# Employees' work engagement and job commitment: The moderating role of career anchors

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#### Read online:



Scan this QR code with your smart phone or mobile device to read online. **Orientation:** Organisations continue to focus on human resource initiatives for enhancing employee commitment, satisfaction and engagement in order to gain a competitive edge in a dynamic and fast-changing marketplace.

**Research purpose:** The objective of the present study was to assess whether individuals' career anchors (measured by the career orientations inventory) significantly moderate the relationship between their work engagement (measured by the Utrecht work engagement scale) and job commitment (measured by the organisation-related commitment scale).

**Motivation for the study:** Although the literature review suggests that people's work engagement and job commitment may be influenced by their career anchors, there seems to be a paucity of research examining the interaction effects between these three variables.

Research approach, design and method: A cross-sectional quantitative survey approach was used. A non-probability purposive sample of adults (N = 318) employed in a human resource capacity in the South African service industry participated in the study. Stepwise hierarchical moderated regression analysis was performed to achieve the objective of the study.

**Main findings:** The results showed that the work engagement-job commitment relationship was generally stronger for high career anchor preferences than for low career anchor preferences.

**Practical/managerial implications:** The results of the study can be useful when human resource interventions for enhancing employees' engagement and commitment are developed.

**Contribution:** The results of the study add new insights to the career literature by showing that people's career self-concepts (as reflected by their career anchors) are important to consider in enhancing their work engagement and job commitment.

#### Introduction

#### **Key focus**

Researchers continue to emphasise the importance of studying employees' engagement and commitment because of the impact thereof on the successful performance of an organisation (Chovwen 2012; Field & Buitendach 2011; Lumley 2009; Nurittamont 2012; Mendes & Stander 2011). Committed and engaged employees are regarded as valued assets in organisations (Bothma & Roodt 2012; Ncube & Jerie 2012; Nurittamont 2012). Organisations therefore continue to focus on human resource initiatives that enhance the commitment, satisfaction and engagement of their employees (Ncube & Jerie 2012; Soulsby 2012; Takash 2012; Vuori, Toppinen-Tanner & Mutanen 2012).

#### Background to the study

A central challenge in enhancing employees' engagement and commitment is to create work conditions that facilitate perceptions of fit or congruence between individuals' career self-concepts, values, needs and desires and the characteristics of their jobs (Lumley 2009; Tan & Quek 2001), and the organisation's cultural values, practices and objectives (Lumley 2009; Martins & Coetzee 2007, 2011). People's inner work lives, their self-identities, inner career goals, motivations and desires, and the characteristics of their jobs have been shown to influence their attitudes toward their jobs and the organisation (Amabile & Kramer 2012; Bothma & Roodt 2012; Hirschi 2012; Lumley 2009; Yuan *et al.* 2012) because they appear to act as a motivating force that generate feelings of engagement and commitment (Coetzee & De Villiers 2010; Döckel 2003; Meyer, Stanley & Parfyonova 2012; Oyewobi, Suleiman & Jamil 2012; Roodt 1997).

People's self-concepts have been related to their continuing commitment (Johnson, Chang & Yang 2010; Vandenberghe & Panaccio 2012) and work engagement (Bothma & Roodt 2012).

Self-concepts are based on self-definitions, which flow from one's sense of uniqueness and how one compares to others, and reflect a focus on one's own interests. Once the selfconcept has been formed, it functions as a stabilising force, an anchor, and can therefore be thought of as the values and motives that the person will not give up if forced to make a choice (Schein 1996). Individual self-concepts instil the willingness to preserve valued outcomes (i.e. autonomy, rewards, recognition and growth or development) in the employment relationship and minimise resource losses (i.e. personal characteristics such as talents, abilities, values and motives and conditions and energies that are valued in their own right) (Vandenberghe & Panaccio 2012; Schein 1996). Feeling that one has retained valued personal resources in the person-environment interaction results in the feeling that one is in a position to devote enough energy to a line of action; in other words one has higher levels of motivation, engagement and commitment (Ferreira 2012; Powell & Meyer 2004; Tladinyane 2012; Vandenberghe & Panaccio 2012). Engagement (i.e. high levels of energy, dedication and absorption in one's work) and commitment (i.e. high levels of job attachment and motivation) may help to strengthen the career identity through concrete job-related experiences and feedback that are congruent with the individual's interests and integrated with their abilities and values (Weber & Ladkin 2009). Research also provides evidence of a positive relationship between the characteristics of people's jobs (i.e. challenging tasks, skills variety, high levels of job responsibility, task autonomy, task feedback and task identity) and their work engagement and commitment to their jobs (Crawford, LePine & Rich 2010; Döckel 2003; Vandenberghe & Panaccio 2012; Van Dyk 2011).

In this study we seek to understand the fit between individuals' work engagement, their career self-concepts (as expressed by their career anchors) and their job commitment. The career anchor is the important motivational element of people's internal careers and is a reflection of the individual's career self-concept, which consists of personal resources such as self-perceived talents and abilities, basic values and the evolved sense of motives and needs as they pertain to the career (Schein 1996, 2006). An incongruence between an individual's career anchor and the work environment leads to dissatisfaction (Tan & Quek 2001). Congruence includes satisfaction with the work or job characteristics, pay and benefits, promotion system and advancement opportunities (Schein 2006). Tying people's career self-concepts (career anchors) to their jobs may help to understand the motivational underpinnings of their work engagement and job commitment (Bothma & Roodt 2012; Coetzee & De Villiers 2010; Hirschi 2012; Lumley 2009; Vandenberghe & Panaccio 2012).

