

Employability attributes and personality preferences of postgraduate business management students

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Orientation: The demand for sustained employability and a proactive career agency has led to a renewed interest in the dispositional and psychological attributes of students and employees – like their employability attributes and personality preferences – because these relate to the proactive management of their career development in a changing employment world.

Research purpose: The purpose of the study was to determine the relationship between employees' employability attributes (as the Employability Attributes Scale measures them) and their personality preferences (as the Myers-Briggs Type indicator, Form M, measures them).

Motivation for the study: There seems to be a paucity of information about how employees' personality preferences relate to their employability attributes in South Africa's multicultural organisational context.

Research design, approach and method: The authors conducted a quantitative survey. It involved a non-probability sample of 304 early career adults enrolled for an Honour's degree in business management in an open distance learning higher education institution. They used correlational statistics and multiple regression analyses to analyse the data.

Main findings: The authors observed a number of significant relationships between the participants' personality preferences and their employability attributes.

Practical/managerial implications: Career counsellors and human resource practitioners need to recognise how employees' personality preferences influence their employability attributes in the management of their career development and employability.

Contribution/value add: The findings add to the existing career literature on the career meta-competencies that influence employees' employability. They also provide valuable information that organisations can use for career development support and counselling practices in the contemporary world of work.

Introduction

Key focus of the study

The employability of employees and graduates has become important in a technology-driven knowledge economy (Coetzee, 2012; Griesel & Parker, 2009; Noe, Tews & Dachner, 2010). Graduates who enter the world of work today face a number of challenges, like decreases in employment opportunities and job security, fast-changing technology and an increasing personal responsibility for continual up skilling and lifelong learning – as well as keeping up with changes in their fields of knowledge (Marock, 2008; Pool & Sewell, 2007).

It is no longer sufficient for people to have only technical skills and academic knowledge in order to find employment (Fallows & Stevens, 2000). The 21st century requires young adults who enter the world of work to be work-ready, employable and to sustain their employability (Marock, 2008; Pool & Sewell, 2007). Their employability constitutes a sense of self-directedness or personal agency in retaining or securing a job or form of employment. This uses a set of personal career-related attributes that employers and researchers generally promote as an alternative to job security in an uncertain employment context as its basis (Bezuidenhout, 2011; Coetzee, 2012; Fugate, Kinicki & Ashforth, 2004; Rothwell, Jewell & Hardie, 2009; Schreuder & Coetzee, 2011).

People are regarded as career agents who construct their careers in a more chaotic and unpredictable employment context (Savickas, 2011). It requires them to develop the career meta-competencies or adaptive resources and capacities they need to design a meaningful life-career in an uncertain and more chaotic world of work (Savickas & Porfeli, 2012; Schreuder & Coetzee, 2011).

The demand for sustained employability and a proactive career agency has led to a renewed interest in the dispositional and psychological attributes of students and employees, like

their personality and employability attributes. Research increasingly recognises these as important factors that significantly influence the capacity of people to manage their career development proactively in a changing occupational world (Beukes, 2010; Bezuidenhout, 2011; Coetzee, 2012; O'Donoghue & Maguire, 2005; Potgieter, 2012; Rigby, Wood, Clark-Murphy, Daly, Dixon, Kavanagh, Leveson, Petocz, Thomas & Vu, 2010; Savickas & Porfeli, 2012; Simmons, 2009).

The purpose of the present study is to add to the contemporary research literature on careers by investigating how people's personality preferences relate to their employability attributes.

Background to the study

Research (Brown & Scase, 1994; Cranmer, 2006; Griesel & Parker, 2009) shows that employers' perceptions about the quality of the graduates they employ, their employability and general work readiness continue to influence graduates' transition into employment and their sustained ability to secure it in a turbulent and uncertain employment context.

Organisations depend on the flexibility and capacity of their employees to adapt to a constantly changing and highly competitive business environment as well as their ongoing capability to develop and cultivate up-to-date knowledge and skills in order for these organisations to perform optimally in global markets (Thijssen, Van der Heijden & Rocco, 2008). The increased concerns about the employability of young adults in the South African context have resulted in organisations placing more emphasis on their employability and in helping them to increase and sustain their employability (Marock, 2008).

Several authors (De Vos & Soens, 2008; Forrier & Sels, 2003; Fugate *et al.*, 2004; Hall, 2004; McQuaid & Lindsay, 2005; Raabe, Frese & Beehr, 2007) emphasise the responsibility of people to obtain career information, skills, capabilities and competencies that present and potential employers require in order to obtain and sustain employment in existing and future situations.

Career counselling and career development support interventions could assist people to take ownership of their careers and act as proactive agents in managing their careers whilst, at the same time, reflecting about their career meta-competencies as vital resources in sustaining their employability (Baruch, 2004; Coetzee, 2008; Fugate *et al.*, 2004; Savickas, Nota & Rossier *et al.*, 2009). However, people seem to differ in terms of their capacity to engage in proactive career behaviours (Buchner, 2007). Therefore, researchers increasingly recognise personality as a career meta-competency that influences people's employability (Baruch, 2004; Coetzee, 2008; Fugate *et al.*, 2004; Potgieter, 2012; Sinclair, 2009). In this regard, people, managers, career counsellors, industrial psychologists and human resource practitioners need to be aware of how people's personalities influence their ability to engage in proactive career behaviours that increase their employability.

Trends from the research literature

For people, sustained employability contributes to their career success and satisfaction in an increasingly unstable and chaotic global business environment (Coetzee & Beukes, 2010; Coetzee & Schreuder, 2011; Fugate *et al.*, 2004; Thijssen, *et al.*, 2008).

Employability is advantageous for present performance on the job as well as for career and business outcomes (Van der Heijde & Van der Heijden, 2006). Employability presupposes pro-active career behaviours and capacities that help people to fulfil, acquire or create work through the optimal use of both occupation-related and career meta-competencies (Coetzee & Schreuder, 2011; Schreuder & Coetzee, 2011). In this regard, employability is a psychosocial construct that represents the career-related attributes that promote adaptive cognition, behaviour and affect, and increase one's suitability for appropriate and sustained employment opportunities (Bezuidenhout, 2011; Fugate *et al.*, 2004; Yorke & Knight, 2007).

Researchers have related people's personalities to their jobs, contextual performance and characteristic behavioural patterns that distinguish them from others (Moyo & Theron, 2011). Jung (1971) and Myers, McCaulley, Quenk and Hammer (2003) contend that people's natural personality preferences cause them to develop habits of behaviour and personality patterns that characterise their preferred decision-making and problem-solving processes.

