hard to be permanently employed today. I have only worked for (employer) for two months when they decided to make it permanent. I think there are still seven or 8 individuals who are still temporary. But they saw the determination in me" (Respondent 22).

Looking at the themes that emerged in response to Question 2, the various constructs that emerged, all pointed towards a measurement of self-motivation, which trait EI theory defined as behaviour marked by perseverance, persistence and determination.

| Table 17: Thematic categories for test item 3 in response to Question 2 |
|---|
|---|

# Question 2: What is this statement trying to measure in an individual?

| Emerging themes                                  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| 1) Other   | 13                                 | 30%               |
| 2) Perseverance or<br>persistence                | 6                                  | 14%               |
| 3) Determination                                 | 6                                  | 14%               |
| 4) Optimism                                      | 4                                  | 9%                |
| 5) Motivation                                    | 4                                  | 9%                |
| 6) Strength of will                              | 3                                  | 7%                |
| <ol> <li>Strengths and<br/>weaknesses</li> </ol> | 3                                  | 7%                |
| 8) Drive   | 2                                  | 5%                |
| 9) Strength of character                         | 2                                  | 5%                |

(Total units coded: n = 43)

Responses to Questions 3 and 4 indicated that a person who strongly agreed with the statement was seen to be very persistent. Those individuals, who strongly disagreed with the statement, were described by as thinking badly of themselves, suffering from depression and lacking in strength of will and ambition.

Respondents were also asked to indicate what possible reasons there were in their personal lives for not giving up easily. Two thirds of the responses (sixty-three percent) could be considered as internally located reasons that regulated behaviour, such as the need for achievement, the need to grow and to promote self-actualisation. All of these would implicate the involvement of self-motivated behaviour. The remaining third were reasons that served more basic needs such as getting more money to support dependants and children, or finance personal loans. These reasons served as external regulations of motivated behaviour. "*My wife and my family are reasons for me to not give up easily. I am a very positive person. I like to see things through to the end. I like to finish it, because it makes me feel good. It makes me feel that I've done something well. I have persevered"* (Respondent 5). Note how this respondent made reference to conscientiousness, optimism, perseverance and doing something well in his response to this test item.

#### 4.3.1 Re-evaluation of test item 3 in terms of EI and motivational theories

In Chapter 2, the researcher pointed out that test item 3 did not have a clear position in the theoretical framework provided by EI theory in as far as it pertained to the role that reasons may play in the promotion of self-motivated behaviour. Given the definition of self-motivation in the EI literature however, the researcher speculated that the test item most likely attempted to measure self-motivation through the operationalisation of

persistence, which was an element in the theoretical framework of EI. Provided with the results as discussed here it was clear that the test item operationalised persistence to a large extent and that the test item's operationalisation of self-motivation was therefore theoretically justifiable, despite the lack of a conceptual, theoretical relationship between reasons and self-motivation in EI theory.

In terms of the general motivational theories discussed in Chapter 2, volition theory was relevant to the operationalisation of self-motivation in this test item given respondents' reference to the test items measurement of a person's strength of will. According to volition theory, motivation assisted with the identifications of goals, yet, it was volition that would determine how and if those goals were achieved since it was also associated to conscientiousness and self-discipline. None of the remaining motivational theories offered any further insights that rejected or supported this test item's operationalisation of self-motivation.

# 4.4 RESULTS AND DISCUSSION OF TEST ITEM 4

Test item 4 operationalised self-motivation by asking respondents to what extent they agreed that they would put effort (even) into things which were not really important. The test item thus made reference to activities that were not externally regulated by importance. Agreement with the statement reflected higher levels of self-motivation, whilst disagreement with the statement reflected lower levels of self-motivation.

The main theme in response to Question 1 contained a large number of divergent constructs or concepts, which indicated that respondents did not have a uniform understanding of what the test item asked of them. This theme contained responses

such as effective time management skills, attention to detail, the ability to prioritise and the ability to appropriately judge the relative importance of an activity, and so forth.

# Table 18: Thematic categories for test item 4 in response to Question 1

Question 1: What do you think I want to know from you if I give you this statement?

# (Total units coded: n = 37)

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Other  | 24                                 | 65%               |
| <ol> <li>If you will do well, focus<br/>on, or apply effort to tasks<br/>that are not important to<br/>you</li> </ol>                   | 7                                  | 19%               |
| <ol> <li>I am motivated to apply<br/>effort to tasks that are not<br/>important to me, but<br/>important to someone<br/>else</li> </ol> | 3                                  | 8%                |
| <ol> <li>If a person is a<br/>perfectionist</li> </ol>  | 2                                  | 5%                |
| 5) Attitude   | 1                                  | 3%                |

One reason for this interpretation stemmed from a misreading of the test item. During the interviews, nearly half of the respondents (fourty-four percent) omitted the word *even* upon their first reading of the test item which altered the meaning of the statement, as illustrated by Respondent 2: "*It's not a very flowing sentence. Maybe there's some* sort of punctuation missing or, maybe that 'even' needs to be moved. I would actually rephrase the sentence saying: I like putting effort into things, even if they are not really important. It is asking how much focus you give to things that are not, according to your

mind, important. So if you prioritise certain activities, and activities that are at the bottom of that priority list, do you give the same amount of focus, time, deliberation, and execution, that you give to items or activities that are at the top of your priority list?". The intention of the word *even* to be similar in meaning to the word *also* was not understood by respondents. A person's judgment of the relative importance of an activity was a central idea contained in responses constituting themes two and three. This finding was not entirely surprising given modern society's emphasis on effective time management, which followed as consequence of the constant juggle between multiple activities and obligations.

However limited to three responses, it was interesting to point out that Respondents 1, 7 and twenty-seven thought that the test item was a reflection of selfishness since it measured whether individuals would put effort into something that was not important to them, but perhaps important to someone else.

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Other  | 17                                 | 55%               |
| 2) Work ethic   | 5                                  | 16%               |
| 3) Ability to prioritise  | 4                                  | 13%               |
| <ol> <li>Effort put into things that<br/>are not important</li> </ol> | 3                                  | 10%               |

(Total units coded: n = 43)

As with the responses to Question 1, the primary understanding consisted of a set of disparate constructs such as commitment to the task, the type of person one was, a person's will, personal competence and ambition. Theme 1 contained only one response that indicated the measurement of self-motivation and persistence. A measurement of a person's work ethic was the second theme, since respondents explained that work ethic as a personal value would determine whether effort was even (also) put into things that were not really important. *"It could be very much their work-ethic, their value system, in terms of whether they are completing each task with an equal amount of effort"* (Respondent 2). In terms of Question 3, respondents indicated that someone who strongly disagreed with this statement was viewed as a person that prioritised activities, decisions and tasks, and gave more effort, time and consideration to the tasks that were contributing to the achievement of their goals.

In terms of Question 4, both positive and negative appraisals of a strong agreement with the statement were provided. On the positive side, it indicated that the person was passionate about their task or work. On the negative side, it indicated a lack of prioritisation skills. Someone that strongly disagreed with this statement was viewed as a person that prioritised activities, decisions and tasks, and who gave more effort, time and consideration to the tasks that were higher on the list than to those lower on the list.

#### 4.4.1 Re-evaluation of test item 4 in terms of EI and motivational theories

According to the initial evaluation of the test item's alignment with EI theory in Chapter 2, it was found that commitment and initiative were the constructs supporting the justification of the operationalisation of self-motivation in this test item. Given the present results however, expectancy-value theory perhaps offered a more suitable fit between the theory and the way motivation was operationalised in this particular test item. Expectancy-value theory involved an individual's expectancies of achieving success on a task, as well as the subjective task values attached to the achievement of success on the task. Task values consisted of four components namely, attainment value, intrinsic value, utility value and cost. Attainment value and utility value were especially relevant to the test item in guestion since attainment value referred to the personal importance of the task, and utility value referred to the degree to which the completion of the task would lead to the achievement of current and future goals. In light of the results then, the respondents' judgment of the relative importance of the task suggested that attainment and utility values were more likely to determine how they responded to the test item, as opposed to their level of self-motivation as expressed through commitment and initiative.

## 4.5 RESULTS AND DISCUSSION OF TEST ITEM 5

Test item 5 operationalised self-motivation by asking respondents to what extent they agreed that they were highly motivated on the whole. Respondents who agreed that the statement was true of them were scored as more self-motivated, and those who disagreed with it, as less self-motivated.

### Table 20: Thematic categories for test item 5 in response to Question 1

### Question 1: What do you think I want to know from you if I give you this statement?

(Total units coded: n = 34)

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| 1) If I am motivated   | 15                                 | 44%               |
| 2) Other   | 10                                 | 29%               |
| 3) If I am self-motivated  | 3                                  | 9%                |
| <ol> <li>If I have a positive attitude<br/>or approach</li> </ol>    | 2                                  | 6%                |
| 5) What type of person I am  | 2                                  | 6%                |
| <ol> <li>If I can do more than what<br/>is required of me</li> </ol> | 2                                  | 6%                |

The main theme that emerged in response to Question 1 was the understanding that the test item enquired about a person's motivation or asked if a person was motivated. As previously pointed out, motivation and self-motivation were coded as different constructs since some respondents explicitly mentioned that the test item was about self-motivation, which was described as coming from within. Other respondents only made reference to motivation. This difference was well illustrated by Respondent 1: *"Motivation, productivity. Are you a hard worker or not? Ja, I think, are you motivated? Do you need to be motivated by, let's say staff or management or are you a person that is self-motivated enough to work".* 

could be attributed to either an extrinsic or intrinsic source, which necessitated the use of different codes.