#### Literature review

#### Work engagement

Work engagement is an active and positive work-related state that is characterised by feelings of vigour (energy), dedication and absorption in one's work (Schaufeli, Bakker & Salanova 2006) and an increase in job resources over time (Schaufeli, Bakker & Van Rhenen 2009). High mental resilience and high levels of energy in the workplace, clear and conscientious efforts to devote oneself to work and persistence when facing difficulties demonstrate vigour. Vigour helps individuals to be more sensitive to opportunities at work and fosters a more proactive work style (Brummelhuis & Bakker 2012). Dedication is indicated by enthusiasm, inspiration and pride; absorption entails full concentration and being highly and happily engrossed in one's work (Bakker 2011; Kassing *et al.* 2012).

Work engagement benefits the organisation by stimulating task and contextual performance (Halbesleben, Harvwey & Bolino 2009). Disengagement from work may result in employee turnover, absenteeism and poor performance (Caldwell, Chatman & O'Reilly 1990; Coetzer & Rothmann 2007), whilst work engagement may result in job performance and satisfaction, organisational commitment and lower turnover intention (Bothma & Roodt 2012; Field & Buitendach 2011; Mendes & Stander 2011; Newman, Joseph & Hulin 2010; Salanova, Agut & Peiro 2005; Schaufeli & Bakker 2004). A survey by Brotherton (2012) showed employees' engagement to be influenced by their career-related needs and desires, the working environment and the type of work they are performing. Bothma and Roodt (2012) found individuals' work-based identity to be significantly related to their work engagement. According to these authors, people's job involvement and commitment are a consequence of their work-based identities and engagement.

#### Job commitment

The present study focuses on work-related commitment and more specifically individuals' commitment to their jobs. Roodt (1997) views job commitment as the individual's level of involvement in their job, the importance the individual attaches to the job and the willingness of the individual to dedicate the necessary time and energy to the job. Tladinyane (2012) found a significant positive relationship between individuals' work engagement and their job commitment. High levels of job commitment are associated with positive feelings about one's job and the nature of the job tasks (Tladinyane 2012). Theories of person-environment fit posit that people's career choices are based on the general notion that they perform better and are more satisfied in occupational environments that match their interests or other personal variables (Durr & Tracey 2009). It appears from the research literature that career self-efficacy beliefs help to stabilise the career self-concept and involvement in the job (Schreuder & Coetzee 2011). Research provides evidence that greater similarity between individuals' interests and the work type leads to increased similarities between competence beliefs and work type (Durr & Tracey 2009). Levi (2006) and Lumley (2009) found individuals' career anchors to be significantly associated with their satisfaction with the characteristics of their jobs. Career anchors are typically associated with different preferences regarding the nature of a job (Schein 1996), which in turn may influence people's level of job

involvement (Coetzee & De Villiers 2010). Schein (1996) made the assumption that individuals with a greater fit between their career anchors and work environment (including the person-job fit) will have greater work effectiveness, job satisfaction and job stability.

#### **Career anchors**

In the context of the present study, we focus on career anchors as a reflection of a person's career self-concept, which acts as an important motivational element of people's internal career and their career choices and attitudes (i.e. job commitment) (Schein 1996, 2006). The career self-concept develops as people progress through their careers and is a product of the interaction between the individual and the workplace (Wils, Wils & Tremblay 2010). The career anchor reflects people's long-term preferences regarding their work and work environment and how they would like to express or utilise personal resources around three poles: (1) self-perceived work talents and abilities, (2) self-perceived motives and needs and (3) basic values and attitudes as they pertain to the career (Schein 1996, 2006). Although Schein (1996) maintains that over time a single career anchor emerges that stabilises, guides and constrains an individual's career path, research provides evidence that individuals can develop more than one strong career anchor (Coetzee & Schreuder 2008; Feldman & Bolino 1996; Ramakrishna & Potosky 2003; Schein 1996; Wils et al. 2010).

Feldman and Bolino (1996) clustered the eight career anchors defined by Schein (1978) into three groups of anchors: talents and abilities, motives and needs and attitudes and values. Table 1 summarises the core motives and values underpinning each of the eight career anchors. Feldman and Bolino (1996) posit that an individual can have a dominant career anchor in each of these three categories. According to

Feldman and Bolino, the technical competence, managerial competence and entrepreneurial creativity anchors pertain to the work talents of individuals as they centre on the work that individuals perform each day. The security or stability, autonomy or independence and lifestyle anchors represent motives and needs and refer to the way individuals attempt to structure their work according to their basic personal desires and lives. The service or dedication to a cause anchor and the pure challenge anchors represent attitudes and values and are related to ways individuals identify with their occupations and their organisational cultures (Wils et al. 2010). The notion of a multiple career profile emphasises the importance of considering the diverse and unique career development needs of people in interventions focusing on enhancing employees' engagement and commitment (Schreuder & Coetzee 2011).

Research has revealed a relationship between people's career anchors and their jobs and occupations. Congruence between the career self-concept (as reflected by the dominant career anchor) and the job or occupation is a key attribute of Schein's model (Cerdin & Pargneux 2010). The selfperceived fit between individuals' career anchors and their jobs and occupations significantly influences their subjective experiences of their work (i.e. job and career satisfaction, life satisfaction and perceptions of work as a valuable activity) (Coetzee, Bergh & Schreuder 2010; Ellison & Schreuder 2001). Research by Steele and Francis-Smythe (2010) showed that career anchors can be matched to job roles and that an optimal fit between individuals' career anchors and the nature of their job roles increases their job satisfaction and organisational commitment. Coetzee, Schreuder and Tladinyane (2007) also found significant associations between people's career anchors and their organisational commitment. Sortheix et al. (2013) found a positive association between people's career

 TABLE 1: Core workplace desires and values underlying people's career anchors.