Research has shown that self-perceived employability promotes feelings of being in control of one's career and the confidence that one is able to secure one's labour market position (De Cuyper, Bernhard-Oettel, Berntson, De Witte & Alarco, 2008). In addition, Choong and Britton (2007) found the Myers-Briggs Type Indicator (MBTI) type preferences to have significant relationships with character strengths and moral values (also called signature or cognitive strengths), like creativity, perspective, love of learning, love (caring) and open-mindedness (flexibility).

According to Tomlinson (2007), people's values and identities drive their employability, whilst their personal dispositions and biographies influence their career behaviour. Cole, Field, Giles and Harris (2009) and Higgs (2001) found a positive link between people's personalities and their employability. Higgs (2001) suggests that people could develop their weaker, underdeveloped personality preferences and, thereby, develop better well-rounded behaviour, which could influence their employability.

Employability attributes

The employability attributes framework that Bezuidenhout and Coetzee (2010) developed is relevant to the present study. The employability attributes framework (see Figure 1) describes a set of eight core employability attributes that are important for increasing the likelihood of securing and sustaining employment opportunities (Bezuidenhout, 2011).

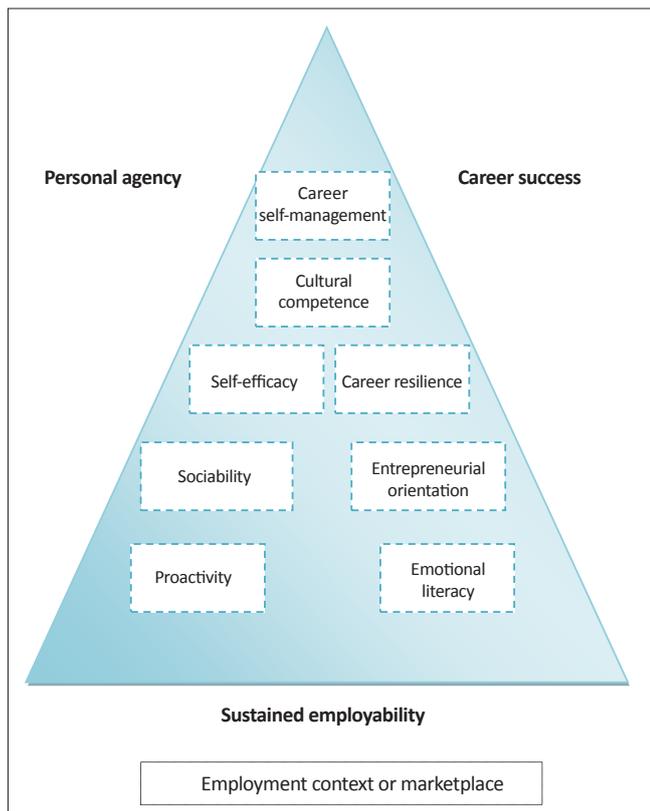


FIGURE 1: Conceptual overview of the skills and attributes that underlie people's employability.

Career self-management involves the ability to reflect on one's career aspirations and develop clarity about what one wants to accomplish in one's career, recognise the skills one needs to succeed in one's career and the actions one needs to take to accomplish one's career goals. Career self-management implies that one has the confidence and perseverance to engage continuously in development activities whilst pursuing one's career goals (Bezuidenhout, 2011).

Cultural competence involves knowing the customs of other cultures, understanding their values and beliefs, having the confidence to communicate interculturally, finding it easy to do so (and enjoying it) as well as being able to initiate and maintain relationships with people from diverse cultural backgrounds (Bezuidenhout, 2011).

Self-efficacy includes the ability to function independently of others, to make one's own decisions, to have the confidence to accomplish one's goals through one's own effort, to persist with challenges and to enjoy the discovery of original solutions (Bezuidenhout, 2011).

Career resilience refers to being able to adapt to changing circumstances by welcoming job and organisational changes, to look forward to working with new and different people, to have self-confidence and to be willing to take risks (Schreuder & Coetzee, 2011). Career resilience facilitates a high degree of adaptability, flexibility, self-confidence and competence, regardless of adverse career circumstances (Bezuidenhout, 2011).

Sociability refers to being able to build networks of friendships with people who can advance one's career and to use the networks to find new job opportunities. It also involves actively seeking feedback from others to progress in one's career and being willing to take risks (Bezuidenhout, 2011).

Entrepreneurial orientation refers to being curious about, and continuously venturing into, new business opportunities. It also includes being open to new ideas and feeling positive about the implications of changes in one's workplace or studies (Bezuidenhout, 2011).

Proactivity refers to accepting responsibility for one's decisions, setting challenging targets for oneself and identifying opportunities before other people do. It also refers to being able to improve one's knowledge and skills to ensure career progress, adapt to changing circumstances and persevering in the face of difficult career circumstances (Bezuidenhout, 2011).

Emotional literacy refers to the adaptive use of emotions and the quality of people's ability to read, understand and manage their own and others' emotions (Coetzee, 2010).

Research by Bezuidenhout (2011) indicates that career self-management, career resilience and cultural competence are key personality attributes that influence people's ability to sustain their employability. These three attributes and the career-related core dispositional self-evaluations (self-efficacy, sociability, proactivity, emotional literacy and entrepreneurial orientation) appear to promote proactive adaptability in changing environments and to increase a person's suitability for employment and the likelihood of achieving career success.

Career self-management seems to act as the motivational drive for improving one's employability by engaging in activities to update one's marketable skills, for setting personal goals and for building strong professional networks for achieving these goals and aspirations (Bezuidenhout, 2011; Bridgestock, 2009; Reitman & Schmeer, 2008). Research by Ang, Van Dyne and Koh (2006) found that cultural intelligence relates to the Big Five personality model. Bezuidenhout (2011, p 86) states, in this regard, that people with certain personality traits may be better able to adjust to, and be successful in, different cultural circumstances, like the diverse South African workplace.

Personality preferences

Jung (1921, 1971) saw personality as characteristic psychological types that act as intrinsically preferred motivational forces in pursuing goals in the unconscious. Jung (1921) posits that psychological type is predisposed within human beings and is, therefore, a universal attribute.