The second theme contained a number of single mentions in response to Question 1, which included mentions such as drive, work ethic, initiative, self-reliance, energy levels, resilience, all of which were related to motivation and self-motivation to some degree. *"This item is getting at your motivation, your drive and your internal work-ethic. They could, I think they're interlinked, they talk to each other. Somebody who doesn't have high motivation levels will maybe have a lower drive to accomplish or to achieve. That might influence their work ethic. It's not to say that they are proportionate to each other, it's just to say that they impact each other" (Respondent 2). Having a positive attitude was seen as characteristic of high levels of motivation. Similarly, someone that could do more than what was required of them was considered highly motivated. Self-motivation was mentioned a few times and where mentioned, it was explicitly referred to as <i>self-motivation* or motivation that comes from *within.* 

 Table 21: Thematic categories for test item 5 in response to Question 2

| Question 2: What is this statement trying to measure in an individual? |
|--|
|  |

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|------------------|------------------------------------|-------------------|
| 1) My motivation | 11                                 | 31%               |
| 2) Other         | 9                                  | 26%               |
| 3) Drive         | 8                                  | 23%               |

(Total units coded: n = 35)

| 4) Self-motivation           | 5 | 14% |
|------------------------------|---|-----|
| 5) Self-esteem, self-concept | 2 | 6%  |

Corresponding to Question 1, respondents' answers to Question 2 indicated that most of them thought that test item 5 was a measurement of motivation. The content of the second theme contained answers that were no different to that in Question 1, such as a person's mind-set, productivity, initiative, personal strength and so forth. The concept of drive made up the third theme, which was coded separately for the purposes of clearly distinguishing it from self-motivation. In both Questions 1 and 2, self-esteem or individuals' perception of themselves were mentioned as constructs possibly measured by the test item.

A feature of the test item that potentially limited its ability to successfully measure selfmotivation or motivation, were the phrases *On the whole* and *highly motivated*. The first phrase was interpreted by some respondents as meaning *all the time*. Most of the respondents who gave themselves a rating of 4 on the test item indicated that they did experience days where they were not that motivated and as such they did not experience high levels of motivation all the time. *"Because most of the time I do try to motivate myself. Or, I keep motivating myself to do what I am doing in order to stay where I am and try to further myself. But I won't... there are some days where I sit and think it is not worth it, and I feel demotivated. But it is not every day" (Respondent 19).* 

Respondent 20 provided an example of how the word *high* could lead to negative responses to the test item: *"I don't like this statement because it is very - it asks so much of me - which I can't be able to say much. Because I am a person who cannot say* 

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I am highly motivated. If I have done my introspection, one can't tell yourself you're highly motivated. Rather tell yourself I am just motivated, because, when you say highly, you become too arrogant. You tend to think you're better than other individuals. You don't need room for growth, you don't need room for acceptance".

Responses to Questions 3 and 4 offered no new insights into the meaning and interpretation of the test item. Individuals who strongly agreed with the statement were seen by respondents as either being arrogant, or simply very motivated. Individuals who strongly disagreed with the statement were seen as very hard on themselves, not motivated, lacking in ambition and suffering from depression.

### 4.5.1 Re-evaluation of test item 5 in terms of EI and motivational theories

As pointed out above and in the initial evaluation of test item 5, this test item represented a direct operationalisation of the construct without making clear reference to the source of an individual's motivation. As such, it was not clear how this operationalisation fitted within the framework provided by the various definitions of self-motivation in the EI literature. The lack of reference to the source of motivation, coupled with the absence of other contextual information left the type of motivation being measured too open to incorrect interpretations. In review of the analysis results, these shortfalls emerged from the key finding that most of the respondents indicated that the test item was a measurement of general, unspecific motivation (thirty-one percent). Self-motivation as the construct being measured was mentioned to a much lesser extent (fourteen percent). The distinct difference between the test item representing a measurement of motivation as opposed to self-motivation was even more emphasised in terms of the analysis results obtained in response to Question 1. Considering the

various theories of motivation, it was therefore also true that test item 5 could potentially be better informed by any of the motivational theories as opposed to motivation theory in EI literature.

### 4.6. RESULTS AND DISCUSSION OF TEST ITEM 6

In test item 6, self-motivation was operationalised by determining the extent to which individuals felt that they produced good work effortlessly. In this instance, the effortlessness with which a task was completed, was considered a function of self-motivation. Respondents who indicated a strong agreement with the statement were scored as more self-motivated, and those who indicated strong disagreement with the statement, as less self-motivated.

Table 22: Thematic categories for test item 6 in response to Question 1

Question 1: What do you think I want to know from you if I give you this statement?

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| <ol> <li>Does doing good work<br/>requires little effort (easy)<br/>or a lot of effort (difficult)<br/>from me</li> </ol> | 18                                 | 62%               |
| 2) Other  | 7                                  | 24%               |
| 3) About my competence  | 2                                  | 7%                |
| <ol> <li>If I am not recognised for<br/>hard work</li> </ol>  | 2                                  | 7%                |

(Total units coded: n = 29)

Test item 6 presented a number of difficulties with the interpretation of the statement and the subsequent operationalisation of self-motivation. The first of these was brought about by the word effortless. When respondents were asked to read the test item out loud, as was the protocol for each test item, just less than half of the respondents either had to read the word again, or struggled to pronounce the word. A few respondents did not know what the word meant. Most respondents however understood it correctly as being similar in meaning to the words easy, or without difficulty or challenge. The majority of respondents indicated that the test item asked whether doing good work required a lot or only a little effort of them, or variations on this theme, as illustrated by Respondent 22: "This statement is saying producing work effortlessly. Like you don't have to work very hard, but you produce very good work. Like you're producing good results, but you're not sweating it - like working late at night. It is like this (snaps fingers), easy, simple and without much effort". The second theme contained a number of different interpretations such as individuals' judgment of whether they were doing a good or bad job, if they were struggling with what they were doing and whether or not they were quick learners. These varying responses, along with those contained in the main theme, represented a somewhat oversimplified and poor understanding of what the test item was asking.

Levels of competence emerged as the third largest theme. Respondents noted that if individuals were highly competent in what they were doing, they were more likely to produce good work effortlessly. Throughout the discussion of the test item, respondents consistently presented factors or situations that could facilitate the production of good work in an effortless manner. These included comfort within the working environment, task engagement, work engagement, familiarity with their role and the requirements of the job, self-efficacy, good time management skills, task interest, mood and availability of information and resources to do their job. Motivation was mentioned only once, with no mention of self-motivation as a factor that could make good work an effortless endeavour. Respondent 12 indicated this clearly: *"That it is easy. You're producing – if it is effortless – you're either very comfortable with what you're doing, or, very good at what you're doing, and therefore it is effortless. Whether it was effortless because you've been doing it for that long that it is second nature or, whether it's because you so love what you do, it's effortless."* 

A further insight into respondents' limited understanding of this test item was their inability to find it a realistic idea that good work could be done in an effortless manner. Good work was commonly associated with hard work and the notion that good work could be done effortlessly, seemed only to make sense to respondents when they could provide reasons for it actually being the case. Respondent 16 offered a clear explanation of this understanding: "With anything comes hard work - you can't just - I mean, you can be a great squash player, you can be a great tennis player, but good Lord, you had to work to get there. Nothing really works effortlessly. I think, if you work hard - you play hard type of thing. You know, you get what you work for". Where this view was held about the relationship between good work, and how much effort it should require, the design of test item 6 failed in the measurement of self-motivation despite the fact that this view was ironically indicative of high levels of perseverance and selfmotivation. Returning to the understanding of the word *effortlessly* as meaning *without* reward or acknowledgment, this view stemmed from the understanding that work done without the application of appropriate effort, was not worthy of recognition or reward.

Since it did not require effort or sacrifice on behalf of the person who did it, it was not worthy of reward or acknowledgment.

#### Table 23: Thematic categories for test item 6 in response to Question 2

### Question 2: What is this statement trying to measure in an individual?

| (Total | units | coded: | : n = 31 | ) |
|--------|-------|--------|----------|---|
|--------|-------|--------|----------|---|

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 6) Other  | 11                                 | 35%               |
| 7) Competence   | 6                                  | 19%               |
| 8) Job / Task difficulty                                | 3                                  | 10%               |
| 9) Intelligence   | 3                                  | 10%               |
| 10)How much effort is<br>required to do good work       | 2                                  | 6%                |
| 11)Productivity   | 2                                  | 6%                |
| 12)Coping with current role                             | 2                                  | 6%                |
| 13)Subjective evaluation of<br>your work as good or bad | 2                                  | 6%                |

When asked what respondents thought the test item measured, the main theme consisted of various single, widely varying responses such as measuring the quality of work a person produced effortlessly, a person's fit with the job, happiness or contentment, time management and laziness, all of which revealed a poor understanding of the test item. Competence or capability emerged as the second largest theme, which indicated that the production of good work in an effortless manner

was most commonly attributed to a person's level of competence. Respondent 5 provided a clear example of this when he stated the following: "Your capability. It's your – I should say – look, I won't necessarily say how good you are, but, in the sense of what you're capable of, in that sense. You put in a lot of work, right, but with no effort. You just do it! In the sense of you know exactly what you're doing, you know how to go about doing it and it makes it easier to do it". In the third position, the test item measured task difficulty, since that also explained why some individuals could do good work effortlessly. Intelligence was offered as another quality to which a high endorsement of the statement could be attributed, followed by a few smaller mentions around effort, productivity and coping.

When respondents were asked to give their interpretations on a very poor or very strong endorsement of the statement by someone else, they indicated that if individuals strongly disagreed with the statement, it indicated that they were incompetent, found the job difficult, did not feel good about themselves, were tired or they perhaps lacked a clear understanding of the requirements of their role. All these responses aligned with the initial interpretation and understanding of the test item as previously described under Question 1. Similarly, individuals who strongly agreed with the statement were viewed as both competent and confident in their ability to do their job. No forms of motivation, or self-motivation were explicitly mentioned.

### 4.6.1 Re-evaluation of test item 6 in terms of EI and motivational theories

Against the background of initial evaluation of this test item in chapter 2 and the present results, it was clear that the test item completely failed in operationalising self-motivation

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as described in EI theory. A large part of the misinterpretation was caused by the limited understanding of the word *effortlessly* and the role it played in the test item.

