International Journal of Evidence Based Coaching and Mentoring
Vol. 8, No. 2, August 2010, Page 1

Cultural Orientations Framework (COF) Assessment Questionnaire in Cross-Cultural Coaching: A Cross-Validation with Wave Focus Styles

Céline Rojon, *Department of Psychology, University of Surrey, Guildford, UK*
Almuth McDowall, *Department of Psychology, University of Surrey, Guildford, UK*

Email: C.Rojon@surrey.ac.uk

Abstract

This paper outlines a cross-validation of the Cultural Orientations Framework assessment questionnaire (COF, Rosinski, 2007; a new tool designed for cross-cultural coaching) with the Saville Consulting Wave Focus Styles questionnaire (Saville Consulting, 2006; an existing validated measure of occupational personality), using data from UK and German participants (N = 222). The convergent and divergent validity of the questionnaire was adequate. Contrary to previous findings which used different measures (Ronen & Shenkar, 1985; Schwartz, 1999; House et al., 2004; Bartram et al., 2006), the results from this particular study indicated few national differences between UK and Germany, however differences by gender were observed. These findings are discussed in terms of their implications for the development and use of the COF in practice. This may allow for a more finely grained understanding of culture than previous models such as Hofstede's cultural values framework (1980; 2001), if further evidence for its validity is obtained and published.

Keywords: personality; culture; construct validity; cross-validation; cross-cultural coaching; Cultural Orientations Framework; Wave Focus Styles

Introduction

Work in the 21st century is increasingly global where companies recruit internationally and workers migrate to where the jobs are (Daouk et al., 2006). Hence, there is a clear need to not only understand, but also to compare culture and cross-cultural differences. This is equally true for traditional assessment contexts such as recruitment and promotion, but also for assessments for developmental and coaching purposes. It has been noted that coaches increasingly face situations where they are expected to work with clients from a variety of backgrounds. Hence, considering the role of culture in the work of clients is an important responsibility for coaches (e.g. Peterson, 2007; Jenkins, 2006) and in fact, a sound understanding of clients' cultural perspectives can act as an important leverage to add value to an international coaching context (Abbott & Rosinski, 2007). Psychometrics may offer a common point of reference and indeed, the use of cross-cultural assessments, such as personality and competency measures, is increasing, facilitated by the internet (Van de Vijver & Poortinga, 2007; Daouk et al., 2006). However, practitioners and academics alike face a challenge to ensure that any instruments used adhere to psychometric standards, whilst at the same time being acceptable and usable across various cultures.

Thus, the aims of the present paper are a) to present psychometric evidence on a relatively new tool developed for assessment in coaching with particular reference to construct validity through a priori mapping and internal consistency, b) to explore potential subgroup differences and c) to relate the analysis back to the coaching context.

To this extent, we cross-validated two recently developed measures of personality and competency, designed for international usage, namely the *Cultural Orientations Framework (COF) assessment questionnaire (Rosinski, 2007)* and the *Saville Consulting Wave Focus Styles (Saville Consulting, 2006*) (*cf.* McDowall & Kurz, 2007). We now provide a brief overview of the conceptual foundations and psychometric evidence for each instrument.

The COF questionnaire

The COF assessment is an online, self-report tool, which is relatively new and as yet has not been fully psychometrically validated. It covers a specific and narrow spectrum of behaviours designed to assess a person's cultural orientations in terms of personal preference on a continuum in Part 1 and the ability to deal with any possible cultural orientations in Part 2. A cultural orientation is understood as an 'inclination to think, feel, or act in a way that is culturally determined' (Rosinski, 2003, p. 49). The construct of culture itself is seen by Rosinski (2003, p.20) as "the set of unique characteristics that distinguishes its members from another group" and so is not necessarily confined to the influences of national culture alone. Whilst the development of Rosinski's framework of culture was inspired by the works of some of his fellow thinkers on culture, mainly Hofstede (1980; 2001), Trompenaars and Hampden-Turner (1997) and Hall (1976), the measure appears more finely grained than other, more succinct models of culture. For example in comparison to Hofstede's (1980; 2001) model featuring five dimensions only, Rosinski's framework assesses 17 cultural orientations/dimensions which are grouped under seven categories (see Table 1 and Appendix B). The questionnaire itself is currently available in English. Its prominent feature is that it is one of the few tools designed specifically for use in cross-cultural coaching, to provide a basis for exploring culture as part of a coaching process. The COF measure may hold particular appeal to coaches and coachees as it is accessible free of charge to individual participants from its publisher's website (www.philrosinski.com). However, there is at the time of writing no technical manual available that details psychometric properties in line with best testing practice (International Test Commission, 2001) generating evidence for the purported framework. It was our aim to generate relevant evidence.