Between the 1940s and 1970s, Katherine Briggs and Isabel Briggs Myers extended Jung's ideas of psychological types into the well-known Personality Type Theory and operationalised them into a questionnaire called the Myers-

Briggs Type Indicator (Myers & Myers, 1995). The MBTI embodies the practical application of Personality Type Theory. It enables people to understand their own and others' psychological or personality types and the use of their natural personality preferences of mental or cognitive functioning in their everyday lives (Myers *et al.*, 2003).

The MBTI typology comprises four pairs of opposite preferences, called dichotomies or dimensions of personality (see Table 1). These type dichotomies represent the natural ways that people use their minds differently (Myers, 1998). The first three dichotomies were part of Jung's original theory whilst Briggs and Myers added the fourth (Garrety, 2007; Leary, Reilly & Brown, 2008):

1. **Orientation of energy:** Extraversion (E) versus Introversion (I), or relative interest in outer (E) and inner (I) worlds.
2. **Preferred modes of perception:** Sensing (S) versus Intuition (N) – whether people perceive through their senses (S) or through indirect perception by way of the unconscious (N). Sensing people focus on the here and now and iNtuitive people prefer to focus on future possibilities.
3. **Decision making:** Thinking (T) versus Feeling (F) – whether people make decisions using logic (T) or subjective values (F).
4. **Preferences for dealing with the outer world:** Judging (J) versus Perceiving (P), which refers to a general method of dealing with the world. Judging people prefer order and a planned and organised approach to life and to have things settled. Perceiving people embrace ambiguity, tend to like a flexible and spontaneous approach to life and prefer to keep their options open. (n.p.)

The MBTI preferences are complex and consist of many distinct, but related, facets. The facets (five per dichotomy) of each of the eight preferences (E-I, S-N, T-F, J-P) identify some of the distinctive ways in which people express their personality types (Kummerow & Quenk, 2003). The MBTI assessment sorts people into one of 16 different, equally valuable personality types.

Depending on the preferences the MBTI reports, it identifies people as extraverted or introverted, sensing or intuitive, thinking or feeling and judging or perceiving. It gives them a four-letter designation (like ESTJ) that indicates their dominant preferences and, therefore, their personality type. Whilst people have and use qualities for both poles of each dichotomy, the MBTI assessment allows for the recognition of those that people prefer, or use, to respond first, most often and most comfortably (Myers *et al.*, 2003). People's natural preferences cause them to develop habits of behaviour and personality patterns characteristic of the preferred mental processes (Jung, 1971). Myers *et al.* (2003) observed that some people are able to use their type preferences more effectively than others are. Torrington (2001) found a positive

relationship between the MBTI preferences of Extraversion (E), Intuition (N) and self-actualisation.

Using MBTI information, career counsellors can help clients to increase their energy and optimism by reframing the way they interpret difficulties that arise from their differences with others and difficulties in their environment. They can then adapt their behaviour and communication styles to interact with others more effectively and pursue their goals (Myers *et al.*, 2003). Although personality preferences may predict the behaviour of people in any given situation, personal qualities, like people's belief about what they can do, their plans and strategies for enacting behaviours, their expectations of success and their self-concepts may override their behaviours in certain situations (Coetzee, 2005).

However, there seems to be a paucity of research in the South African context on how people's personality preferences relate to their employability attributes, especially in South Africa's multicultural organisational context.

The authors formulated the following research hypotheses using this information:

- Hypothesis 1: people's personality type preferences relate positively and significantly to their employability attributes.
- Hypothesis 2: people's personality preferences significantly predict their employability attributes.

Research objectives

The present study aimed to assess how people's employability attributes relate to their personality preferences. The authors posed these research questions:

- Do people's personality type preferences relate positively and significantly to their employability attributes?

TABLE 1: The four dichotomies of Personality Type Theory.

Dichotomy	Personality type	Definition
1. Attitudes or orientations of energy	Extraversion	Directing energy mainly toward the outer world of people and objects.
	Introversion	Directing energy mainly toward the inner world of experiences and ideas.
2. Mental functions or processes of perception	Sensing	Focusing mainly on what the five senses can perceive.
	Intuition	Focusing mainly on perceiving patterns and interrelationships.
3. Mental functions or processes of judging	Thinking	Basing conclusions on logical analysis with a focus on objectivity and detachment.
	Feeling	Basing conclusions on personal or social values with a focus on understanding and harmony.
4. Attitudes or orientations toward dealing with the outside world	Judging	Preferring the decisiveness and closure that result from dealing with the outer world using one of the judging processes (Thinking or Feeling).
	Perceiving	Preferring the flexibility and spontaneity that result from dealing with the outer world using one of the perceiving processes (Sensing or Intuition).

Source: Myers, I., McCaulley, M., Quenk, N., & Hammer, A. (2003). *MBTI Manual: A guide to the development and use of the Myers-Briggs Type Indicator*. Palo Alto, CA: Consulting Psychologists Press.

- Do people's personality preferences significantly predict their employability attributes?

The potential value-add of the study

Assessing whether people's personality preferences relate to employability attributes may provide valuable information that managers, career counsellors, industrial psychologists and human resource practitioners could use in career development support and counselling practices to improve employees' employability attributes and skills. In addition, the research could add new knowledge and insight that might be valuable in informing career development support practices for assisting young adults entering the world of work to increase their employability.

What will follow

The next section will elaborate on the research design. It covers the research approach and method. A presentation of the results and a discussion of the findings follow. The article concludes with a brief synopsis of its main conclusions, implications for practice and recommendations for future research.

Research design

Research approach

For this exploratory pilot study, the authors used a quantitative survey design to achieve the research objective (Shaughnessy & Zechmeister, 2003).

Research method

Research participants

The participants comprised a non-probability sample of 304 adults enrolled for an Honour's degree in business management at an open distance learning higher education institution. The participants attended a three-day study school. The sample comprised predominantly black people (70%) and females (64%) in the early adulthood life stage (26–40 years) (84%). Most participants worked in middle management (25%), first-level supervision (21%) or as members of the general staff (28%). This corresponds with the profile of the sample where 71% of the sample worked full time.

Measuring instruments

1. The authors used the Myers Briggs Type Indicator, Form M (MBTI) (Myers & Myers, 1998) to measure the participants' personality type preferences. The MBTI, Form M, is a self-reporting instrument and consists of three parts. Part I contains 26 items, part II 47 items and part III 20 items. In all, participants must respond to 93 items.

The MBTI is a questionnaire-style instrument comprising items arranged in a forced-choice format. For each item, subjects have two responses from which to choose. The objective of the MBTI is to classify people into one of the 16 personality types (Myers *et al.*, 2003).