### 4.7 RESULTS AND DISCUSSION OF TEST ITEM 7

Test item 7 operationalised self-motivation by determining the extent to which an individual felt that most of the things they did well, did not require a lot effort given that they were highly self-motivated. Respondents who indicated a strong agreement with the statement were scored as less self-motivated, and those who indicated strong disagreement with the statement as more self-motivated.

| Table 24: Thematic categories for test item 7 in response to Question 1  |
|--|
| Question 1: What do you think I want to know from you if I give you this |

| Question 1: What do you think I want to know from you if I give you this | 5 |
|--|---|
| statement?   |   |

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Other  | 13                                 | 48%               |
| <ol> <li>If doing good work<br/>requires a lot of effort<br/>from me</li> </ol>                           | 8                                  | 30%               |
| <ol> <li>I am struggling to perform<br/>at the required level</li> </ol>                                  | 2                                  | 7%                |
| <ol> <li>If it is hard or easy for me to do my work</li> </ol>  | 2                                  | 7%                |
| <ol> <li>How much effort or<br/>concentration I have to<br/>put in to produce good<br/>results</li> </ol> | 2                                  | 7%                |

(Total units coded: n = 27)

In terms of responses to Question 1, most respondents presented divergent answers in terms of what the test item asked of them. These responses included asking how much motivation individuals needed, if they were organised or understood what they were doing. Perseverance, drive, self-determination and motivation were included amongst these responses, but since they were single mentions they were coded as belonging to the theme *Other*. As with test item 6, the remainder of the themes revolved around questions concerning the extent to which an individual found it easy or difficult to produce good work. "So what this person is saying – the previous person for instance made a statement saying that they produce 'good work, lots of the time, effortlessly'. So it's easy. While this person is saying it's hard for me, or, it takes a lot to get the job well done. In order to do a job excellent, is it hard for you to do a job well, or is it easy? I think it is as simple as that" (Respondent 1).

Also consistent with test item 6, was the notion that managing to do something well was not an effortless endeavour, and could perhaps be seen as somewhat unrealistic. Respondent 16, who strongly agreed with this statement being true of them, had the following to say about the relationship between good work and effort: "*I believe with hard work comes good reward*". Respondent 16 also provided an insightful view on the interrelationship between effort and doing something well. "To be number one is hard work - no one really gets to number one without practice - makes perfect, and practice is effort. And I would just relate that to work. Working, practicing and engaging. Again, where do you want to be? Where do you want to be with, what you stand with? Do you want to be number one? With hard work comes good reward". In this instance it was again evident that some respondents believed that doing things well would require a lot of effort. This particular view was ironic and held important implications for the

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interpretation of test item 7 and the measurement of self-motivation because the very belief that good results required sustained effort and perseverance was actually indicative of high degrees of self-motivation.

### Table 25: Thematic categories for test item 7 in response to Question 2

| Emerging themes  | Number of units<br>constituting theme | Size of theme (%) |
|--|---------------------------------------|-------------------|
| 1) Other   | 15                                    | 47%               |
| <ol> <li>Whether what I do<br/>(task/job) requires a lot or<br/>little effort</li> </ol> | 4                                     | 13%               |
| <ol> <li>How much effort you are<br/>prepared to put in</li> </ol>                       | 3                                     | 9%                |
| <ol> <li>How much effort it took to<br/>do good work</li> </ol>                          | 2                                     | 6%                |
| 5) Drive   | 2                                     | 6%                |
| 6) Self-efficacy   | 2                                     | 6%                |
| 7) Competence  | 2                                     | 6%                |
| 8) Confidence  | 2                                     | 6%                |

Question 2: What is this statement trying to measure in an individual?

(Total units coded: n = 32)

With regards to what respondents thought test item 7 measured, the predominant theme consisted of number of different constructs such as an individual's concentration levels, work experience, persistence, ambition and ability. The lack of ambition or persistence, or difficulties with concentration were seen by respondents to be the most probable reasons why most of the things they managed to do well, seemed to require a lot of effort. As was the case before, respondents made no explicit reference to motivation or self-motivation when asked what they thought the test item measured.

Themes two, three and four were all associated with the necessity and degree of effort necessary to do things well, which perhaps represented an overly simplified, concrete interpretation of what the test item was trying to measure. Themes five, six, seven and eight were similar to some constructs mentioned in theme one in as far as they also represented constructs or states that could regulate how much personal effort would be required to do something well. However, there was more than one mention of these constructs and therefore they were coded as distinct, albeit small themes. In addition to respondents' view of the established relationship between effort and the associated results as influenced by constructs such as competence, ability and intelligence for example, there were also indications that religious values may drive individual beliefs of self-efficacy and so have an impact the interpretation of the test item. Respondent 17 illustrated this influence as follows: "I know some things can require a lot of effort, but one thing I have realised as a Christian is that there is nothing too difficult, because if you are a person who seeks wisdom, God will give it to you. So if you just have that positive nature that I can do all things - you know it's like I can do all things through Christ. That there are some things - I really see as tough, but I choose to take a minute and feel there is nothing too difficult unless you tell yourself that it is too difficult. That's when you just do it, and when you are in it, and then it is not as if you're using a lot of effort to get it. It starts with the attitude inside you. How you approach that thing. Some individuals struggle, because they believe they can't do it".

In the TEIQue questionnaire, test items 6 and 7 were separated by forty other test items that measured other constructs. Throughout the course of the structured interviews, all the test items that measured the self-motivation facet were asked in the sequence they appear in the TEIQue questionnaire, and therefore the evaluation of test item 7 followed directly after that of test item 6. Thirteen respondents (fourty-eight percent) indicated that they interpreted test item 7 as asking the opposite of test item 6, as for example expressed by Respondent 12: "Most of the things I manage to do well, seem to require a lot of effort" – it is almost like the opposite of what we've just done. Here you're saying I only succeed with effort, due to effort, which is quite an opposite".

This observation was correct, and therefore the successive evaluation of test items 6 and 7 by the same respondent offered the researcher a unique opportunity to evaluate the operationalisation and measurement of self-motivation in terms of the consistency with which reversed test items measured the same latent construct. From a psychometric point of view, the way in which test items 6 and 7 were scored, dictated that individuals who gave high personal ratings on test item 6, which were consistent with higher levels of self-motivation, should in test item 7 give personal ratings that were congruent with the way in which test item 6 measured self-motivation. Therefore a directionally higher rating on test item 6 should be matched by a directionally lower rating on test item 7 by the same respondent. Figure 2 provides the ratings on both test items by all respondents in the present study.

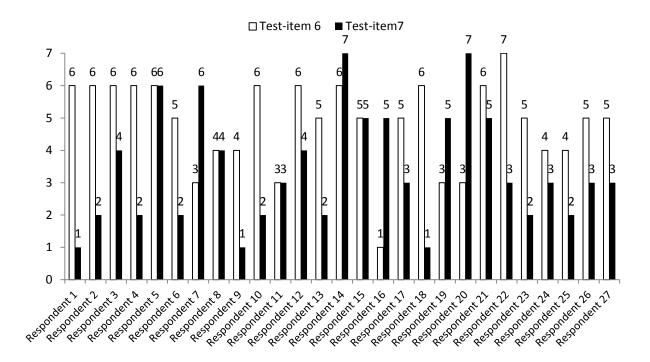


Figure 2: Ratings on test items 6 and 7 across the sample

The rating provided on test item 6 is indicated in white, whilst the rating for test item 7 is indicated in black. Respondent 1 presented a good example of the logic consistency with which test items 6 and 7 should alternately measure self-motivation. Where respondents provided a rating of 4 on test item 6, which indicated neither strong agreement nor strong disagreement with the statement, it was expected that the rating on test item 7 should also be neutral. As the ratings moved to either side of the scale (very low or very high endorsements), the distance between the ratings on the rating scale should increase.

Respondents five, eight, eleven and fifteen provided the exact same ratings on both test items. Respondents nine and twenty-four provided ratings that were on the neutral and lower end of the scale respectively, with Respondents fourteen and twenty-one providing ratings that were both on the higher end of the scale. In all four of the lastmentioned cases, there were inadequate differences between the ratings, which suggested, albeit by way of the ratings only, that the operational differences between the two test items and their associated measurement of self-motivation, were inefficient.

### 4.7.1 Re-evaluation of test item 7 in terms of EI and motivational theories

In Chapter 2, the researcher could not find a substantial theoretical foundation that appropriately justified the operationalisation of self-motivation in this test item. Given this lack of theoretical focus, the researcher pointed out that an individual's interpretation of what test item 7 attempted to measure was potentially open to numerous task and situational conditions or personal skills other than a lack of self-motivation. The results presented here confirmed this suspicion. With regards to the theories of motivation, none of the remaining motivational theories offered any further insights that rejected or supported this test item's operationalisation of self-motivation.

### 4.8 RESULTS AND DISCUSSION OF TEST ITEM 8

Test item 8 operationalised self-motivation by determining the extent to which an individual could derive satisfaction only from doing something well, as opposed to deriving pleasure from doing something well for reasons such as reward or recognition. Respondents who indicated a strong agreement with the statement were scored as more self-motivated, and those who indicated a strong disagreement with the statement as less self-motivated.