Wave Focus Styles

The Wave Focus Styles is also an online, self-report measure based on a hierarchical model of occupational personality (see Appendix A) building on the Big Five (*cf.* Costa & McCrae, 1990) and Great Eight (Bartram, 2005) models of personality and competency respectively. Validation studies have shown good alternate form and internal consistency reliabilities (mean of .78 at the section level) and an average corrected validity of .32 (section level) (Jayne et al., 2006). This tool was chosen as a referent point of comparison as it is suited for an international and cross-cultural context for the following reasons. The original UK English version was developed with an international audience in mind, using simple and unambiguous items, all worded positively, that avoid some of the potential pitfalls of the English language such as double negatives (MacIver et al., 2006). In addition, the instrument has now been translated into fifteen languages, and undergone cross-cultural validation to ensure the underlying constructs remain robust (e.g. Saville Consulting, 2005). The tool can be used for a variety of purposes specific to the workplace, such as recruitment, talent management, organisational development, team development, coaching and personal development (e.g. MacIver et al., 2006). With only 72 normative items, it nevertheless retains good internal consistency reliability and validity compared to longer personality questionnaires (Saville et al., 2008). The instrument covers a broad range of behaviours relevant to the workplace, drawing on constructs such as personality and competence as well as motives and talents (see McDowall & Kurz (2007) for detail on the Wave ® model underpinning the measure). Dimensions that are potentially relevant to understanding culture include in particular the 'Influence' cluster, as this taps into facets such as being persuasive, being open in disagreement or taking

responsibility for big decisions. To illustrate, being very open in disagreements might be seen as a positive personal style in some cultures, but the exact opposite in others where voicing opinions so openly does not fit with cultural norms.

A priori expectations and theoretical mapping

In order to investigate convergent and divergent validity, we mapped the COF and Wave dimensions against each other to determine theoretically related and unrelated constructs using subject matter expert assessments. The mapping was initially formulated by the two researchers who are experienced users of both measures and was then reviewed by representatives for each questionnaire, the author in the case of the COF, and one of the research directors of Saville Consulting who was heavily involved in the development of the Wave Focus Styles. The results of this mapping are shown in Table 1 below. As the COF is short and covers a relatively narrow spectrum, nearly all of the orientations were mapped against more than one Focus section, using the descriptors of these facets as a point of reference. For instance, the orientation 'Scarce/Plentiful' relates to how individuals view resources concerning the aspect of time, which was judged as relating to 'Conscientious' and 'Structured'.

Table 1 - A-priori expectations about convergent validities

COF Categories	**COF Orientations**	**Wave Focus Sections (and overarching clusters)**
Sense of Power and Responsibility	Control/Harmony/Humility	*Influence*: Impactful, Assertive *Delivery*: Driven
Time Management Approaches	Scarce/Plentiful	*Delivery*: Conscientious, Structured
	Monochronic/Polychronic	*Influence*: Sociable *Delivery*: Structured, Driven
	Past/Present/Future	*Thought*: Evaluative, Investigative, Imaginative *Delivery*: Conscientious, Structured, Driven
Definitions of Identity and Purpose	Being/Doing	*Thought*: Investigative, Imaginative *Influence*: Sociable *Adaptability*: Supportive *Delivery*: Driven
	Individualistic/Collectivistic	*Influence*: Sociable, Assertive *Adaptability*: Supportive *Delivery*: Driven
Organizational Arrangements	Hierarchy/Equality	*Influence*: Assertive *Adaptability*: Supportive *Delivery*: Conscientious
	Universalist/Particularist	*Adaptability*: Flexible
	Stability/Change	*Thought*: Investigative, Imaginative *Adaptability*: Flexible *Delivery*: Conscientious, Structured

	Competitive/Collaborative	*Influence*: Sociable, Impactful *Adaptability*: Supportive *Delivery*: Driven
Notions of Territory and Boundaries	Protective/Sharing	*Influence*: Sociable *Adaptability*: Supportive
Communication Patterns	High Context/Low Context	*Delivery*: Conscientious
	Direct/Indirect	*Influence*: Impactful, Assertive *Adaptability*: Supportive, Resilient *Delivery*: Driven
	Affective/Neutral	*Thought*: Evaluative *Influence*: Sociable *Adaptability* : Supportive *Delivery* : Conscientious, Structured
	Formal/Informal	*Influence*: Sociable *Adaptability* : Flexible, Supportive *Delivery* : Conscientious, Structured
Modes of Thinking	Deductive/Inductive	*Thought*: Evaluative, Investigative, Imaginative
	Analytical/Systemic	*Thought*: Evaluative, Investigative, Imaginative

For other orientations this process was more challenging. For example, the orientation 'Universalist/Particularist' was mapped onto 'Flexible': 'Universalist' is defined as 'All cases should be treated in the same universal manner. Adopt common processes for consistency and economies of scale' and 'Particularist' as 'Emphasize particular circumstances. Favor decentralization and tailored solutions', which is theoretically similar to 'Flexible' comprising the three facets 'Optimistic', 'Accepting Change' and 'Receptive to Feedback'. Yet, we recognise that the two dimensions may not overlap entirely as the COF construct seems to relate more to just one of the facets of the Focus construct, namely 'Accepting Change', than to the other two.