Whilst there are different views about many aspects of the validity of the MBTI, there is general agreement on its high levels of face validity (Myers *et al.*, 2003, p160). In presenting reliability results in the MBTI manual, Myers, *et al.* (2003) examined the internal consistency reliability of the Form M scales (continuous scores using logical split-half correlations and coefficient alpha), none of which are below .80 for the MBTI Form M scales. Test-retest reliabilities are high and show consistency over time.

2. The authors used the Employability Attributes Scale (EAS) of Bezuidenhout and Coetzee (2010) to measure the participants' employability attributes. The EAS (Bezuidenhout & Coetzee, 2010) is a self-rated, multi-factorial measure. It contains 56 items and eight sub-scales: career self-management (11 items), cultural competence (five items), self-efficacy (six items), career resilience (six items), sociability (seven items), entrepreneurial orientation (seven items), proactivity (seven items) and emotional literacy (seven items).

Respondents must rate each item on a six-point Likert-type scale. The higher the number, the more true that item is to the respondent. An exploratory factor analysis (Coetzee, 2010) and inter-item correlational analyses provided evidence that the EAS items meet the psychometric criteria of construct validity. In terms of reliability (internal-consistency), Cronbach's Alpha coefficients for each subscale range between .78 and .90 (high) (Coetzee, 2010).

Research procedure

The authors obtained ethical clearance and permission to conduct the study from the managers of the higher education institution that participated in the study. They administered the questionnaires in a group session during the study school and collected them as soon as the participants had completed them. Each questionnaire included a covering letter that invited subjects to participate in the study voluntarily. It assured them that their responses would remain confidential and that the authors would use them for research purposes only. Five-hundred respondents attended the study school and returned 304 usable questionnaires, yielding a response rate of 61%.

Statistical analysis

The authors calculated Cronbach's Alpha coefficients to determine the internal consistency reliability of the two measures. They performed Spearman correlations and stepwise multiple regression analysis to test the research hypotheses. Although they set a cut-off point of $p \leq .05$, they also considered a practical effect size of $r \geq .30$ (medium effect, Cohen, 1992) for the correlational analyses so that they could interpret the practical significance of the findings.

With regard to the multiple regression analyses, the authors used the value of adjusted R^2 to determine the proportion of the total variance of the dependent variables (EAS) that the independent variables (MBTI) explain. The authors used the

F-test to determine whether there was a significant regression ($p \leq .05$) between the independent and dependent variables.

Results

Descriptive and reliability statistics

The authors scored the MBTI by obtaining a frequency score for all the items in each subscale. They expressed the personality preferences as percentages for the sample group and presented them in a table. They used the data only to categorise the sample according to the personality preferences. Therefore, they showed only frequencies and percentages.

Table 2 presents the descriptive information for the eight MBTI subscales.

Participants scored the highest on the Extraversion (E) and Perceiving (P) attitudes and on the Intuition (N) and Feeling (F) mental functions. Therefore, the participants displayed the dominant personality preference of ENFP.

Table 3 presents the descriptive information for the eight EAS subscales. The mean scores of all the EAS subscales ranged between 4.75 and 4.14. The participants obtained the highest mean score on the career self-management ($M = 4.75$; $SD = 8.14$) and self-efficacy ($M = 4.75$; $SD = 4.07$) subscales and the lowest mean score on the sociability subscale ($M = 4.14$; $SD = 5.90$). Table 3 also shows that the authors obtained acceptable internal consistency reliabilities for the EAS.

Testing the hypotheses

The primary aim of this study was to assess empirically whether people's personality preferences relate to their employability attributes. The authors tested Hypothesis 1 by performing Spearman correlations. They tested Hypothesis 2 by conducting multiple regression analyses.

Correlational statistics

Table 4 shows that the authors observed a number of significantly positive relationships between the MBTI, Form

M and the EAS variables. The significant correlations range between $r = -.15$ and $.33$ ($p \leq .05$; $r \leq .30 \leq .49$, medium practical effect size).

Extraversion (E) significantly and positively relates to cultural competence ($r = .20$; small practical effect size, $p \leq .001$), career resilience ($r = .16$; small practical effect size, $p \leq .005$), sociability ($r = .33$; medium practical effect size, $p \leq .000$), proactivity ($r = .11$; small practical effect size, $p \leq .05$) and emotional literacy ($r = .18$; small practical effect size, $p \leq .002$).

The authors observed a significant negative relationship between introversion (I) and sociability ($r = -.17$; small practical effect size, $p \leq .001$). Similarly, they found a significant negative relationship between sensing

TABLE 2: Frequency distribution of the Myers-Briggs Type Indicator ($N = 304$).

MBTI (valid)	<i>f</i>	%
Introversion	74	24.3
Extraversion	161	53.0
Sensing	143	47.0
Intuition	176	57.9
Thinking	104	34.2
Feeling	210	69.1
Judging	53	17.4
Perceiving	260	85.5
Total	304	100.0

f, frequency; MBTI, Myers-Briggs Type Indicator. The dominant personality type preference = ENFP.

TABLE 3: Means and standard deviations of the Employability Attributes Scale ($N = 304$).

Employability attribute variables	M	SD	Cronbach's Alpha coefficients
Career self-management	4.75	8.14	.88
Cultural competence	4.30	4.70	.87
Self-efficacy	4.75	4.07	.73
Career resilience	4.60	4.28	.80
Sociability	4.14	5.90	.82
Entrepreneurial orientation	4.63	5.68	.75
Proactivity	4.72	5.08	.82
Emotional literacy	4.43	5.26	.70
Total scale	4.57	34.09	.96

M, mean; SD, standard deviation.

TABLE 4: Spearman correlations: Myers-Briggs Type Indicator (MBTI) and Employability Attributes Scale ($N = 304$).