### Table 26: Thematic categories for test item 8 in response to Question 1

### Question 1: What do you think I want to know from you if I give you this statement?

(Total units coded: n = 29)

| Emergir | ng themes  | Number of units constituting theme | Size of theme (%) |
|---------|--|------------------------------------|-------------------|
| 1) O    | Other  | 9                                  | 31%               |
|         | o you get pleasure from oing something <i>well</i>           | 6                                  | 21%               |
| ŕ       | o you get pleasure <i>just</i><br>om doing something<br>/ell | 4                                  | 14%               |
| ,       | you are motivated to do omething well                        | 4                                  | 14%               |
|         | you enjoy recognition<br>nd appreciation                     | 4                                  | 14%               |
| ,       | o you take pride in your<br>ork                              | 4                                  | 14%               |

The predominant set of answers provided in response to Question 1 included different, unrelated responses such as a individuals sense of worth based on how well a job they have done, if they did something just to get it done, if they were happy with what they have done or if they derived pleasure from what they did, and so forth. These types of responses indicated that respondents held many different views on what the test item was asking of them, with no uniform understanding emerging from the responses. From the second largest theme it was evident that the interpretation of the test item was quite literal, and simply asked if one would get pleasure from doing something well. Where interpreted this way, respondents were oblivious to the purpose and meaning of the word *just* in the sentence, and therefore the word played no role in their interpretation of the test item. Instead, the test item was read as a mere matter of whether or not pleasure was a consequence of doing something well. In her answer Respondent 21 refrained from using the word *just* in her explanation of what the test item was asking of her. "It is saying that when I have done something well, I get pleasure out of it. There is this feeling inside of me - of satisfaction - that I get from doing something well". In cases where the word *just* did alter the interpretation of the test item, it became clear that two different lines of interpretation were possible. In the first instance, the word just could be interpreted as having the same meaning as the word *simply*. In these cases, pleasure was derived simply from doing something well and as such, doing something well was seen as reason enough for feelings of satisfaction. The second line of interpretation of the word was seen in cases where it was interpreted as having the same meaning as the word only, in which case a person only tends to get a lot of pleasure when something has been done *well*. This second interpretation was linked to the subjective judgment of the quality of the work, and only when that work was done *well*, could one derive pleasure from it. Although a minority response, it was worth mentioning that two respondents took this interpretation a little further and added degrees of quality as another dynamic that stood to influence the interpretation of the test item. They argued that the test item asked whether enjoyed doing something well, but not perfectly. This test item therefore asked if a person was satisfied with the effort they have put in relative to the results of their effort.

The fourth theme pointed towards an individual's tendency to either do something for the sake of getting it done, or whether one was somehow motivated to do something well. This interpretation linked very closely to the idea of taking pride in one's work, which some respondents considered a personal value that should characterise the work they did. In this instance, personal pride was seen as a value that would motivate an individual to do work well. The fifth theme emerged when respondents somehow introduced the element of recognition into the interpretation of the test item, despite any word or phrase warranting the introduction thereof.

### Table 27: Thematic categories for test item 8 in response to Question 2

#### Question 2: What is this statement trying to measure in an individual?

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Motivation   | 4                                  | 15%               |
| 2) Job satisfaction   | 4                                  | 15%               |
| 3) Pleasure derived from<br>doing something <i>well</i>     | 4                                  | 15%               |
| 4) Other  | 4                                  | 15%               |
| 5) Value and importance of<br>achievement                   | 3                                  | 11%               |
| <ol> <li>Value attached to doing<br/>good work</li> </ol>   | 2                                  | 7%                |
| <ol> <li>Pride taken in doing<br/>something well</li> </ol> | 2                                  | 7%                |
| 8) Drive  | 2                                  | 7%                |
| 9) Not sure   | 2                                  | 7%                |

(Total units coded: n = 27)

In test item 8 there was a lack of consistency between what respondents thought the test item asked of them, and what they consequently thought the test item measured. Question 2 elicited various diverging answers from respondents, with the four main themes being equal in size. The first theme was motivation. Respondent 10 described

motivation as follows: "It has all to do with your motivation. Some individuals enjoy doing things well, some individuals prefer to do the least possible amount - that they are doing enough to achieve it and that's it. Respondent 13 was more specific and said that it measured self-motivation. "Are you doing it for yourself or are you doing it because someone else says you must do it. Are you doing it because it means something for you, or because you have to do it? Themes 6 and 7 were indicative of respondent's tendency to focus on the word *well*, and as such indicated that the test item measured the value attached to doing something well.

In response to Questions 3 and 4, respondents indicated that a person that strongly disagreed with the statement was someone that lacked enthusiasm and motivation. The rating described a person who did not feel like they wanted to achieve more when they did something good or someone that did something for the sake of getting it done. On the contrary, if someone strongly agreed with the statement, they were seen as a person who derived pleasure from other individuals' recognition of a job well done, or, individuals that appreciated things, worked hard, and loved themselves. In terms of the personal ratings provided by respondents, the majority (sixty-six percent) of respondents provided a rating of 6 or 7 for themselves, which indicated that they were in strong agreement with the statement. This finding was not surprising when viewed in light of a comment made by Respondent 8: *"Hmm, ja, you wouldn't be normal if you didn't feel good if you did something well, so ja, a six or seven".* 

### 4.8.1 Re-evaluation of test item 8 in terms of EI and motivational theories

In the evaluation of the test item's fit with EI theory in Chapter 2, it was found that the construct of commitment provided a clear theoretical foundation for the

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operationalisation of self-motivation in test item 8. Commitment described the enjoyment of a task for the sake of the task itself. An individual's passion for a job or task could enable them to experience higher levels of self-motivation since they derived pleasure solely from doing the task well, which was an exclusively intrinsic source of motivation.

In terms of the results of test item 8, it was clear that the test item was not equally well understood by respondents and provided a complex set of varying interpretations. Some respondents indicated cognisance of the word *just* and others applying different interpretations to it. The word *well* also contributed to divergent interpretations of the test item. Test item 8 did therefore not provide a very desirable measurement self-motivation as intended by EI theory.

In expectancy-value theory, attainment value referred to the personal value an individual attached do doing something well. Whilst this theory perhaps offered a theoretical basis for the operationalisation of motivation in this test item, the results revealed only a small number of cases that were relevant to this theory.

### 4.9 RESULTS AND DISCUSSION OF TEST ITEM 9

Test item 9 was negatively phrased and inversely scored. Respondents who indicated a strong agreement with the statement were scored as less self-motivated, and those who indicated strong disagreement with the statement as more self-motivated.

### Table 28: Thematic categories for test item 9 in response to Question 1

### Question 1: What do you think I want to know from you if I give you this statement?

(Total units coded: n = 26)

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| 1) Concentration<br>span/Focus   | 7                                  | 27%               |
| <ol> <li>Ease of losing interest<br/>(low task difficulty &amp;<br/>interest)</li> </ol> | 5                                  | 19%               |
| <ol> <li>Ease of losing interest<br/>(degree)</li> </ol>                                 | 4                                  | 19%               |
| 4) Boredom   | 4                                  | 15%               |
| 5) Duration of interest  | 3                                  | 12%               |
| 6) Other   | 2                                  | 8%                |
| 7) Motivation  | 1                                  | 4%                |

As stated before, there was no information available in the TEIQue Technical Manual (Petrides, 2009) or Petrides' doctoral thesis (Petrides, 2001) on the development of the test items with regards to the way in which the underlying theories of motivation operationalised the construct and structured the content of the test item. It was therefore unclear exactly how self-motivation was operationalised in this test item. The researcher speculated that test item 9 referred to either *perseverance* as a construct that would enable an individual to disagree with the statement and so reflect self-motivation, or, task interest and task difficulty. If an individual enjoyed a task because they were interested in it and it provided the appropriate level of challenge, they would not easily

lose interest in it, and this characteristic of tasks was related to theories of intrinsic motivation.

Note however that in order to have arrived at these speculations, there were two interpretations of the test item. The first line of interpretation read the test item as referring to the ease with which an individual lost interest. The emphasis of the interpretation was on the word *easily*, meaning *quickly*. The second line of interpretation read the test item as meaning that an individual lost interest in what they *did* quite easily – therefore task difficulty and task interest. Thus, test item 9 could be read and understood in two ways, each dependant on whether the reader thought the word *easily* was an adjective to the verb *do*, or to the verb *lose interest*.

In response to Question 1, nearly a third or respondents indicated that they understood the test item to ask what their concentration span was, or on the other hand, how easily distracted they were. "Concentration, ja, to some extent. Hmm...I don't know. For me it would be whether you're distracted easily, or if you need a lot of variety in your job, to keep you interested in whatever you're doing, so that there's a lot going on, you don't really lose interest in anything anyway because there's too much going on" (Respondent 7). "What do you want to know from me? My concentration level. And hmm, interest in the subject" (Respondent 6).

Another example was provided by Respondent 2: "What's my concentration span. Do I get distracted easily? Am I somebody who tends to like the innovation or the...ja, innovation period and the new and exciting rather than doing something through to completion". As can be seen from these examples, job characteristics like variety determined how this test item was interpreted.

In addition, a number of respondents have indicated that it was a value to see activities through to completion. *"I don't easily lose interest in what I do - because once I start doing something, I obviously know that I will be able to do it. And because of that, I can't lose interest, because then it means that I have failed. If you lose interest, it means chances are you will not accomplish what you started. And for me, I can't lose interest. I have to go with this thing to the end" (Respondent 21).* 

Followed by this interpretation, respondents indicated that they understood the test item to ask how *quickly* or *easily* they lost interest in a task that was easy to do (not challenging or difficult), or one that was simply uninteresting. This interpretation revealed that respondents were not sure whether the adverb *easily* in the test item referred to the *ease* with which you lost interest, as a matter of extent or degree, or whether it referred to what a person was doing, as in that which I *did* quite easily. "*Ok, when I am busy with something and it doesn't stimulate me, I get bored very easily, I get tired of it*" (Respondent 5).

Further to these disparate interpretations, respondents made reference to the various factors that determined how *quickly* they would lose interest in a task, and why some tasks might be have been *easy* for them to do. In case of the latter, the result was a rapid loss of interest in the task. As such, respondents noted that the difficulty of the task had an influence on how quickly they lose interest.

Some respondents noted that regardless of the levels of task difficulty or other factors, a person who experienced high degrees of job satisfaction remained focused and interested, because they were following their passion. *"Well, if you're interested in what you're doing and if you – if it is your passion – then you'd always be interested in your* 

*work. No matter what complications come in or what curveballs come in"* (Respondent 3). In this instance, work engagement and its antecedents influenced the way in which the test item was interpreted.