Exploration of cross-cultural comparisons

We deliberately based the validation on empirical data gathered from Britain and Germany for the following reasons. First, research evidence regarding any cultural personality differences between these countries is inconsistent: Research by Ronen and Shenkar (1985), Schwartz (1999) and House and colleagues/GLOBE (2002; 2004) for example suggests that the two cultures belong to different clusters ('Germanic' vs. 'Anglo'). Hofstede's (2001) research showed that Germany and the UK differ greatly on the two dimensions 'Individualism versus Collectivism' (Individualism GB > Germany) and 'Uncertainty Avoidance' (Germany > GB), whilst yielding similar results on the other three dimensions. A recent study by Bartram and colleagues (2006), using the OPQ32i, suggested that Germany and the UK not only appear to differ in their cultural orientations, but also in their (occupational) personality. Nevertheless, the results of this study also showed that differences between the cultures appeared smaller than within, with gender having a sizable influence on an individual's personality. A study by Lynn and Martin (1995) explored national differences in personality employing the Eysenck Personality Questionnaire (Eysenck & Eysenck, 1975) and found that Germany and the UK appear to be similar on 'Extraversion' and 'Neuroticism', though slightly different on 'Psychoticism' (Germany > UK). A further study by McCrae and colleagues (2005), using the NEO-PI-R to assess 51 cultures worldwide,

showed that English and German people seem to have a fairly similar personality, the largest differences being on the two dimensions 'Extraversion' (England > Germany) and 'Conscientiousness' (Germany > England). In addition, much cross-cultural research has concerned itself with comparisons between countries that are culturally and geographically distal (e.g. UK - China comparison), but we argue that understanding more proximal comparisons is equally important.

There is at this point in time some debate with regards to the constructs and levels of measurement of culture and personality respectively. Hofstede's (1980; 2001) model for instance was conceived to tap into generalised preferences with regards to workplace behaviour, whereas personality has been researched from various angles, some of which consider nurture (e.g. Jung, 1974) or learned behaviour and environmental influences (e.g. Skinner, 1974). The COF claims to tap into cultural preferences and abilities at the unit of the individual, as the underlying rationale is that cultural influences can come from many sources proximal to the individual, not just national differences alone. The WAVE model is conceptualised from the long established personality model of the Big Five, but also acknowledges that workplace behaviour is shaped by environmental factors, as there are certain universal aspects of competence that can be generalised across organisations (Bartram, 2005). Therefore, both the COF and WAVE models conceptualise behaviour as a product of individual preferences and influences of the environment.

Summary

In summary then, using the more established psychometric measure as a point of reference, our specific aims were:

(1) To cross-validate the COF measure against the Wave Focus Styles through a priori mapping and subsequent testing of associations (external validation).
(2) To evaluate the psychometric properties of the COF measure in itself (internal validation).
(3) To investigate potential cross-cultural differences and similarities between Germany and Britain with focus on COF scales, including a comparison of other subgroups (such as gender).
(4) To identify issues that could feed into a best practice guide for using the COF and Focus Styles in coaching with particular reference to understanding culture.

The current issue and full text archive of this journal is available
http://www.business.brookes.ac.uk/research/areas/coachingandmentoring/

Methods

Procedure and survey distribution

We used a snow-ball sample using the researchers' existing professional and personal contacts. Participants were invited to partake in the study via email and opted into completion of the two questionnaires online by clicking a link to a secure server. A prize draw was offered to attract participants.

The Measures

1) The COF Questionnaire

Figures 1 and 2 show the two item types used in the COF measure. Part 1 of the tool measures orientations with one item each (i.e. 17 items), on a continuum, which, taking the example of the orientation 'Being/Doing', means that an individual with a high score sees themselves as inclined to the 'Doing' side of the continuum and hence to 'focus on accomplishments and visible achievements' (Rosinski, 2003, p. 54), rather than to 'stress living itself and the development of talents and relationships' (as indicated by a low score on this dimension) (Rosinski, 2003, p. 54). Part 2 measures the ability to deal with each cultural orientation pole separately (one item each, i.e. 36 items); a high score here indicates that the person completing the questionnaire thinks they are good at dealing with a particular orientation.