Career anchor	Motivations	Core desire from workplace	Core value	
Talents and abilities- based career anchor	Technical/functional competence: The achievement of expert status amongst peers	Challenging work that tests one's talents, abilities and skills	Specialisation; further learning and development in one's specialty	
motivations	General managerial competence: Willingness to solve complex, whole-of-organisation problems and undertake subsequent decision-making	High level of responsibility; challenging, varied and integrative work; opportunities for leadership, contributing to the success of the organisation	Power and influence; advancement up the corporate ladder	
	Entrepreneurial creativity: Opportunity for creativity and identification of new businesses, products or services	Challenging opportunities to create own enterprises, create or invent new products or services	Power and freedom to create wealth; high personal visibility and public recognition	
Motives and needs-based career anchor motivations	Autonomy/Independence: Personal freedom in job content and settings	Clearly delineated, time-bounded kinds of work within own area of expertise which allows one to accomplish tasks/goals on one's own terms, in one' own way	Freedom to achieve and demonstrate one's competence	
	Security/stability: Long-term employment for health benefits and retirement options	Job tenure and job security; retirement plan and benefits; rewarding, steady, predictable performance	Predictability and being rewarded for length of service	
	Lifestyle: Balancing one's personal and the family's welfare with work commitments	Respect for personal and family concerns and openness to renegotiate the psychological contract in line with changing lifestyle needs	Flexibility and freedom to balance work-family life	
Attitudes and values- based career anchor motivations	Service/dedication to a cause: Working for the greater good of organisations or communities	Opportunities to influence the employing organisation or social policies in the direction of one's personal values; serving a higher purpose in line with one's personal values	Influence and freedom to operate autonomously in the pursuit of one's personal values or higher life purpose or goal	
	Pure challenge: Testing personal endurance through risky projects or physically challenging work	Tasks or situations that provide a constant variety of challenging opportunities for self-tests	Power and influence to be competitive and win	

Source: Based on Coetzee, M., & Schreuder, A.M.G. (2008). A multi-cultural investigation of students' career anchors at a South African higher education institution. SA Journal of Labour Relations, 32(2), 45–65.

values and their work engagement. Boshoff, Bennett and Kellerman (1994) also found career anchors to be a significant predictor of people's job involvement.

In the present study, the researchers were interested in examining the moderating effect of career anchors on the relationship between individuals' work engagement and job commitment. A moderator is characterised as an innate attribute or a relatively stable trait, personality type or disposition (such as people's career anchor preferences) that acts as an auxiliary variable to refine a hypothesised bivariate causal relationship between an independent and dependent variable (Wu & Zumbo 2008). Moderators explain the strength and direction of the causal effect of the focal independent variable (i.e. work engagement) on the dependent variable (i.e. job commitment) (Wu & Zumbo 2008).

Based on the literature review, we proposed the following research hypothesis:

 $\mathbf{H_{i}}$ : Career anchors will moderate the relation between work engagement and job commitment such that work engagement will be more strongly related to job commitment for individuals with a high preference for a particular career anchor.

In sum, it was expected that there would be two-way interactions between individuals' career anchors and their work engagement, and that these interactions will significantly influence or predict their level of job commitment because of the self-perceived talents and abilities, motives and needs and attitudes and values underpinning their career anchors.

#### Research objective

Although the literature review suggests that people's work engagement and job commitment may be influenced by their career anchors, there seems to be a paucity of research examining the interaction effects between these three variables. The objective of the present study was therefore to assess whether individuals' career anchors significantly moderate the relationship between their work engagement and job commitment.

#### Potential value-add

Understanding the interaction between individuals' work engagement, career anchors and their job commitment can be useful when human resource interventions for enhancing employees' engagement and job commitment are developed. Such interventions may help to optimise the congruence between employees' career anchors and their jobs, which may in turn increase their levels of engagement and job commitment and potentially lead to optimal individual and organisational performance (Tan & Quek 2001).

#### What will follow

The next section outlines the research design. The results are then reported and discussed.

#### Research design

#### Research approach

A cross-sectional quantitative survey design was used to achieve the research objective.

#### Research method

#### **Participants**

A non-probability purposive sample of adults (N = 318) employed in a human resource capacity in the South African service industry participated in the study. Overall, the majority of the participants were Black people (76%). They were also predominantly female (76%) and in the early adulthood life stage and establishment phase of their careers (84% = 26–40 years). The participants occupied staff level (57%) and managerial level (43%) positions in the South African services industry.

#### Measuring instruments

The career orientations inventory (COI) (Schein 2006) was used to measure the career anchors of the participants. The COI is an established instrument that has been used to measure career anchors both internationally and in South Africa. The COI is a self-report measure that contains 40 items. Responses are captured on a six-point Likert scale. The COI has evidenced good psychometric validity and reliability in other South African multi-cultural samples (Coetzee & De Villiers 2010; Coetzee & Schreuder 2008, 2009; Coetzee, Schreuder & Tladinyane 2007; Ellison & Schreuder 2000). Acceptable Cronbach's alpha coefficients were obtained for the present study: technical or functional (0.60), general management (0.74), autonomy (0.75), security or stability (0.83), entrepreneurial creativity (0.84), service or dedication to a cause (0.81), pure challenge (0.80) and life style (0.73). Because of the relatively low internal consistency reliability of the technical or functional subscale, this career anchor was omitted from the statistical analysis.

The participants' work engagement was measured by means of the Utrecht work engagement scale (UWES) (Schaufeli & Bakker 2003). The UWES is a self-report questionnaire that includes 21 items. It is divided into three subscales (vigour, dedication and absorption). A six-point Likert-type scale was used for subject responses to each of the 21 items. Coetzer and Rothmann (2007) confirmed the internal consistency reliability and construct validity of the UWES for the South African context. High Cronbach's alpha coefficients were obtained for the present study: vigour (0.89), dedication (0.92) and absorption (0.90).

The participants' job commitment was measured by means of the job commitment foci subscale of the organisation-related commitment scale (OCS) developed by Roodt (1997). The job commitment foci subscale of the OCS is a self-report scale that includes six items, measuring responses on a five-point Likert-type scale. Acceptable construct validity and

internal consistency reliabilities for the OCS and its subscales of over 0.90 were reported by Roodt (1997), Storm and Roodt (2002) and Pretorius and Roodt (2004). A Cronbach's alpha coefficient of 0.67 was obtained for the present study. Because the internal consistency reliability of the scale was close to 0.70, it was regarded as acceptable to warrant further statistical analysis. Nunnaly and Bernstein (1994) use a Cronbach's alpha coefficient of 0.70 as a directive, whilst Resi and Judd (2000) argue that between 0.80 and 0.60 is acceptable for research purposes.