MBTI	Cc, regression; icient; orrelation Coefficient	Employability Attributes Scale							
		CSM	CC	SE	CR	SOC	EO	PRO	EL
Extraversion	<i>r</i>	.042	.201**†	-.001	.16**†	.33**‡	.098	.11*†	.18**†
Introversion	<i>r</i>	.034	-0.62	.046	-.065	-.17*†	.004	.027	-.081
Sensing	<i>r</i>	-.041	-0.96	.019	-.045	-.080	-.11*†	-.12*†	-.056
Intuition	<i>r</i>	.021	.080	.003	.053	.058	.12*†	.12*†	.057
Thinking	<i>r</i>	.14*†	-.031	.14*†	.046	.001	.18**†	.16**†	-.006
Feeling	<i>r</i>	-.15**†	.053	-.14*†	-.034	.008	-.17**†	-.16*†	.000
Judging	<i>r</i>	.095	-.12*†	.024	.040	-.029	-.003	.030	-.009
Perceiving	<i>r</i>	-.11†	.063	-.047	-.096	-.043	-.025	-.069	-.033

MBTI, Myers-Briggs Type Indicator; CSM, career self-management; CC, cultural competence; SE, self-efficacy; CR, career resilience; SOC, sociability; EO, entrepreneurial orientation; PRO, proactivity; EL, emotional literacy.

†, $r \leq .30$ (small practical effect size); ‡, $r \geq .30 \leq .49$ (medium practical effect size)

*, $p \leq .05$ (two-tailed); **, $p \leq .01$

and entrepreneurial orientation ($r = -.11$; small practical effect size, $p \leq .050$) and proactivity ($r = -.12$; small practical effect size, $p \leq .042$).

On the other hand, the authors found a significant positive relationship between intuition (N) and entrepreneurial orientation ($r = .12$, small practical effect size, $p \leq .036$) and proactivity ($r = .12$, small practical effect size, $p \leq .042$). Thinking (T) correlates significantly with career self-management ($r = .14$; small practical effect, $p \leq .015$), self-efficacy ($r = .14$; small practical effect size, $p \leq .015$), entrepreneurial orientation ($r = .18$, small practical effect size, $p \leq .002$) and proactivity ($r = .16$; small practical effect size, $p \leq .006$).

The results suggest that the feeling preference relates significantly and negatively to career self-management ($r = -.15$; small practical effect size, $p \leq .009$), self-efficacy ($r = -.14$; small practical effect size, $p \leq .014$), entrepreneurial orientation ($r = -.17$; small practical effect size, $p \leq .003$) and proactivity ($r = -.16$; small practical effect size, $p \leq .005$).

The authors observed a significant negative relationship between judging (J) and cultural competence ($r = -.12$; small practical effect size, $p \leq .033$). In addition, they observed a significant negative relationship between perceiving and career self-management ($r = -.11$; small practical effect, $p \leq .05$).

The results provided supportive evidence for Hypothesis 1 (individuals' personality type preferences relate positively and significantly to their employability attributes).

Multiple regression analysis

Myers-Briggs Type Indicator and Employability Attributes Scale. Table 5 shows that the regression models explained a small ($R^2 \leq .12$) practical percentage of variance (Cohen, 1992). The regression of the MBTI personality preferences variables upon the cultural competence variable produced a statistically significant model ($Fp(67.67; 2.88) = 3.14$; $p \leq .001$). It accounts for 6% ($R^2 = .06$; small practical effect) of the variance in the EAS cultural competence variable. Extraversion ($\beta = .27$; $p \leq .003$) contributed significantly to explaining the percentage of variance in cultural competence. Judgement ($\beta = -.30$; $p \leq .020$) also contributed significantly to explaining the percentage of variance in cultural competence. The beta weights indicate that judgment made the largest contribution to explaining the variance in the variable of cultural competence.

The regression of the MBTI personality preferences variables upon the EAS sociability variable produced a statistically significant model ($Fp(174.87; 3.96) = 5.65$; $p \leq .001$). It accounts for 11% ($R^2 = .11$; small practical effect) of the variance in the EAS sociability variable. The following variables contributed significantly to explaining the percentage of variance in sociability: Extraversion ($\beta = .35$; $p \leq .000$) and Perception ($\beta = -.27$; $p \leq .032$). The beta weights indicate that Extraversion

made the largest contribution to explaining the variance in the variable of sociability.

The regression of MBTI personality preferences variables upon the EAS proactivity variable produced a statistically significant model ($Fp(65.56; 24.76) = 2.65$; $p \leq .008$). It accounts for 4% ($R^2 = .04$; small practical effect) of the variance. Extraversion ($\beta = .19$; $p \leq .033$) contributed significantly to explaining the percentage of variance in proactivity.

The results provided supportive evidence for Hypothesis 2 (individuals' personality preferences significantly predict their employability attributes).

Discussion

Overall, the results provided evidence that people's employability attributes relate significantly to their personality preferences. Bullock-Yowell, Andrews and Buzzetta (2011) and Cole, *et al.* (2009) also found personality preferences to relate significantly to people's employability. The overall ENFP profile of the participants suggests that they may be enthusiastic, idealistic and creative in pursuing their careers. They may feel confident in pursuing a career that interests them. They may be quite sociable and demonstrate good people skills. They may need to live life in accordance with their inner values and may be excited by new ideas, but bored with details. They may be open-minded and flexible, with a broad range of interests and abilities (Myers *et al.*, 2003). In line with the ENFP profile, the means showed that the participants obtained high scores on the career self-management, self-efficacy, career resilience and proactivity variables.

The significant relationship the authors observed between Extraversion (E) and cultural competence suggests that extraverted people are confident about their ability to act and interface effectively in diverse cultural environments. They would probably be aware of the customs of other cultures and be open to their values and beliefs. Participants with a preference for extraversion appear to value the quality of their relationships with others, seem confident about communicating intercultural and find it easy to initiate and maintain relationships with people from diverse cultural backgrounds (Bezuidenhout, 2011). These results are consistent with the findings of Ang *et al.* (2006), which showed that extraversion relates significantly to cultural intelligence. One may attribute the results to the extraverted personality type's preference for interacting with others and have diverse experiences of interaction in the outer world (Myers *et al.*, 2003).

On the other hand, the findings suggest that preferring order, having things settled and following a planned and organised approach to life lead to a decrease in one's cultural competence. One may attribute this to the judging type's more rigid and strong-headed approach to life and to others (Myers *et al.*, 2003).

TABLE 5: Significant multiple regression results: Myers-Briggs Type Indicator and Employability Attributes Scale ($N = 304$).