### Table 29: Thematic categories for test item 9 in response to Question 2

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| 1) Concentration span, focus   | 11                                 | 29%               |
| 2) Other   | 6                                  | 16%               |
| 3) Perseverance  | 5                                  | 13%               |
| <ol> <li>Aspects involving task<br/>interest or stimulation</li> </ol> | 4                                  | 10%               |
| 5) Aspects involving task<br>difficulty                                | 4                                  | 10%               |
| 6) Ability to follow through to completion                             | 3                                  | 8%                |
| 7) Boredom   | 3                                  | 8%                |
| 8) Motivation  | 2                                  | 5%                |

(Total units coded: n = 38)

In terms of what respondents thought the test item measured, it was clear that the for the most part, the word *easily* was read as an adverb to the phrase *I lose interest*, and as such, the largest theme in response to Question 2 indicated that the test item measured a person's concentration span. The second theme consisted of a variety of responses including but not limited to job satisfaction, passion for one's work, optimism, drive, need for a challenge and personality or character.

Themes 4 and 5 reflected a measurement of how engaging or challenging a task was. Theme 6 came close to a measurement of persistence as portrayed in a person's ability to follow things through to completion. Motivation was the least mentioned construct in response to Question 2.

### 4.9.1 Re-evaluation of test item 9 in terms of EI and motivational theories

According to EI theory discussed in chapter 2, test item 9 was likely related to the measurement of self-motivation through the measurement of persistence. The present results indicated that this operationalisation of self-motivation was not entirely incorrect. As initially suspected however, the grammatical structure of the test item led to different interpretations of the test item and therefore EI theory did not adequately justify the operationalisation of self-motivation in this test item.

In terms of the general motivational theories, intrinsic task-value and intrinsic motivation offered noteworthy insight into the functioning of the test item. Intrinsic task-value related to intrinsic motivation, which in turn was related to interests. Interest was classified as either situational or personal in nature. Personal interest was associated with persistence at a task, increased attention, focus and enjoyment. If the intention of the test item was to measure the extent to which a person lost interest in a task that was easy to do, it could be argued that task-interest and enjoyment, which were forms of intrinsic motivation, would determine how an individual responded to the test item.

### 4.10 RESULTS AND DISCUSSION OF TEST ITEM 10

Test item 10 operationalised self-motivation by determining the extent to which the respondents were reliant on extrinsic sources of motivation for doing their best. Respondents who indicated a strong agreement with the statement were scored as less self-motivated, and those who indicated strong disagreement with the statement as more self-motivated.

### Table 30: Thematic categories for test item 10 in response to Question 1

## Question 1: What do you think I want to know from you if I give you this statement?

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| <ol> <li>Need for incentive/reward<br/>in order to do my best</li> </ol>       | 16                                 | 53%               |
| 2) Other mentions  | 7                                  | 23%               |
| 3) Source of motivation  | 3                                  | 10%               |
| <ol> <li>What you need to be<br/>given in order to do your<br/>best</li> </ol> | 2                                  | 7%                |
| 5) Self-motivation   | 2                                  | 7%                |

#### (Total units coded: n = 30)

Question 1 explored the respondent's literal understanding of the test item and indicated that most of the respondents correctly understood the test item as asking if a person required an incentive or some reward in order to do their best. The second largest theme coded in response to Question 1 contained various divergent mentions such as a person's values, locus of control and work engagement – constructs which were each

uniquely related to the experience of self-motivated behaviour in a particular context. Respondent 3 provided a good example of the relationship between self-motivation, incentives and how work engagement might have moderated the need for incentives and so have impacted on self-motivation. "*It comes down to enjoyment, 'cause if you don't – if you enjoy your work, you're satisfied with what you've got, then you wouldn't require incentives. But I think everyone needs incentives to spur them on to perform better".* 

In line with the verbatim response quoted above, a general trend observed in response to test item 10 was that respondents considered some sort of incentive necessary for them to do their best. This view was driven by their understanding of the word *incentive* as not only referring to extrinsic rewards, but other intangible rewards such as job satisfaction, recognition, acknowledgment, more responsibility and impactful results. Respondents 5 and 22 illustrated this point clearly: *"Look you need a pat on the back for good work, but also an incentive for you hard effort. You know, especially if you have achieved something in a difficult situation, would be good to, because if the thing is – look, everybody needs motivation"* (Respondent 5). Respondent 22 had a particularly intrinsically motivating view of job satisfaction as an incentive for doing her best: *"I mean if you do something that you love, and believe in, you don't need a reward. You are rewarding yourself each and every day"*.

An interesting characteristic of this test item was that it contained two cases of extremes in the way it was phrased. It contained the phrase *a lot* to which respondents responded with mixed feelings because they needed some incentives, but not *a lot* of incentives. Yet, the test item also contained *my best*, an idea that elicited value-based evaluations

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of what the test item measured. "If you are a person that likes excellence...that likes living excellently, you are going to do your best, doesn't matter about the incentives. But it is important to be rewarded. But I think acknowledgement of what you're doing, by the individuals that you are doing it for, is very important" (Respondent 1).

### Table 31: Thematic categories for test item 10 in response to Question 2

### Question 2: What is this statement trying to measure in an individual?

| Emerging themes  | Number of units constituting theme | Size of theme (%) |
|--|------------------------------------|-------------------|
| 1) Other mentions  | 7                                  | 22%               |
| 2) Motivation  | 5                                  | 16%               |
| <ol> <li>What you need to be<br/>given in order to do your<br/>best</li> </ol> | 5                                  | 16%               |
| <ol> <li>Need for incentive/reward<br/>in order to do my best</li> </ol>       | 5                                  | 16%               |
| 5) Self-motivation   | 4                                  | 13%               |
| 6) Drive   | 4                                  | 13%               |
| 7) Task interest/enjoyment   | 2                                  | 6%                |

(Total units coded: n = 32)

Looking at what respondents thought the test item measured, the main theme that emerged contained a variety of constructs such as commitment or loyalty to your work, work ethic, greed and ambition. Following this, three categories of interpretations emerged: measurement of motivation, measurement of the nature of factors that can motivate you to do your best and finally a measurement of the need to be incentivised to do your best. These four main themes were consistent with what respondents understood the test item to mean (Question 1) and they all pointed towards a rather diffuse, inexplicit measurement of self-motivation.

In terms of Question 3, individuals who strongly disagreed with the statements did not require incentives to do their best, they could just work. Some respondents indicated that a strong disagreement with the statement indicated that a person did not value incentives and did not consider them as necessary for good performance. When asked what respondents thought of someone who gave a rating of seven on the test item (Question 4), they described a person that needed reasons or incentives for doing something, or someone that lacked passion for what they did. On the contrary, for those respondents who indicated that incentives were important to them, a strong endorsement of the statement showed that this person valued incentives.

Evidently, an individual's personal view on the nature (extrinsic, intrinsic) and relative value and importance of incentives, determined how test item 10 was understood and responded to. The content analysis provided evidence that showed a lack of consistency in the interpretation of the test item. The result was a somewhat obscure measurement of self-motivation via related, yet distinct constructs.

### 4.10.1 Re-evaluation of test item 10 in terms of El and motivational theories

In Chapter 2, a clear theoretical foundation was provided by EI theory. Initiative and achievement drive were positively related to self-motivation. The results showed a clear reflection of these two elements. No additional insights were offered by the general motivational theories.

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# 4.11 RESULTS AND DISCUSSION OF ADDITIONAL QUESTIONS FOLLOWING THE TEST ITEM EVALUATION

As previously indicated, Questions 1 to 5 were asked to evaluate each of the selfmotivation test items. Question 6 was the first question asked with regards to the respondent's overall impression of the test items, and ascertained the extent to which the test items were related. Seventy-one percent of the sample indicated that the test items were related in a way. The remainder of the sample indicated that some, but not all of the test items were related. "Yes, they're about a person's personality, what motivates you, what gives you the edge to get up and go. It is also about the strengths and weaknesses of a person as well' (Respondent 23). Regarding the clarity and ease with which the test items were understood (Question 7), a third of the respondents were of the opinion that the test items were indeed vague. "Quite a few of them were vague, ambiguous and not clear. They were very open to interpretation and you could swing it either way" (Respondent 26). However, those respondents who thought that the test items were not as vague, did however add that some of the test items required more thought when asked what they measured. "I won't say they were difficult to understand, or read. A lot of them did make you think. Second time around, reading them...makes you feel like you're going around in circles. I guess I didn't think about them this much when I answered them. Some I answered quickly, some I had to read again. I have to say that some were a little bit vaque, but not ambiguous or not understandable" (Respondent 16). Question 8 served as an extension of Question 6 by focusing the respondent's evaluation of the test item towards the identification of a single latent construct. The results are indicated in table 32.

### Table 32: Thematic categories emerging in response to Question 8

### Question 8: If I was to tell you that they were all written to test one thing in an individual, what do you think that would be?

| Emerging themes   | Number of units constituting theme | Size of theme (%) |
|---|------------------------------------|-------------------|
| 1) Other mentions   | 12                                 | 38%               |
| 2) Self-motivation  | 6                                  | 19%               |
| <ol> <li>The type of person that<br/>you are, your character</li> </ol> | 4                                  | 13%               |
| 4) Your motivation  | 3                                  | 9%                |
| 5) Your personality   | 3                                  | 9%                |
| 6) What motivates you   | 2                                  | 6%                |
| <ol> <li>Your strengths and<br/>weaknesses</li> </ol>                   | 2                                  | 6%                |

(Total units coded: n = 32)

Following a similar pattern to previous results, the largest theme consisted of a variety of single mentions which included diverse constructs or concepts such as your attitude, your willingness to do something, your ability to do something, your values and how hard you were prepared to work. Only one respondent indicated that the test items as a collective did not fit a single label. Self-motivation emerged as the second largest theme. The remainder of the themes reflected constructs seen before. It was noteworthy to see that a person's personality, character or the type of person that you were, seemed to be an element that was related to the respondents' conceptualisation of self-motivation. This finding was further explored in the respondents' own definitions of self-motivation (Question 10). *"I think most of the things that we spoke about, to* 

achieve, to do well, incentives, what do you need – it all comes down to who you are, before you receive any incentive. Before you are accountable, before you love what you do. What is your character? Is your character to do it with excellence, or not? Do you need to be inspired to do something excellently, or, are you just going to do it with excellence? So I think it's actually, firstly, a question of who you are and how you do things. I think that's the most important thing" (Respondent 1).