#### Research procedure

Data were collected by mailing questionnaires to a purposive sample of employed adults enrolled for Honours-level distance learning studies in the field of industrial and organisational psychology in a particular year of study (N = 628). An analysis of the biographical data showed that they were all employed in a human resource capacity in the South African service industry. The postal facilities of the higher education institution were used. Additional participants were requested to complete the questionnaires during the annual discussion classes. The researchers made sure that no participant completed a questionnaire twice by checking that the student numbers on the questionnaires returned by mail were not duplicated in the questionnaires completed during the discussion classes. Permission for the research was obtained from the institution's research ethics committee. The purpose of the study was communicated to all participants in the questionnaire booklet. Participation was voluntary and the respondents gave their permission for the results to be used for research purposes only. The anonymity and confidentiality of all the participants was ensured. A sample of 318 usable questionnaires was returned, yielding a response rate of 51%.

#### Statistical analysis

Descriptive, correlation and inferential statistics (stepwise hierarchical moderated regression analysis) were used to analyse the data. The statistical analysis was carried out with the help of the Statistical Package for Social Sciences (SPSS) version 20 for Windows software (SPSS 2010). With exception of the technical or functional career anchor (too low internal consistency reliability), we were interested in assessing the moderating effect of the other seven career anchors because each career anchor represents a unique set of career motives, values, needs and interests (Schein 2006). Following the guidelines of Aiken and West (1991), predictor variables were mean-centered before computing the interaction terms. Regression models were computed on each of the seven career anchors in terms of their moderating effect on the relationship between the UWES variables (independent variables) and the OCS job commitment subscale (dependent variable). In order to counter the probability of a type 1 error, the significance value was set at the 95% confidence interval level ( $p \le 0.05$ ). For the purposes of this study, Cohen's (1992) f<sup>2</sup> effect sizes were calculated for establishing the practical significance of the  $\Delta R^2$  values.

#### **Results**

The descriptive statistics and correlations amongst the COI, UWES and OCS job commitment variables are displayed in Table 2. Because of the relatively low internal consistency reliability of the technical or functional subscale, this career anchor was omitted from the statistical analysis.

#### **Correlations**

The results show that the work engagement variables were significantly and positively related to job commitment ( $r \ge 0.30 \le 0.34$ ; medium practical effect;  $p \le .001$ ). With the exception of the lifestyle and autonomy career anchors, all the other career anchors related positively and significantly to job commitment ( $r \ge 0.17 \le 0.24$ ; small practical effect;  $p \le .001$ ).

The general management (r = 0.14; small practical effect;  $p \le 0.05$ ), service or dedication to a cause (r = 0.17; small practical effect;  $p \le 0.01$ ) and pure challenge (r = 0.20; small practical effect;  $p \le 0.001$ ) career anchors related significantly and positively to vigour.

The general management (r=0.13; small practical effect;  $p \le 0.05$ ) career anchor related significantly and positively to dedication. The general management (r=0.17; small practical effect;  $p \le 0.01$ ), service or dedication to a cause (r=0.17; small practical effect;  $p \le 0.01$ ) and pure challenge (r=0.17; small practical effect;  $p \le 0.01$ ) career anchors related significantly and positively to absorption.

These results show that the zero-order correlations were well below the threshold level of concern ( $r \ge 0.80$ ) about multicollinearity (Field 2009) and warranted further analysis in the form of stepwise hierarchical moderated regression analyses.

## Career anchors as moderators of the relationship between work engagement and job commitment: Interaction effects

Table 3 reports only the significant interaction effects between the variables. In terms of the talents and abilitiesbased career anchors, Table 3 shows that the interactions between the general management career anchor and vigour ( $\beta = 0.14$ ;  $p \le 0.01$ ), dedication ( $\beta = 0.15$ ;  $p \le 0.01$ ) and absorption ( $\beta = 0.14$ ;  $p \le 0.01$ ) were significant. The  $R^2$ change was significant ( $R^2 = 0.02$ ;  $f^2 \ge 0.02 \le 0.04$ ; small practical effect;  $p \le 0.01$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (vigour, dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the general management career anchor. However, the moderating effect of this career anchor was small in practical terms. Table 3 further shows that the interactions between the entrepreneurial creativity career anchor and dedication  $(\beta = 0.11; p \le 0.05)$  and absorption  $(\beta = 0.13; p \le 0.01)$  were significant. Vigour had no significant interaction effect with the entrepreneurial creativity career anchor. The R2 change was significant ( $R^2 = 0.01 - 0.02$ ;  $f^2 \ge 0.01 \le 0.02$ ; small practical effect;  $p \le 0.05$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the entrepreneurial creativity career anchor. However, the moderating effect of this career anchor was small in practical terms.

As previously stated, because of the relatively low internal consistency reliability of the technical or functional subscale, this career anchor was omitted from the statistical analysis.

Table 4 reports only the significant interaction effects between the variables. In terms of the motivation and needsbased career anchors, Table 4 shows that the interactions between the autonomy or independence career anchor and vigour ( $\beta = 0.12$ ;  $p \le 0.05$ ), dedication ( $\beta = 0.11$ ;  $p \le 0.01$ ) and absorption ( $\beta = 0.14$ ;  $p \le 0.01$ ) were significant. The  $R^2$ change was significant ( $R^2 = 0.01 - 0.02$ ;  $f^2 \ge 0.01 \le 0.02$ ; small practical effect;  $p \le 0.05$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (vigour, dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the autonomy or independence career anchor. However, the moderating effect of this career anchor was small in practical terms. Table 4 further shows that the interactions between the lifestyle career anchor and vigour ( $\beta = 0.14$ ;  $p \le 0.01$ ), dedication ( $\beta = 0.18$ ;  $p \le 0.001$ ) and absorption ( $\beta = 0.14$ ;  $p \le 0.01$ ) were significant. The  $R^2$  change was significant ( $R^2 = 0.02-0.03$ ;  $f^2 \ge 0.02 \le 0.04$ ; small practical effect;  $p \le 0.01$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (vigour, dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the

TABLE 2: Descriptive statistics and correlations.