Variable	Unstandardised coefficient		Standardised Coefficient (β)	t	p	F	Adjusted R^2	R
	b	SE b						
Cultural competence (constant)	22.76	2.55	-	8.93	.001**	3.24***	.06†	.28
Extraversion	2.50	.82	.27	3.05	.003*	-	-	-
Judgment	-3.70	1.58	-.30	-2.34	.02*	-	-	-
Sociability (constant)	3.02	3.10	-	9.68	.001***	5.56***	.11†	.36
Extraversion	4.17	.10	.35	4.18	.001***	-	-	-
Perceiving	-4.46	2.07	-.27	-2.15	.03*	-	-	-
Proactivity (constant)	32.90	2.78	-	11.86	.01**	2.65***	.04†	.26
Extraversion	1.91	.89	.19	2.14	.03*	-	-	-

b, beta value (unstandardised regression coefficient); SE, standard error; β , beta value (standardised regression coefficient); t , t-test; p , probability value; F , F-distribution variable; R^2 , proportion variance explained; R , multiple correlation.

†, $R^2 \leq .12$, small practical effect size

*, $p \leq .05$; **, $p \leq .01$; ***, $p \leq .001$

The results further suggest that participants with an extraverted personality preference have positive self-evaluations about their career resilience, sociability, proactivity and emotional literacy. One may attribute these findings to the extraverted types' preference for social interaction, exposure to a variety of experiences in the external environment and initiating new experiences (Myers *et al.*, 2003). It appears that the extraverted types' orientation toward the outer world of people, objects and experiences significantly increased their confidence in their ability to adapt to changing circumstances, to welcome job and organisational changes and to look forward to working with new and different people (career resilience). It appears from the findings that their extraverted preference increased the participants' willingness to build social networks and maintain mutually supportive and satisfying relationships (sociability) in pursuing their careers, whilst the introverted and perceiving preference types associated negatively with these behaviours. Perceiving types tend to prefer to function autonomously and independently of others, whilst introverted types tend to be more reflective in nature and prefer to function in their own spaces (Myers *et al.*, 2003).

It is interesting to observe that the perceiving types' preference for freedom and independence seems to reduce significantly the participants' confidence in their ability to engage in career self-management behaviours. One may attribute the findings to the fact that career self-management entails obtaining information about oneself and about employment opportunities and making plans for accomplishing those goals (Bezuidenhout, 2011; Schreuder & Coetzee, 2011). Whereas perceiving types prefer to gather information frequently, they prefer an open-ended, spontaneous approach to life instead of following restrictive plans. Perceiving types tend to be motivated when they feel the pressure of an approaching challenge, generally prefer to act impulsively and do not plan. They tend to embrace ambiguity, like flexible and spontaneous approaches to life and prefer to keep their options open (Myers *et al.*, 2003).

The findings suggest that feeling types seem to be less prone to engage in career self-management behaviours than do the

thinking preference types. Thinking types typically suggest an aptitude for analysing, solving problems, making and implementing decisions quickly and with confidence. On the other hand, feeling types are more prone to what they personally value about life and to accommodating the needs of others before addressing their own needs (Myers *et al.*, 2003). These mental orientations of the thinking and feeling types may explain the lower sense of self-efficacy, entrepreneurial orientation and proactivity of the feeling types compared to the more positive self-evaluations about these attributes the thinking types reported.

The extraverted types also seem to be willing to act proactively by initiating action to improve current circumstances or to create new ones. According to Mirvis and Hall (1984), proactivity, as a career meta-competency, may lead to developmental behaviours like seeking feedback. This is essential for creating career networks (sociability), coping with work challenges and adjusting to changing circumstances (career resilience).

The findings of the present study seem to corroborate the findings of a study that Coetzee (2005) conducted. Coetzee (2005) also found that extraversion had a significant relationship with people's emotional competence. Coetzee and Beukes (2010) also found that emotional intelligence was a significant predictor of people's self-regulatory employability. Considering that the extraverted preferences had positive associations with most of the employability attributes, the findings suggest that these personality types may be more prone to taking ownership of their own agency in sustaining their employability.

The personality preferences that related to the participants' preferred modes of perception (sensing and intuition) revealed that, contrary to the sensing types, the intuitive types showed more confidence in their entrepreneurial orientation and proactivity. These findings suggest that focusing on the here-and-now instead of future possibilities seems to be less conducive to cultivating the mindsets and attributes that people require for developing the confidence and level of proactiveness they need to overcome career

obstacles and take career-related risks. Sensing personality types tend to focus on dealing with immediate concerns by taking responsibility for getting involved hands on in matters that need attention. They are also more prone to becoming anxious about unknown events and unfamiliar circumstances. Therefore, they are more averse to risk. On the other hand, intuitive types tend to focus on being clever, creative and ingenious in changing their circumstances and envisioning future possibilities. They also tend to be more open to taking risks in experiencing what is new and different (Myers *et al.*, 2003).

Conclusions

Overall, the results provided evidence that one needs to consider people's personality preferences when developing the employability attributes that they need in order to sustain their employability in a changing, increasingly uncertain and turbulent employment and occupational world.

The practical value of the findings lies in the new knowledge the authors gained about the relationship between these variables and the factors they highlighted as contributing to developing underdeveloped personality preferences and, as a result, improving people's employability attributes.

Considering the overall ENFP MBTI profile of the group of participants, managers, career counsellors, industrial psychologists and human resource practitioners need to note the findings of this study and how the preferred personality types relate to the participants' employability attributes. Because of their extraverted nature, they may be comfortable in developing and demonstrating most of the employability attributes.

In conclusion, the study provides new insights that can be useful for addressing the employability needs of a diverse group of people in the South African multi-cultural organisational context.

One can use the findings of the study as a guide for facilitating the balanced development of diverse personality type preferences to improve people's employability attributes.

Recommendations

The authors recommend that career development support efforts focus on helping early career adults and more career-established employees to cultivate a balance between the sensing and intuitive, thinking and feeling, and judging and perceiving styles of solving problems and making decisions to increase their capabilities as proactive career agents in sustaining their own employability. Career development support practices typically include activities to help people become more aware of their career interests and motivations, their employability strengths and development areas, how to pursue their career goals and aspirations as well as how their personality preferences hinder or increase their chances of career success and employability.

Limitations of the study

The findings highlight the need for further research to explore the relationship between career meta-competencies and employability attributes.

Because the present study was limited to participants predominantly enrolled for an Honour's degree in business management at a South African higher education institution, one cannot generalise the findings to other occupational contexts.

Furthermore, given the exploratory nature of the research design, this study can yield no statements about causation. Therefore, the authors have interpreted associations between the variables rather than establishing them. Consequently, researchers need to replicate these findings in broader samples, different occupational groups and economic sectors before one can draw more comprehensive conclusions about the relationship between people's personality preferences and their employability attributes.