The second last question explored respondents' opinions on the appropriateness of the test items with respect to its measurement of self-motivation (Question 9). More than half of the respondents (fifty-eight percent) indicated that they thought the test items were suited to the measurement of self-motivation. This finding was somewhat contradictory in light of the results provided thus far, yet it was to be considered on account of the possible influence of social desirability responses styles.

### 4.12. RESULTS OF PERSONAL DEFINITIONS OF SELF-MOTIVATION

At the end of the structured interview, respondents were asked to provide their own definition of self-motivation. As with the analysis procedure for all of the former test items, the responses were coded for the recurrent appearance of certain words or concepts in the respondents' personal definitions of self-motivation. A total number of fifty six elements were extracted from the responses. For the purposes of greater clarity, only those elements that represented more than two percent of the responses (more than one mention) are provided below. The results for personal definitions of self-motivation are provided as percentages in figure 3.

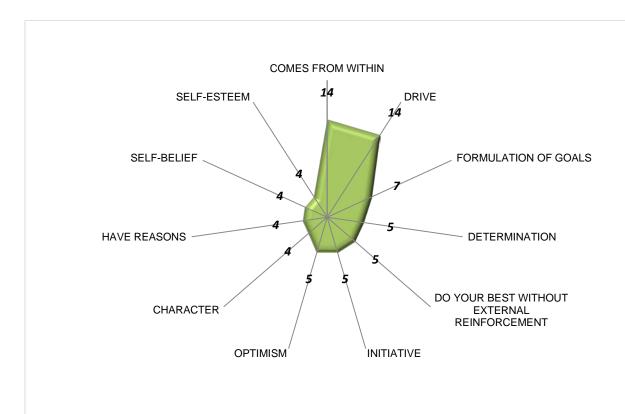


Figure 3: Constructs or concepts constituent of definitions of self-motivation

As illustrated in figure 3 respondents most frequently defined self-motivation in terms of an internal drive. "For me, self-motivation is about something inside of you. It is about your inner drive. And, it is not always about being an achiever; it is about how you go about doing things a lot of the time. It is about putting in that extra effort, so to speak, because, it comes naturally to you. If you have to force that onto yourself, then you don't have that motivation, you don't have that ability to do it for yourself" (Respondent 25). Although it was not possible to determine the exact extent to which the discussion of the test items primed respondents' definition of self-motivation, it was worthwhile to point out that only a few of the constructs or concepts listed above were actually part of the content of the test items. In chapter 2, the researcher provided a distillation of the key operational characteristics of self-motivation as it emerged from EI theory (figure 1). Considering both the definitions of self-motivation provided by the respondents and the core characteristics of self-motivation as provided by EI theory, a considerable overlap existed with regards to the following characteristics:

- 1) Happiness
- 2) Optimism
- 3) Achievement drive
- 4) Initiative
- 5) Persistence

This finding is discussed in the conclusions and recommendations chapter.

### **CHAPTER 5: CONCLUSIONS, LIMITATIONS AND RECOMMENDATIONS**

In this final chapter of the study, conclusions are made based on the results provided in the previous chapter. The first section of this chapter discusses the results in terms of the research aims outlined in chapter 1. Following this discussion, the next section of the chapter answers the research questions formulated in chapter 1. The chapter concludes with a discussion of the implications of the results, followed by a review of the limitations of this study.

### 5.1 CONCLUSIONS RELATING TO THE QUALITATIVE EXPLORATORY STUDY

Empirical data obtained from various international validation studies of the TEIQue suggested a lack of item homogeneity of the self-motivation facet of the TEIQue. The general aim of the present study was to explore the functioning of the test items in the self-motivation facet of the TEIQue amongst a South African sample. This aim was realised by conducting a qualitative evaluation of respondents' understanding and interpretation of the self-motivation test items.

The first aim of the study pertained to the extent to which the present test items conformed to the theoretical justifications for the operationalisation of self-motivation as outlined by the relevant models of El. Given the absence of theoretical justifications for the operationalisation of self-motivation in the TEIQue Technical Manual or elsewhere, the researcher provided subjective evaluations of the test items in terms of trait El theory. This evaluation revealed that theoretical justifications for the content of some of the test items could be found, although these justifications were rather notional and

abstract in nature. A general finding of the study was that those test items that were more concretely and explicitly related to the construct, reflected a more accurate measurement of the construct. As such, the test items that used the words *motivation* or *motivated* represented better operationalisations of self-motivation.

The second aim of the results was to determine the extent to which the test items were linguistically appropriate and culturally relevant for a multi-cultural South African sample. On the whole, respondents who spoke English as their first-language did not experience any difficulties with the language used in the test items. However, a few of the Englishspeaking respondents made reference to the grammatical structure of the test item and described it as unusual. Respondents who spoke Afrikaans as their first-language also did not experience any noteworthy difficulties with comprehension. Only respondents who spoke an African language as their first-language pointed out that some of the test items were difficult to comprehend and contained words they were not familiar with. These respondents also experienced more difficulty in the articulation of their answers in response to the interview questions. Some test items, notably test items 9, 8, 7, 6, 4 and 1 provided results that indicated poor operationalisations of self-motivation. This was predominantly the result of specific surface features such as difficult words or the complex grammatical structures employed in the test items. Some of these test items represented the measurement of constructs that were only vaguely related to selfmotivation, if at all.

The third aim of the study was to determine the degree of equivalence between the South African population's conceptualisation of self-motivation and the conceptualisation and operationalisation of self-motivation as set forth in EI theory, and

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in the TEIQue specifically. In this regard, the evaluations of the respondents' definitions of self-motivation were considered. Based on the results provided in chapter 4 (figure 3), the South African respondents' definitions of self-motivation made frequent reference to the majority of the constructs or elements that Petrides (2009) used in the development of the definition of self-motivation. Respondents' definitions clearly indicated that they understood self-motivation to originate from within and that it involved their personal drive and determination to succeed. Based on this finding, it was concluded that the South African sample's conceptualisation of self-motivation aligned well with the conceptualisation intended by trait EI theory (Petrides, 2009; Petrides & Furnham, 2001). This finding also suggested that the issues identified with the operationalisation of self-motivation were related to the test item itself, and not to a markedly different conceptualisation of the construct as possibly influenced by the cultural norms of the respondents. None of the respondents made explicit or implicit reference to their culture when they interpreted or responded to the test items. The same was found for their personal definitions of self-motivation.

The last aim of the study was to determine the extent to which the test items in the selfmotivation facet of the TEIQue represented a uniform measurement of the construct. Whilst it was not feasible to expect respondents to specifically use the word *selfmotivation* in their evaluation of the test item, it was reasonable to expect that their responses should have reflected the measurement of self-motivation through consistent mentions of the constructs closely related to self-motivation as outlined in trait EI theory.

Based on the results provided in chapter 4, there was sufficient reason to believe that the test items did not represent a non-uniform measurement of the construct. The results of the evaluation of the ten test items revealed that in certain cases, a test item measured a different construct altogether. In other cases, the test item measured constructs which varied in their relatedness to self-motivation. The only test items that represented an accurate measurement of the construct were those that made explicit reference to the construct by the use of the words *motivation* or *motivated*. In addition, certain surface features of the test items such as difficult words or complex grammatical structures also detracted from an effective measurement of the latent construct.

# 5.2 CONCLUSIONS RELATING TO THE RESEARCH AIMS OF THE LITERATURE REVIEW

The first aim of the literature review was to provide a detailed overview of the scope and content of ability and trait-based models with particular reference to the inclusion of self-motivation as a construct within these models. The trait EI model proposed by Petrides (2001) and Petrides and Furnham (2001) covered the sampling domain of trait EI as generated by a content analysis of salient EI models. In this respect, the literature review revealed that self-motivation was a construct commonly defined as part of the sampling domain of trait and mixed models of EI.

The second aim of the literature review was to establish the operational definitions of self-motivation and the conceptual relationships self-motivation shared with other constructs in EI theory. In this regard, the theoretical framework within which self-motivation was conceptualised in the TEIQue (trait EI theory) aligned reasonably well with the frameworks proposed by other salient EI models. The definitions of self-motivation provided in the literature of the various EI models were also congruent with the definition provided by trait EI theory (Petrides, 2009), although the latter was limited

to drive, persistence, achievement drive and did not make reference to mood, optimism and other constructs mentioned in the theoretical frameworks proposed by Bar-On (2006) and Goleman (1995; 1998).

The final aim of the literature review was to determine the degree of similarity between operational definitions of self-motivation in EI theory and the operational definitions of self-motivation provided in general theories of motivation. The result of this review indicated that operational definitions of self-motivation in EI theory were predominantly described in terms of its relation to personality traits such as happiness, optimism, persistence, commitment and initiative. On the contrary, the general theories of motivation placed more emphasis on task and situational characteristics that mediated individual levels of self-motivation as informed by the cognitive appraisal of tasks and situations. As such, self-motivation as conceptualised in the framework of EI theory was in some instances significantly different from conceptualisations of the construct in the framework of general motivational theories.

#### **5.3 CONCLUSIONS RELATING TO THE RESEARCH QUESTIONS**

Informed by the conclusions to the aims of the literature review and the qualitative results, the research questions were answered next.

5.3.1 Did the South African sample understand the construct of self-motivation as intended in the TEIQue?

As previously outlined, there was no reason to believe that the South African sample's understanding and conceptualisation of self-motivation were different from the conceptualisation proposed in the TEIQue.

5.3.2 Did the test items in the self-motivation facet of the TEIQue measure selfmotivation?

The results discussed in chapter 4 indicated that the self-motivation test items represented a poor measurement of the construct. The lack of congruence between the theory and the operationalisation of the construct was evident at the level of the test item. The inadequate measurement of self-motivation was therefore attributed to the inability of the test items to accurately operationalise self-motivation as proposed by trait EI theory. This was especially true for some test items where more suitable justifications for the measurement of motivation, or aspects related to motivation, as opposed to self-motivation, were proposed by cognitive motivational theories. The inadequate measurement of the construct was further promoted by the use of complex grammatical structures and language.