TABLE IN DESCRIPTIVE Statistics and correlations.													
Variable	Mean	SD	α	1	2	3	4	5	6	7	8	9	10
Vigour (UWES)	4.28	1.19	0.89	-	-	-	-	-	-	-	-	-	-
Dedication (UWES)	4.11	1.61	0.92	0.84***	-	-	-	-	-	-	-	-	-
Absorption (UWES)	3.97	1.34	0.90	0.90***	0.86***	-	-	-	-	-	-	-	-
General management (COI)	3.69	0.99	0.74	0.14*	0.13*	0.17**	-	-	-	-	-	-	-
Autonomy (COI)	4.44	0.92	0.75	0.06	0.02	0.06	0.28***	-	-	-	-	-	-
Security/stability (COI)	4.19	1.09	0.83	-0.03	0.04	0.08	0.43***	-0.03	-	-	-	-	-
Entrepreneurial creativity (COI)	4.21	1.21	0.84	0.02	0.01	0.08	0.38***	0.53***	0.11*	-	-	-	-
Service/dedication to a cause (COI)	4.69	0.92	0.81	0.17**	0.09	0.17**	0.21***	0.33***	0.19**	0.43***	-	-	-
Pure challenge (COI)	4.66	0.87	0.80	0.20***	0.08	0.17**	0.37***	0.35***	0.10	0.48***	0.48***	-	-
Lifestyle (COI)	4.73	0.86	0.73	0.10	0.09	0.10	0.10	0.33***	0.27***	0.24***	0.52***	0.33***	-
Job commitment (CFS)	3.68	0.50	0.67	0.32***	0.30***	0.34***	0.22***	0.09	0.17***	0.18***	0.20***	0.21***	0.07

Note: Correlation values ≤ 0.29 are practically significant (small effect); Correlation value ≥ 0.30 ≤ 0.49 are practically significant (medium effect); Correlation values ≥ 0.50 are practically significant (large effect). n = 318; \*\*\*,  $p \le 0.001$ ; \*\*,  $p \le 0.01$ ; \*,  $p \le 0.05$ .

TABLE 3: Moderated regression analysis examining the interaction effects between the general management and entrepreneurial creativity career anchors and vigour, dedication and absorption (work engagement) on job commitment.

Model	Predictor variables	β	b	SE	$\Delta R^2$	Total R <sup>2</sup>	$f^2$
1	General management	0.13**	0.08	0.03	-	-	-
	Vigour	0.36***	0.11	0.02	-	-	-
	General management x vigour	0.14**	0.01	0.004	0.02* ΔF:7.35	0.18*** F: 23.18	0.02
	Entrepreneurial creativity	0.14**	0.07	0.03	-	-	-
	Dedication	0.33***	0.13	0.02	-	-	-
	Entrepreneurial creativity x dedication	0.11*	0.01	0.003	0.01* ΔF:4.65	0.15*** F: 18.60	0.01
2	General management	0.14**	0.09	0.03	-	-	-
	Dedication	0.34***	0.13	0.02	-	-	-
	General management x dedication	0.15**	0.01	0.004	0.02** ΔF:8.33	0.17*** F: 20.57	0.04
	Entrepreneurial creativity	0.12*	0.06	0.03	-	-	-
	Absorption	0.38***	0.11	0.02	-	-	-
	Entrepreneurial creativity x absorption	0.13**	0.01	0.002	0.02** ΔF:6.55	0.18*** F: 22.80	0.02
3	General management	0.11*	0.07	0.03	-	-	-
	Absorption	0.38***	0.11	0.02	-	-	-
	General management x absorption	0.14**	0.01	0.003	0.02** ΔF:7.05	0.18*** F: 23.79	0.01

n=318; \*\*\*,  $p \le 0.001;$  \*\*,  $p \le 0.01;$  \*,  $p \le 0.05.$ 

 $\Delta$ , delta;  $\beta$ , standardised regression coefficient; b, unstandardised regression coefficient; SE, standard error;  $f^2$ , effect size estimate for the interaction term; Beta values are mean-centered. Note: All statistics are from the final (second) step.

lifestyle career anchor. However, the moderating effect of this career anchor was small in practical terms. The security or stability career anchor had no significant moderating effect on the relationship between work engagement and job commitment.

In terms of the attitudes and values-based career anchors, Table 5 shows that the interactions between the pure challenge career anchor and vigour ( $\beta = 0.19$ ;  $p \le 0.001$ ), dedication  $(\beta = 0.18; p \le 0.001)$  and absorption  $(\beta = 0.16; p \le 0.01)$  were

significant. The  $R^2$  change was significant ( $R^2 = 0.03-0.04$ ;  $f^2 \ge 0.04 \le 0.05$ ; moderate practical effect;  $p \le 0.001$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (vigour, dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the pure challenge career anchor. The moderating effect of this career anchor was moderate in practical terms. Table 5 further shows that the interactions between the service or dedication to a cause career anchor and

TABLE 4: Moderated regression analysis examining the interaction effects between the autonomy and lifestyle career anchors and vigour, dedication and absorption (work engagement) on job commitment.