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Authors' contributions

I.P. (University of South Africa) collected the data, conducted the literature review, analysed the data and wrote the report. M.C. (University of South Africa) assisted with the data analyses and report-writing.

Competing interests

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

References

- Ang, S., Van Dyne, L., & Koh, C.K.S. (2006). Personality correlates of the four factor model of cultural intelligence. *Group and Organization Management*, 31, 100–123. <http://dx.doi.org/10.1177/1059601105275267>
- Baruch, Y. (2004). Transforming careers: from linear to multidirectional career paths. Organizational and Individual perspectives. *Career Development International*, 9(1), 58–73. <http://dx.doi.org/10.1108/13620430410518147>
- Beukes, C. (2010). The relationship between employability and emotional intelligence. Unpublished master's dissertation, University of South Africa, Pretoria.
- Bezuidenhout, M. (2011). The development and evaluation of a measure of graduate employability in the context of the new world of work. Unpublished master's dissertation, University of Pretoria, Pretoria.
- Bezuidenhout, M., & Coetzee, M. (2010). *Preliminary Exploratory Factor Analysis: Student Employability Scale*. Unpublished research report, Department of Industrial and Organisational Psychology, University of South Africa, Pretoria.
- Bridgestock, R. (2009). The graduate attributes we've overlooked: enhancing graduate employability through career management skills. *Higher Education Research & Development*, 28(1), 31–44. <http://dx.doi.org/10.1080/07294360802444347>
- Brown, P., & Scase, R. (1994). *Higher education and corporate realities: class, culture and the decline of graduate careers*. London: UCL Press.
- Buchner, M. (2007). *The protean career attitude, emotional intelligence and career adjustment*. Unpublished doctoral dissertation. University of Johannesburg, Johannesburg.
- Bullock-Yowell, E., Andrews, L., & Buzzetta, M.E. (2011). Explaining career decision-making self-efficacy: Personality, cognitions, and cultural mistrust. *Journal of The Career Development Quarterly*, 59, 400–411. <http://dx.doi.org/10.1002/j.2161-0045.2011.tb00967.x>
- Choong, S., & Britton, K. (2007). Character strengths and type: Exploration and Covariation', *International Coaching Psychology Review*, 2(1), 9–23.
- Coetzee, M. (2008). Psychological career resources and subjective work experiences of working adults: A South African survey. *South African Journal of Industrial Psychology*, 34(2), 32–41.