#### 5.4 LIMITATIONS

The imitations related to the present study were detailed in chapter 3, but a summary thereof is repeated here:

5.4.1 The research approached employed was exploratory in nature, which limited the external validity of this study and did not allow for the generalisation of the findings to the broader South African population.

5.4.2. The small size of the sample allowed for a limited number of divergent opinions. In this regard, the African first-language group was represented by only seven respondents which was regarded as a limitation of the present study.

#### **5.5 CONCLUSION AND RECOMMENDATION**

The present study found limited support for the item homogeneity of the self-motivation facet of the TEIQue as it related to a multi-cultural South African research sample.

The conclusions of this study were enlightening insofar its correspondence with the suggested lack in item homogeneity reported in the international cross-cultural validation studies of the TEIQue.

Without the availability of empirical validity evidence that supported the adequacy with which the self-motivation test items in the TEIQue measured the construct in the four first-language groups in the South African validation sample, the present study suggests that the scores obtained on the self-motivation facet of the TEIQue should be approached with legitimate caution.

This suggestion is furthermore supported by the findings of the international crosscultural studies, which indicated that cultural and linguistic differences did have a significant impact on the conceptualisation and measurement of self-motivation.

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#### APPENDICES

### **APPENDIX A: Biographical details of the research sample (n = 27)**

| RESPONDENT | GENDER | AGE | FIRST-<br>LANGUAGE      | RACE     | QUALIFICATION              |
|------------|--------|-----|-------------------------|----------|----------------------------|
| 1          | Male   | 29  | Afrikaans               | White    | 1 - 2 year Diploma         |
| 2          | Male   | 29  | English                 | White    | 1 - 2 year Diploma         |
| 3          | Male   | 33  | English                 | White    | 1 - 2 year Diploma         |
| 4          | Female | 31  | English                 | Indian   | Bachelor's Degree          |
| 5          | Male   | 31  | Afrikaans               | Coloured | 3 - 6 month Diploma        |
| 6          | Female | 22  | English                 | White    | Not provided               |
| 7          | Female | 30  | English                 | White    | 1 - 2 year Diploma         |
| 8          | Male   | 25  | English                 | White    | Bachelor's Degree          |
| 9          | Male   | 25  | English                 | White    | Honours Degree             |
| 10         | Female | 58  | English                 | White    | 3 year Diploma             |
| 11         | Male   | 31  | Xhosa                   | Black    | Bachelor's Degree          |
| 12         | Female | 42  | English                 | White    | 3 year Diploma             |
| 13         | Male   | 36  | South Indian<br>(other) | Indian   | Master's Degree            |
| 14         | Female | 48  | Venda                   | Black    | 3 - 6 month Diploma        |
| 15         | Female | 34  | English                 | White    | 1 - 2 year Diploma         |
| 16         | Male   | 23  | English                 | White    | Bachelor's Degree          |
| 17         | Female | 37  | Ndebele                 | Black    | 1 - 2 year Diploma         |
| 18         | Female | 49  | Afrikaans               | Coloured | Missing (not<br>completed) |
| 19         | Female | 23  | Afrikaans               | White    | I did not study<br>further |
| 20         | Male   | 31  | Tswana                  | Black    | 1 - 2 year Diploma         |

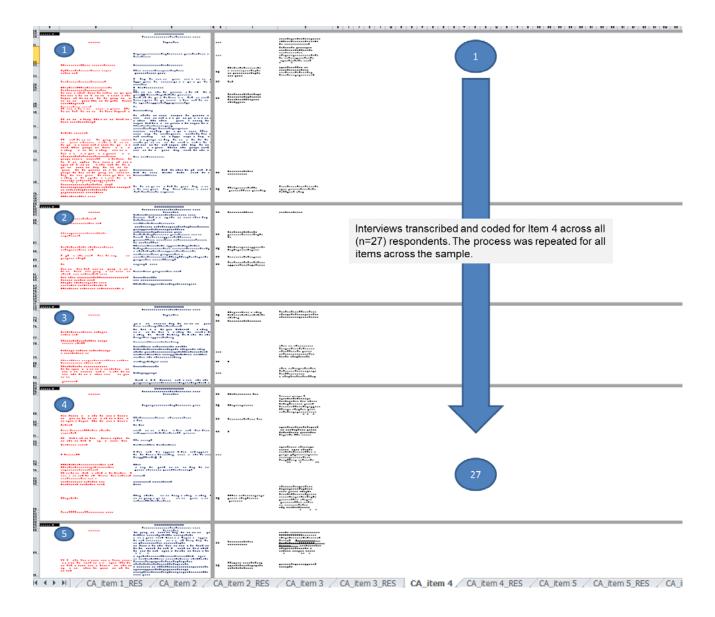
| 21 | Female | 35 | Tsonga  | Black | Bachelor's Degree  |
|----|--------|----|---------|-------|--------------------|
| 22 | Female | 28 | Zulu    | Black | 1 - 2 year Diploma |
| 23 | Female | 29 | English | White | 1 - 2 year Diploma |
| 24 | Female | 30 | English | White | 1 - 2 year Diploma |
| 25 | Female | 46 | English | White | 3 year Diploma     |
| 26 | Male   | 22 | Sotho   | Black | Bachelor's Degree  |
| 27 | Female | 33 | English | White | 3 year Diploma     |

## **APPENDIX B: Informed consent to participate in the research study**

| ACT   |
|---|
| a division of Assessment Centra Technologies (Ph) tod<br>Obrados: JAC Sebare (Mocopita)<br>   |
| www.actechnologies.co.za  |
| PO Box 1532, Binaklyn Saucen (CDS<br>Swith 2011, Brackhald Werk, 2013 Widdel Sawat<br>Nav, Klantibinaenic, Protocia   |
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| INFORMED CONSENT  |
| <ul> <li>↓ ↓</li> <li>↓ ↓</li></ul> |
| I understand that all information acquired during the interview will be treated as private and<br>confidential, and only the relevant parties will have access to the reported information.   |
| I am aware and comfortable with the interview being recorded for later analysis.  |
| I have completed the requested information in the Biographical Questionnaire and declare the information contained therein to be true.  |
| I am also aware that should I feel uncomfortable at any stage during the process, I am free to<br>withdraw.   |
| Signature:  |
| Place: Bygeston,  |
| Date: 3 Darehen   |
| Date of Birth: 790224   |
| Signature (Project Coordinator):  |
|   |

### APPENDIX C: Method of interview transcription and data capturing

| Interview #1 |   | STATEMENT 4: TEI Q.54   |      | EXTRACTION OF THE VERBATIM<br>RESPONSE  | RESEARCHER NOTES  |  |  |
|--------------|---|---|------|---|---|--|--|
|              | Interviewer   | Respondent  | P1   | Asks if you would do something with<br>excellence if it is not really important to  |   |  |  |
|              |   | Flik  | -2   | Measures how self-involved a person is  | as a way of measuring how selfish a person  |  |  |
|              | What's that statement asking from you? What do I want to<br>know from you if I present that to you?   | I think the question with that statement is hmm, would you put<br>effort – would you do something with excellence that's not really<br>important to you? If it's not really important to you it might be<br>very important to someone else. And depending on what it is, will<br>you do it with excellence. Are you able to do something with<br>excellence that's not really important to you? Wight be important<br>to someone else, but can you still do it excellently. | Р5   | •   |   |  |  |
|              |   | Let's say how self-involved a person is. Vould they do things<br>that is important to them only? Or will they give freely. Or is this<br>person just looking after their own interest.  | note |   | Respondent makes the case for the relative<br>importance of something. If something is<br>personally not important to gou, will gou stil  |  |  |
|              | All right. Vould you perhaps want to change that statement<br>into a different statement to make it's meaning more clear  | No.   |      |   | do it well?   |  |  |
|              | And where would you rate yourself in terms of that  | Like at a four.   |      |   |   |  |  |
|              | A four. Ok, onto statement five.  |   | _    |   |   |  |  |
|              |   |   | _    |   |   |  |  |
| nterview 🛿 2 |   | STATEMENT 4: TEI Q.54   |      |   |   |  |  |
|              |   | "I like putting effort even into things that are not really   |      |   | Respondent makes reference to the   |  |  |
|              | Interviewer   | Hespondent  | P1   | Asks how much focus you give to things<br>that you've judged as not being important<br>to you   | grammatical structure of the sentence and<br>notes it as poor. The word 'even' is not in<br>the right place and renders the sentence  |  |  |
|              |   | I like putting effort even into things that are not really<br>impc<br>to rc   |      |   | Prioritisation comes in as a behaviour relevant to this statement   |  |  |
|              | Vhg?  | I like putting effort – what is- ja, maybe that even is just, it's not<br>a very flowing sentence. Maybe there's some sort of punctuation<br>missing or, maybe that 'even' needs to be moved.   |      |   |   |  |  |
|              | If you could move the feven?. Where would you move it<br>(to)?  | I would actually rephrase the sentence saying: I like putting effort into things, even if they are not really important   | note | Respondent gives a nice rephrase of the statement: "I like putting effort into thing:<br>even if they are not really important". Not however, that this change does not affeo<br>meaning that the statement has for the respondent - just makes |   |  |  |
|              | And how is the meaning of what you've just said, different from the meaning it has for you, with 'even' remaining   | No.<br>getting at.  |      |   |   |  |  |
|              | from the meaning it has for you, with "even" remaining  | Hmm, it is again asking how much focus to you give to things  | -    |   |   |  |  |
|              | And what's it been getting at?  | that are not, according to your mind, important. So if you<br>prioritise certain activities, and activities that are at the bottom<br>of that priority list, do you give the same amount of focus, time,<br>deliberation, and execution, that you give to items or activities<br>that are at the top of your priority list.   | P1   | Asks if you give the same amount of<br>focus, dedication, time to activities at the<br>bottom of your list to those at the top of<br>your list  |   |  |  |
|              |   | It could be very much their work-ethic, their value system, in<br>terms of are they completing each task with a simultaneous<br>amount of equal amount of effort.   | P2   | Measures an individual's work ethic   |   |  |  |
|              | What would you be saying of yourself if you give yourself a seven on that statement?  | That you give all activities and all tasks or hmm, (all) decisions<br>or considerations equal importance.   | P2   | Measures an individual's value system<br>with regards to work   | the respondent frames his understanding o<br>the statement to refer to whether, as a<br>matter of work ethic, and work related<br>values, a person will dedicate an equal                             |  |  |
|              | And if you had to give it a one?  | That you prioritise activities, decisions and tasks, and the tasks<br>that are high on that list, you give more effort, more time and<br>more consideration, more quality.  | P4   | Describes an individual who ascribes<br>equal importance to all activities and<br>tasks   |   |  |  |
|              | Vith all of that being said and you having your<br>understanding of the statement, would you want to rather –<br>with the exception of moving even around – is there not<br>another way in which it's better for you to get to the point,<br>more easily? | Hmm, you could maybe – and again, it is not really changing<br>what's being measured, it's just a different way of saying it, l<br>imagine – would be to say something like : 4 prefer putting more<br>effort into things that are not important'.  | P3   | Describes an individual who prioritises<br>their activities, and then focus their<br>efforts on that which is high on their list (<br>of greater importance to them)  | for this respondent, this is about<br>prioritisation, and focusing the efforts whe<br>it is required most - as determined by the<br>relative importance of whatever the task <i>i</i><br>activity is. |  |  |