Model	Predictor variables	β	b	SE	$\Delta R^2$	Total R <sup>2</sup>	$f^2$	
1	Autonomy	0.03	0.02	0.04	-	-	-	
	Vigour	0.36***	0.12	0.02	-	-	-	
	Autonomy x vigour	0.12*	0.01	0.004	0.01* ΔF:4.89	0.16*** F: 19.23	0.02	
	Lifestyle	0.04	0.03	0.04	-	-	-	
	Vigour	0.38***	0.12	0.02	-	-	-	
	Lifestyle x vigour	0.14**	0.01	0.004	0.02** ΔF:7.50	0.16*** F: 20.25	0.02	
2	Autonomy	0.05	0.03	0.0.04	-	-	-	
	Dedication	0.34***	0.13	0.02	-	-	-	
	Autonomy x dedication	0.11*	0.01	0.004	0.01* ΔF:4.54	0.14*** F: 16.22	0.02	
	Lifestyle	0.05	0.03	0.04	-	-	-	
	Dedication	0.36***	0.14	0.02	-	-	-	
	Lifestyle x dedication	0.18***	0.02	0.01	0.03** ΔF:11.90	0.15*** F: 18.89	0.04	
3	Autonomy	0.04	0.02	0.03	-	-	-	
	Absorption	0.38***	0.10	0.02	-	-	-	
	Autonomy x absorption	0.14**	0.01	0.003	0.02** ∆F:7.70	0.17*** F: 21.62	0.02	
	Lifestyle	0.05	0.03	0.04	-	-	-	
	Absorption	0.39***	0.11	0.02	-	-	-	
	Lifestyle x absorption	0.14**	0.01	0.003	0.02** ΔF:7.25	0.17*** F: 21.44	0.02	

n = 318; \*\*\*,  $p \le 0.001$ ; \*\*,  $p \le 0.01$ ; \*,  $p \le 0.05$ 

A, delta; β, standardised regression coefficient; b, unstandardised regression coefficient; SE, standard error; f², effect size estimate for the interaction term; Beta values are mean-centered. Note: All statistics are from the final (second) step.

TABLE 5: Moderated regression analysis examining the interaction effects between the pure challenge and service/dedication to a cause career anchors and vigour, dedication and absorption (work engagement) on job commitment.

Model	Predictor variables	β	b	SE	$\Delta R^2$	Total R <sup>2</sup>	$f^2$	
1	Pure challenge	0.15**	0.10	0.04	-	-	-	
	Vigour	0.35***	0.11	0.02	-	-	-	
	Pure challenge x vigour	0.19*** -	0.01	0.004	0.04*** ΔF:13.71	0.20*** F: 25.52	0.05	
	Service/dedication to a cause	0.16**	0.11	0.03	-	-	-	
	Vigour	0.34***	0.11	0.02	-	-	-	
	Service/dedication to a cause x vigour	0.23***	0.02	0.004	0.05*** ΔF:20.05	0.22*** F: 28.61	0.06	
2	Pure challenge	0.19***	0.13	0.04	-	-	-	
	Dedication	0.32***	0.12	0.02	-	-	-	
	Pure challenge x dedication	0.18***	0.02	0.005	0.03*** ΔF:12.72	0.19*** F: 24.08	0.04	
	Service/dedication to a cause	0.20***	0.13	0.03	-	-	-	
	Dedication	0.32***	0.12	0.02	-	-	-	
	Service/dedication to a cause x dedication	0.21***	0.02	0.004	0.04*** ΔF:16.67	0.20*** F: 25.34	0.06	
3	Pure challenge	0.16**	0.11	0.04	-	-	-	
	Absorption	0.36***	0.10	0.02	-	-	-	
	Pure challenge x absorption	0.16**	0.01	0.003	0.03*** ΔF:9.59	0.20*** F: 25.62	0.04	
	Service/dedication to a cause	0.19***	0.12	0.03	-	-	-	
	Absorption	0.36***	0.10	0.01	-	-	-	
	Service/dedication to a cause x absorption	0.21***	0.01	0.003	0.04*** ΔF:16.93	0.22*** F: 28.57	0.06	

 $n = 318; ****, p \le 0.001; ***, p \le 0.001; **, p \le 0.05.$   $\Delta$ , delta;  $\beta$ , standardised regression coefficient; b, unstandardised regression coefficient; SE, standard error;  $f^2$ , effect size estimate for the interaction term; Beta values are mean-centered. Note: All statistics are from the final (second) step.



vigour ( $\beta = 0.23$ ;  $p \le 0.001$ ), dedication ( $\beta = 0.21$ ;  $p \le 0.001$ ) and absorption ( $\beta = 0.21$ ;  $p \le 0.001$ ) were significant. The  $R^2$  change was significant ( $R^2 = 0.04$ –0.05;  $f^2 = 0.06$ ; moderate practical effect;  $p \le 0.001$ ) in each of the regression models. These results provide evidence that the relationship between the participants' work engagement (vigour, dedication and absorption) and job commitment increased positively and significantly for participants with a high preference for the service or dedication to a cause career anchor. The moderating effect of this career anchor was moderate in practical terms.

To examine the nature of the significant interactions for the relationship between the work engagement variables and job commitment, we conducted a series of simple slope tests for each of the regression models. We used rescaled meancentered values for the career anchor variables as outlined by Aiken and West (1991). The zero values for the COI variables were set at one standard deviation above and below the mean for participants with high and low career anchor mean scores respectively. The most significant finding of the slope test analysis was that each of the career anchors consistently moderated the relationship between the work engagement variables and job commitment. Specifically, we found that the work engagement-job commitment relationship was generally stronger for participants with a high career anchor preference than for those with a low career anchor preference. Figure 1, Figure 2 and Figure 3 illustrate the moderating effect of the service or dedication to a cause career anchor in the relationship between the three work engagement variables and job commitment. A similar pattern was observed in terms of the other career anchors.

The results provided supportive evidence for our research hypothesis:

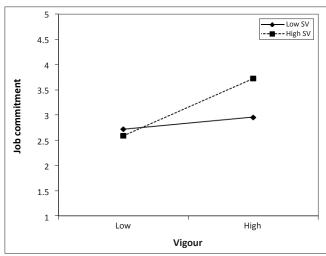
 $\boldsymbol{H}_{i}\boldsymbol{:}$  Career anchors will moderate the relation between work engagement and job commitment such that work engagement will be more strongly related to job commitment for individuals with a high preference for a particular career anchor.