- Coetzee, M. (2005). The relationship between personality preferences, self-esteem and emotional competence. Unpublished doctoral thesis, University of South Africa, Pretoria.
- Coetzee, M. (2010). *Exploratory factor analyses of the Graduatness Scale and the Employability Attributes Scale*. Unpublished research report, Department of Industrial and Organisational Psychology, University of South Africa, Pretoria.
- Coetzee, M. (2012). A framework for developing student graduateness and employability in the economic and management sciences at the University of South Africa. In Coetzee, M., Botha, J., Eccles N., Holtzhausen, N. & Nienaber, H. (eds). *Developing student graduateness and employability: Issues, provocations, theory and practical guidelines* (pp. 119–152) Randburg: Knowres.
- Coetzee, M., & Beukes, C. (2010). Employability, emotional intelligence and career preparation support satisfaction among adolescents in the school-to-work transition phase. *Journal of Psychology in Africa*, 20(3), 439–446.
- Coetzee, M., & Schreuder, A.M.G. (2011). The relation between career anchors, emotional intelligence and employability satisfaction among workers in the service industry. *Southern African Business Review*, 15(3), 76–97.
- Cohen, J. (1992). Quantitative methods in psychology: A power primer. *Psychological Bulletin*, 112(1), 153–159. <http://dx.doi.org/10.1037/0033-2909.112.1.155>
- Cole, M., Field, H., Giles, W., & Harris, S. (2009). Recruiters' inferences of applicant personality based on resume screening: Do paper people have a personality? *Journal of Business Psychology*, 24, 5–18. <http://dx.doi.org/10.1007/s10869-008-9086-9>
- Cranmer, S. (2006). Enhancing graduate employability: best intentions and mixed outcomes. *Studies in Higher Education*, 31(2), 169–184. <http://dx.doi.org/10.1080/03075070600572041>
- De Cuyper, N., Bernhard-Oettel, C., Berntson, E., De Witte, H., & Alarco, B. (2008). Employability and employees' well-being: mediation by job security. *Applied Psychology: An International Review*, 57(3), 488–509.
- De Vos, A., & Soens, N. (2008). Protean attitude and career success: the mediating role of self-management. *Journal of Vocational Behavior*, 73, 449–456. <http://dx.doi.org/10.1016/j.jvb.2008.08.007>
- Fallows, S., & Steven, C. (2000). Building employability skills into the higher education curriculum: a university-wide initiative. *Education and Training*, 42(2), 75–82. <http://dx.doi.org/10.1108/00400910010331620>
- Forrier, A., & Sels, L. (2003). The concept of employability: a complex mosaic. *International Journal of Human Resource Development and Management*, 13(2), 102–124. <http://dx.doi.org/10.1504/IJHRDM.2003.002414>
- Fugate, M., Kinicki, A., & Ashforth, B. (2004). Employability: a psycho-social construct, its dimensions and applications. *Journal of Vocational Behaviour*, 65, 14–38. <http://dx.doi.org/10.1016/j.jvb.2003.10.005>
- Garrey, K. (2007). Beyond ISTJ: A Discourse-Analytic Study of the Use of the Myers-Briggs Type Indicator as an Organisational Change Device in an Australian Industrial Firm. *Asia Pacific Journal of Human Resources*, 45(2), 218–234. <http://dx.doi.org/10.1177/1038411107079117>
- Griessel, H., & Parker, B. (2009). *Graduate attributes: A baseline study on South African graduates from the perspective of employers*. Higher Education South Africa and South African Qualifications Authority: Pretoria.
- Hall, D. (2004). The protean career: A quarter-century journey. *Journal of Vocational Behaviour*, 65(1), 1–13. <http://dx.doi.org/10.1016/j.jvb.2003.10.006>
- Higgs, M. (2001). Is there a relationship between the Myers-Briggs Type Indicator and emotional intelligence? *Journal of Managerial Psychology*, 16(7), 509–533. <http://dx.doi.org/10.1108/EUM0000000006165>
- Jung, C.G. (1921). *The Basic Writings of C.G. Jung*. New York: The Modern Library.
- Jung, C.G. (1971). *Psychological Types*. Princeton, NJ: Princeton University Press.
- Kummerow, J.M., & Quenk, N.L. (2003). *Understanding your MBTI Step II Results*. Mountain View, CA: Consulting Psychologists Press.
- Leary, M.M., Reilly, M.D., & Brown, F.W. (2008). A Study of Personality Preferences and Emotional Intelligence. *Leadership & Organization Development Journal*, 30(5), 421–434. <http://dx.doi.org/10.1108/01437730910968697>
- Marock, C. (2008). *Grappling with your employability in South Africa*. Pretoria: Human Sciences Research Council.
- McQuaid, R., & Lindsay, C. (2005). The concept employability. *Urban Studies*, 42(2), 197–219. <http://dx.doi.org/10.1080/0042098042000316100>
- Mirvis, H., & Hall, D.T. (1994). Psychological success and the boundaryless career. *Journal of Organizational Behavior*, 15, 365–380. <http://dx.doi.org/10.1002/job.4030150406>
- Moyo, S., & Theron, C. (2011). A preliminary factor analytic investigation into the first-order structure of the Fifteen Plus (15FQ+) on a sample of Black south african managers. *SA Journal of Industrial Psychology*, 37(1), Art. #934, 22 pages. <http://dx.doi.org/10.4102/sajip.v37i1.934>
- Myers, I.B. (1998). *Introduction to type: A Description of the Theory and Applications of the Myers-Briggs Type Indicator*. Palo Alto, CA: Consulting Psychologists Press.
- Myers, I., McCaulley, M., Quenk, N., & Hammer, A. (2003). *MBTI Manual: A guide to the development and use of the Myers-Briggs Type Indicator*. Palo Alto, CA: Consulting Psychologists Press.
- Myers, I., & Myers, P. (1995). *Gifts Differing: Understanding Personality Type*. Mountain View, CA: Davies-Black Publishing.
- Myers, P.B., & Myers, K.D. (1998). *Myers-Briggs Type Indicator Form M*. Palo Alto, CA: Consulting Psychologists Press.
- Noe, R.A. Tews, M.J., & Dachner, A.M. (2010). A new perspective for enhancing our understanding of learner motivation and workplace learning. *The Academy of Management Annals*, 4(1), 279–315. <http://dx.doi.org/10.1080/19416520.2010.493286>
- O'Donoghue, J., & Maguire, T. (2005). The individual learner, employability and the workplace: a reappraisal of relationships and prophecies. *Journal of European Industrial Training*, 29(6), 436–446.
- Pool, L., & Sewell, P. (2007). The key to employability: Developing a practical model of graduate employability. *Education and Training*, 49(4), 227–289. <http://dx.doi.org/10.1108/00400910710754435>
- Potgieter, I.L. (2012). *The development of a career meta-competency model for sustained employability*. Unpublished doctoral thesis, University of South Africa, Pretoria.
- Raabe, B., Frese, M., & Beehr, T. (2007). Action related theory and career self-management. *Journal of Vocational Behavior*, 70, 297–311. <http://dx.doi.org/10.1016/j.jvb.2006.10.005>
- Reitman, F., & Schneer, J.A. (2008). Enabling the new careers of the 21st century. *Organization Management Journal*, 5, 17–28. <http://dx.doi.org/10.1057/omj.2008.4>
- Rigby, B., Wood, L., Clark-Murphy, M., Daly, A., Dixon, P., Kavanagh, M., et al. (2010). Review of Graduate Skills: critical thinking, team work, ethical practice & sustainability. Retrieved 27 March 2011 from <http://www.graduateskills.edu.au/literature-review/>
- Rothwell, A., Jewell, S., & Hardie, M. (2009). Self-perceived employability: investigating the responses of post-graduate students. *Journal of Vocational Behaviour*, 75, 152–161. <http://dx.doi.org/10.1016/j.jvb.2009.05.002>
- Savickas, M.L., Nota, L., Rossier, J., Dauwalder, J.P., Duarte, M.E., Guichard, J., et al. (2009). Life designing: a paradigm for career construction in the 21st century. *Journal of Vocational Behavior*, 75, 239–250. <http://dx.doi.org/10.1016/j.jvb.2009.04.004>
- Savickas, M.L. (2011). New questions for vocational psychology: Premises, paradigms, and practices. *Journal of Career Assessment*, 19(3), 251–258. <http://dx.doi.org/10.1177/1069072710395532>
- Savickas, M.L., & Porfeli, E.J. (2012). Career Adapt-Abilities Scale: Construction, reliability, and measurement equivalence across 13 countries. *Journal of Vocational Behavior*, 80, 661–673. <http://dx.doi.org/10.1016/j.jvb.2012.01.011>
- Schreuder, A., & Coetzee, M. (2011). *Careers: an organisational perspective*. Cape Town: Juta.
- Shaughnessy, J., & Zechmeister, E. (2003). *Research methods in psychology*. New York: McGraw-Hill.
- Simmons, R. (2009). Entry to employment: discourses of inclusion and employability in work-based learning for young people. *Journal of Education and Work*, 22(2), 137–151. <http://dx.doi.org/10.1080/13639080902854060>
- Sinclair, V. (2009). Experiencing career satisfaction and career success over the life span. Retrieved February 2, 2010 from <http://www.counselling-directory.org.uk/counselloradvice98889.html>
- Thijssen, J.G.L., Van der Heijden, B.I.J.M., & Rocco, T. (2008). Toward the employability link model: current employment transition to future employment perspectives. *Human Resource Development Review*, 7(2), 165–183. <http://dx.doi.org/10.1177/1534484308314955>
- Tomlinson, M. (2007). Graduate employability and student attitudes and orientations to the labour market. *Journal of Education and Work*, 20(4), 285–304. <http://dx.doi.org/10.1080/13639080701650164>
- Torrington, A. (2001). Relationship between the Bar-On Emotional Quotient Inventory and the Myers-Briggs Type Indicator', *Technical Report #0018*, Toronto: Multi-Health Systems.
- Van der Heijde, C., & Van der Heijden, B. (2006). A competence-based and multidimensional operationalisation of employability. *Human Resource Management*, 45(3), 449–476. <http://dx.doi.org/10.1002/hrm.20119>
- Yorke, M., & Knight, P. (2007). Evidence-informed pedagogy and the enhancement of student employability. *Teaching in Higher Education*, 12(2), 157–170. <http://dx.doi.org/10.1080/13562510701191877>