#### APPENDIX D: Layout of data for item 4 across all (n = 27) interviews

## APPENDIX E: Example of coding question 1 for item 4

| DTAL RESPONSES PROVIDED:<br>(n=36) |           | YOU WANT TO KNOW IF  |   |  |   |  |   |                                   |   |   |
|------------------------------------|-----------|--|---|--|---|--|---|-----------------------------------|---|---|
| % OF RESPONSES                     |           | 67%  |   | 19%  |   | 6%   |   | 6%                                |   | 3%  |
| NUMBER OF UNITS CODED              |           | 24   |   | 7  |   | 2  |   | 2                                 |   | 1   |
|                                    |           | OTHER  |   | IF YOU WILL DO WELL, FOCUS<br>ON, OR APPLY EFFORT TO<br>TASKS THAT ARE NOT<br>IMPORTANT TO YOU         |   | I AM MOTIVATED TO APPLY<br>EFFORT TO TASKS THAT ARE<br>NOT IMPORTANT TO ME, BUT<br>IMPORTANT TO SOMEONE<br>ELSE  |   | IF A PERSON IS<br>PERFECTIONIST   |   | ATTITUDE  |
|                                    |           | Asks if a person diverts from something that<br>they need to do, and rather do other things                | 1 | Asks if you would do something<br>with excellence if it is not really<br>important to you              | 1 | Asks if you like doing things that<br>you feel are not important, but<br>might be important to somebody<br>else. | 1 | Asks if a person is perfectionist | • | Asks about a person's appro<br>to things, the type of attitude<br>(passion) |
|                                    | 2         | Asks whether a person likes to evade work or<br>duty, or goof off.   | z | Asks how much focus you give<br>to things that you've judged as<br>not being important to you          | z | Asks if you will put effort into<br>something that isn't important to<br>you, but important to someone           | z | Asks if a person is perfectionist | z |   |
|                                    | 3         | Asks about a person's ambition   | 3 | Asks how much effort you're<br>going to put into something that<br>is not really important to you      |   |  |   |                                   |   |   |
|                                    | 4         | Asks if a person thinks about the small things   | 4 | Asks if you like putting effort<br>into things that you feel are not                                   |   |  |   |                                   |   |   |
|                                    |           | Asks how much you value even the smallest<br>things in life  | 5 | Asks if a person puts effort into things that are not important  |   |  |   |                                   |   |   |
|                                    | ۴         | Asks if a person pags attention to detail  | ٤ | Asks if a person puts effort into<br>things that are not really  |   |  |   |                                   |   |   |
|                                    |           | Asks if a person is able to effectively manage<br>their time   | 7 | Asks if a person gives their best,<br>even on things that they don't<br>necessarily think is important |   |  |   |                                   |   |   |
|                                    | *         | Asks if a person is able to prioritise   |   |  | 1 |  |   |                                   |   |   |
|                                    | ,         | Asks whether a person puts their energy into the   | 1 |  |   |  |   |                                   |   |   |
|                                    |           | right place<br>Asks if a person knows what is important to<br>them in their life.                          | 1 |  |   |  |   |                                   |   |   |
|                                    |           | Asks if a person can exercise appropriate<br>judgment of the relative importance of<br>something           |   |  |   |  |   |                                   |   |   |
|                                    |           | Asks whether a person likes to waste their time<br>on unimportant stuff                                    |   |  |   |  |   |                                   |   |   |
|                                    | 13        | Asks if a person can motivate themselves   | ] |  |   |  |   |                                   |   |   |
|                                    |           | Asks if a person is competent<br>Asks if a person tries to put effort into things                          |   |  |   |  |   |                                   |   |   |
|                                    | 15        | that other people think are pointless<br>Asks if I follow through on things                                |   |  |   |  |   |                                   |   |   |
|                                    | $\vdash$  | Asks if you are thorough   | 1 |  |   |  |   |                                   |   |   |
|                                    | 11        | Asks if a person takes pride in what they do,<br>regardless of whether it is important or not              | 1 |  |   |  |   |                                   |   |   |
|                                    | $\square$ | Asks if you give the same amount of focus,   | 1 |  |   |  |   |                                   |   |   |
|                                    |           | dedication, time to activities at the bottom of<br>your list to those at the top of your list              |   |  |   |  |   |                                   |   |   |
|                                    | 2.        | Ask if you will just do things if they have no   | 1 |  |   |  |   |                                   |   |   |
|                                    |           | meaning for you<br>Asks if a person is motivated to doing a good   | { |  |   |  |   |                                   |   |   |
|                                    |           | job of anything, regardless of whether they like   |   |  |   |  |   |                                   |   |   |
|                                    |           | it or not<br>Asks about the difference in the amount of  | 1 |  |   |  |   |                                   |   |   |
|                                    |           | effort put into things that are important, relative  |   |  |   |  |   |                                   |   |   |
|                                    |           | <u>to things that aren't important.</u><br>Asks if a person will put effort into things they<br>don't like | 1 |  |   |  |   |                                   |   |   |
|                                    |           | Asks if you put effort into both the important   | 1 |  |   |  |   |                                   |   |   |

## APPENDIX F: Example of coding question 2 for item 4

| TOTAL RESPONSES<br>PROVIDED: (n=31) |    | THIS STATEMENT IS TRYING TO   | ) ME | ASURE_  |   |  |   |   |   |   |
|-------------------------------------|----|---|------|---|---|--|---|---|---|---|
| % OF RESPONSES                      |    | 55%   |      | 16%   |   | 13%  |   | 10%   |   | 6%  |
| NUMBER OF UNITS CODED               |    | 17  |      | 5   |   | 4  |   | 3   |   | 2   |
|                                     |    | OTHER   |      | <b>VORK ETHIC</b>   |   | ABILITY TO PRIORITISE  |   | EFFORT PUT INTO THINGS<br>THAT ARE NOT IMPORTANT                                      |   | CONSCIENTIOUSNESS                             |
|                                     | 1  | Measures if an individual regards<br>everything as of equal<br>importance   | 1    | Measures an individual's work<br>ethic                        | 1 | Measures an individual's ability<br>to prioritise  | 1 | Measures whether an individual<br>puts effort into things that aren't<br>important    | 1 | Measures an individual's<br>conscientiousness |
|                                     | 2  | Measures an individual's sense<br>of commitment   | 2    | Measures an individual's work<br>ethic                        | 2 | Measure's an individuals<br>judgment abilities   | 2 | Measures whether an individual<br>puts effort into things that aren't<br>important    | 2 | Measures an individual's<br>conscientiousness |
|                                     | 3  | Measures to what extent an<br>individual focuses on the less<br>important things in their life.                             | 3    | Measures an individual's work<br>ethic                        | 3 | Measures an individual's sense<br>of priority in life - whether<br>everything is important, or if you<br>differentiate by importance | 3 | Measures if an individual puts<br>effort into things that are not<br>really important |   |   |
|                                     | 4  | Measures what type of individual<br>I am  | 4    | Measures an individual's value<br>system with regards to work | 4 | Measures whether an individual<br>has their priorities straight in life  |   |   |   |   |
|                                     | 5  | Measures if an individual can<br>persist in doing a task they don't<br>like   | 5    | Measure's an individual's <del>v</del> ork<br>values          |   |  |   |   |   |   |
|                                     | 6  | Measures an individual's will.  |      |   |   |  |   |   |   |   |
|                                     | 7  | Measures an individual's<br>empathy or concern for other<br>people  |      |   |   |  |   |   |   |   |
|                                     | 8  | Measures an individual's<br>competence  |      |   |   |  |   |   |   |   |
|                                     | 9  | Measures an individual's<br>ambition  |      |   |   |  |   |   |   |   |
|                                     | 10 | Measures an individual's focus<br>in what they're doing   |      |   |   |  |   |   |   |   |
|                                     | 11 | Measures an individual's<br>passion   |      |   |   |  |   |   |   |   |
|                                     | 12 | Measures how self-involved a<br>person is   |      |   |   |  |   |   |   |   |
|                                     | 13 | Measures what type of a person<br>you are, if you're caring, or<br>uncaring   |      |   |   |  |   |   |   |   |
|                                     | 14 | Measures whether an individual<br>take to things lightly, or whether<br>they take to things seriously and<br>commit to them |      |   |   |  |   |   |   |   |
|                                     | 15 | Measures whether an individual<br>pays attention to detail, is a<br>perfectionist, meticulousness                           |      |   |   |  |   |   |   |   |
|                                     | 16 | Measures an individual's sense<br>of pride  |      |   |   |  |   |   |   |   |
|                                     | 17 | Measures an individual's self-<br>motivation  |      |   |   |  |   |   |   |   |