#### Discussion

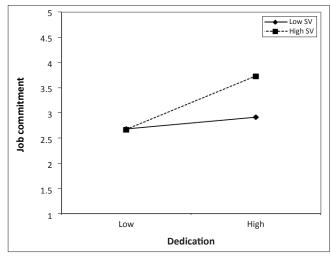
The objective of the present study was to assess whether individuals' career anchors significantly moderate the relationship between their work engagement and job commitment. The results of the study add new insights to the career literature by showing that employees' career self-concepts (as reflected by their career anchors) are important to consider in enhancing their work engagement and job commitment.

#### Moderating effect of the talents and abilitiesbased career anchors

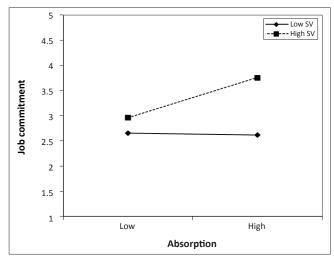
The talents and abilities-based career anchors (general managerial competence, entrepreneurial creativity) centre on the work that individuals perform day to day (Wils et al. 2010). The results showed that the general managerial competence-anchored participants' desire for power and achievement in top positions, and challenging, varied,



**FIGURE 1:** Service/dedication to a cause (SV) as a moderator of the relationship between vigour (work engagement) and job commitment.



**FIGURE 2:** Service/dedication to a cause (SV) as a moderator of the relationship between dedication (work engagement) and job commitment.



**FIGURE 3:** Service/dedication to a cause (SV) as a moderator of the relationship between absorption (work engagement) and job commitment.

integrative work with high levels of responsibility and leadership opportunities (Schein 2006), significantly and positively influenced (moderated) the relationship between their work engagement and job commitment. The manager-

anchored individuals tend to have a strong desire for solving complex problems and bringing people together to achieve common goals that contribute to the organisation's success (Cerdin & Pargneux 2010). This driving desire could explain the strong and positive relationship between their high levels of engagement and commitment to their jobs.

Entrepreneurial creativity-anchored individuals tend to be motivated by the power and freedom to engage in challenging opportunities to create their own enterprises or invent new services or products (Schein 2006). The drive to create could explain the positive moderating effect of the entrepreneurial creativity anchor on the relationship between the participants' work engagement and job commitment. The stronger the need for entrepreneurial creativity, the more positive the relationship between the individual's work engagement (dedication and absorption) and job commitment appears to be. Similar to the findings of Coetzee and De Villiers (2010), the results showed no significant correlations between the entrepreneurial creativity career anchor and the participants' work engagement. This could be attributed to the notion that the entrepreneurial-anchored individual tends to enjoy the initiation phase of a task, gets easily bored and likes to move from project to project in search of new opportunities to create something new (Suutari & Taka 2004). The significant positive moderating effect of the entrepreneurial creativity anchor on the relationship between the participants' work engagement and their job commitment confirms Schein's (2006) assertion that entrepreneurial-anchored individuals regard their jobs as important aspects of their lives in that the job provides opportunities to create something new. They may be willing to devote the time and energy needed to achieve their goals of initiating new enterprises. The results of our study suggest that the need to commit to one's entrepreneurial goals in turn enhance one's involvement and engagement in the job-related tasks associated with the creative opportunities provided by the job.

#### Moderating effect of the motives and needsbased career anchors

The motives and needs-based career anchors (security or stability, autonomy or independence and lifestyle) refer to the way individuals attempt to structure their work according to their basic personal desires, needs and lives (Wils et al. 2010). It appears from the results that the security or stability career anchor's need for employment and financial security (Schein 2006; Tan & Quek 2001) does not significantly influence (moderate) the relationship between their work engagement and job commitment. The results of the present study found a positive correlation between the security or stability career anchor and the participants' job commitment. The job commitment of the security or stabilityanchored participants could be attributed to being motivated by long-term attachment to the job and organisation (Schein 2006). Contrary to research findings reported by Coetzee and De Villiers (2010), which showed that security or stabilityanchored employees had low levels of vigour and that the lack of security significantly and negatively influences their

vigour, the results of the present study showed no associations between the participants' security or stability needs and their work engagement. The findings seem to corroborate Schein's (2006) assertion that security or stability-anchored individuals are generally more concerned about the context of the work (such as improved pay, working conditions and benefits) than the content or nature of their jobs. On the other hand, Lumley (2009) found a positive association between the security or stability career anchor and employees' satisfaction with the nature of their work.

The results show that the autonomy or independenceanchored and lifestyle-anchored participants' career selfconcepts positively moderated the relationship between their work engagement (vigour, dedication and absorption) and their job commitment. The job commitment of the autonomy or independence-anchored and lifestyle-anchored participants increased positively as their work engagement (vigour, dedication and absorption) increased.

Autonomy/independence-anchored individuals are primarily motivated to seek work situations that are maximally free of organisational constraints. They want to see their own schedule and own pace of work (Suutari & Taka 2004). Although the results showed no significant direct association between the autonomy or independence career anchor and the participants' work engagement and job commitment, the results indicated that the need for freedom to demonstrate one's own competence positively influenced (moderated) the relationship between the participants' work engagement and job commitment. The autonomy or independence-anchored participants' job commitment increased positively as their work engagement (vigour, dedication and absorption) increased. Coetzee et al. (2010) found that autonomy or independence-anchored employees tend to regard work as a valuable activity by means of which they can demonstrate their competence. Coetzee and De Villiers (2010) found that a lack of job autonomy significantly lowers employees' level of vigour, dedication and absorption. The results of the current study seem to suggest that being committed to demonstrating one's competence independently from others in turn enhances one's level of involvement and engagement in the job.

Lifestyle-anchored employees are motivated by a working environment that enables them to balance their family, career and self-development concerns. Their career self-concept is more tied up with how they live their total lives than with the job itself (Tan & Quek 2001). The need to balance and integrate one's work and personal life could explain the lack of significant direct associations between the lifestyle career anchor and the participants' work engagement and job commitment. However, the results show that the lifestyle concern significantly moderated the relationship between the participants' work engagement and job commitment. The results seem to suggest that being highly motivated by the need to balance one's personal and family's welfare with work commitments may increase one's work engagement and job commitment levels. Research by Sukal and Lopez

(2007) found that career anchors did not significantly affect the relationship between employees' job satisfaction and their perceptions of work-life conflict. However, this study found that a strong congruence between the lifestyle-anchored employees' need for a work environment that has strong profamily values and programmes and having the freedom and flexibility to balance one's work-family life (Suutari & Taka 2004) results in higher job satisfaction (Sukal & Lopez 2007).

#### Moderating effect of the attitudes and valuesbased career anchors

The attitudes and values-based career anchors (service or dedication to a cause anchor and pure challenge) are related to ways individuals identify with their occupations and their organisational cultures (Wils *et al.* 2010). The results show that the service or dedication-anchored and pure challenge-anchored participants' career self-concepts positively moderated the relationship between their work engagement (vigour, dedication and absorption) and their job commitment. The job commitment of the service or dedication-anchored and pure challenge-anchored participants increased positively as their work engagement (vigour, dedication and absorption) increased.

Service/dedication-anchored individuals are dedicated to serve other people and to make the world a better place in which to live and work. Their need to serve and work for the greater good of the organisation (Schein 2006) may explain their higher levels of engagement and job commitment. Service or dedication-anchored employees want to align their work activities with their personal values about helping the broader community or society (Schein 2006). Congruence between their personal values and the need to serve and the work environment results in higher levels of job satisfaction (Sukal & Lopez 2007). Pure challenge-anchored employees tend to single-mindedly pursue a job or career because it permits them to win out over the impossible. Success for them involves constant opportunities for self-test. They define their careers in terms of daily competition to bring solutions to seemingly unsolvable problems and to win out over tough opponents (Schein 2006). Their need for testing their personal endurance through engaging in risky projects or mentally or physically challenging work (Schein 2006) may explain the positive relationship between their work engagement and job commitment. Pure challenge-anchored employees enjoy being exposed to challenging tasks that stimulate continuous improvement in performance (Tan & Quek 2001). Boshoff et al. (1994) also found pure challengeanchored employees to be highly involved in their jobs. Lumley (2009) found the pure challenge career anchor to be positively related to employees' satisfaction with the nature of their work and jobs.

#### Implications for practice

The research literature provided evidence that employees' inner work lives, their career self-concepts and inner career goals, motives, values and interests and the characteristics

of their jobs influence their performance, engagement and attitudes toward their jobs and the organisation. Although certain industries may tend to attract employees with specific career anchor profiles (e.g. the service or dedication to a cause and lifestyle career anchors in the service industry), organisations by the very nature of the variety of job functions they offer tend to employ employees with diverse career anchor profiles (Coetzee et al. 2007; Coetzee & Schreuder 2009). In the present study we were therefore interested in assessing the moderating role of all the career anchors as postulated by Schein (2006). A contribution of this study is that the results provide evidence that career anchors are important personal resources that contribute positively to the association between people's work engagement and job commitment. As such, it is important for organisations that strive to gain a competitive edge in a dynamic and fastchanging marketplace to gain a deeper understanding of the concomitant career motives, values, needs and interests that underpin the unique career anchor preferences of their employees. Focusing on human resource initiatives that help to optimise the congruence between employees' career anchors and the characteristics of their jobs and working conditions may help to enhance their work engagement and job commitment. Such interventions have the potential to optimise individual and organisational performance and success.

### Limitations and recommendations for future research

The present study was limited to a non-probability sample of predominantly early and establishment career stage Black and female employees employed in a human resource capacity in the service industry. The findings can therefore not be generalised to other occupational, race, gender, age and disciplinary contexts. Furthermore, given the crosssectional nature of the research design, this study can yield no statements about causation. Associations between the variables have therefore been interpreted rather than established. Longitudinal studies should be employed to establish the causal relationships amongst the variables. It is recommended that the study be replicated with broader samples across various occupational, race and gender groups and economic sectors before final conclusions can be drawn about the moderating effect of employees' career anchors on the relationship between their work engagement and job commitment. The career self-concept and people's career values and occupational aspirations develop and change over time to opportunities they encounter (Sortheix et al. 2013). Considering that the present sample of participants was in the early career stage of their lives, future longitudinal studies could analyse how the adjustments relating to an evolving self-concept relate to work engagement and job commitment.

#### Conclusion

Notwithstanding the study limitations, novel and valuable knowledge was contributed to the careers literature. The

value of the findings obtained in the present study lies in the explanatory utility of the identified associations between the variables of concern in this study. Overall, it can be concluded that employees' career self-concepts and the underpinning talents, abilities, motives, needs, values and interests (as expressed by their career anchors) and how these influence the relationship between their work engagement and job commitment are important factors to consider in their career development. In this regard the results of our study add valuable new insights to the career research literature. The extent to which employees experience congruence between their career anchors and their working environments and the nature of their jobs will determine the level to which they feel energised, dedicated and absorbed in their jobs, which in turn will influence their attachment and commitment to their jobs in the organisation.

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#### **Competing interests**

The authors declare that they have no financial or personal relationship(s) that may have inappropriately influenced them in writing this article.

#### **Authors' contributions**

M.C. (University of South Africa) conducted the statistical analysis and literature review and wrote up the research article. D.S. (University of South Africa) acted as critical reviewer and assisted in writing up the article. R.T. (University of South Africa) collected the data.

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