Figure 1 - Orientation item of the COF questionnaire

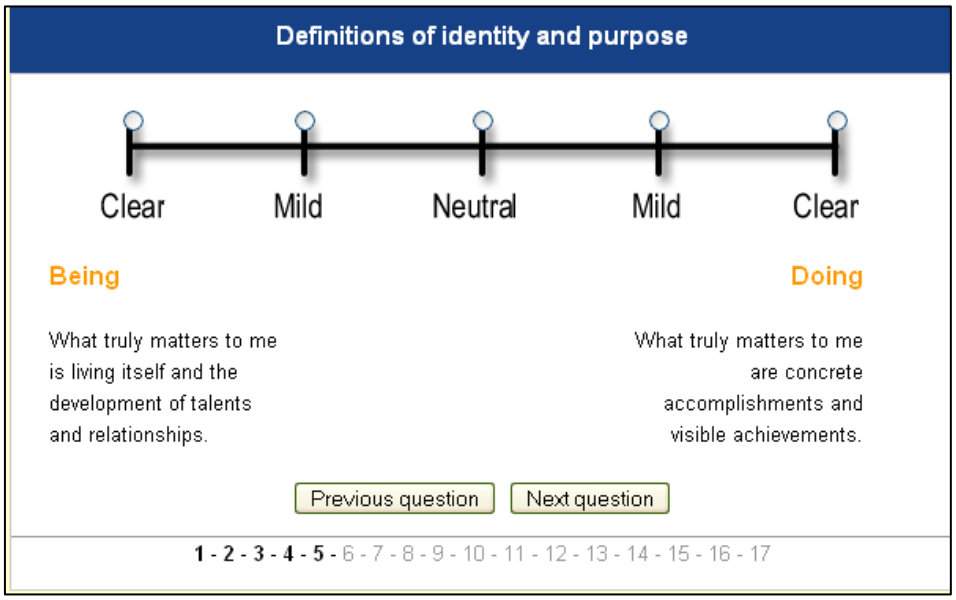
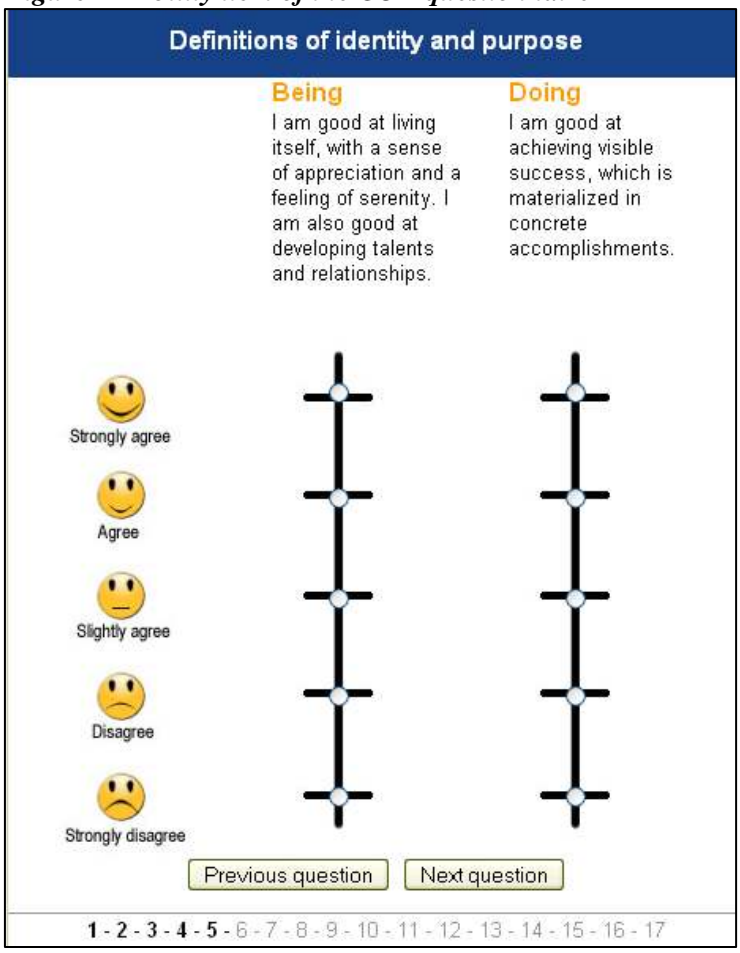


Figure 2 - Ability item of the COF questionnaire

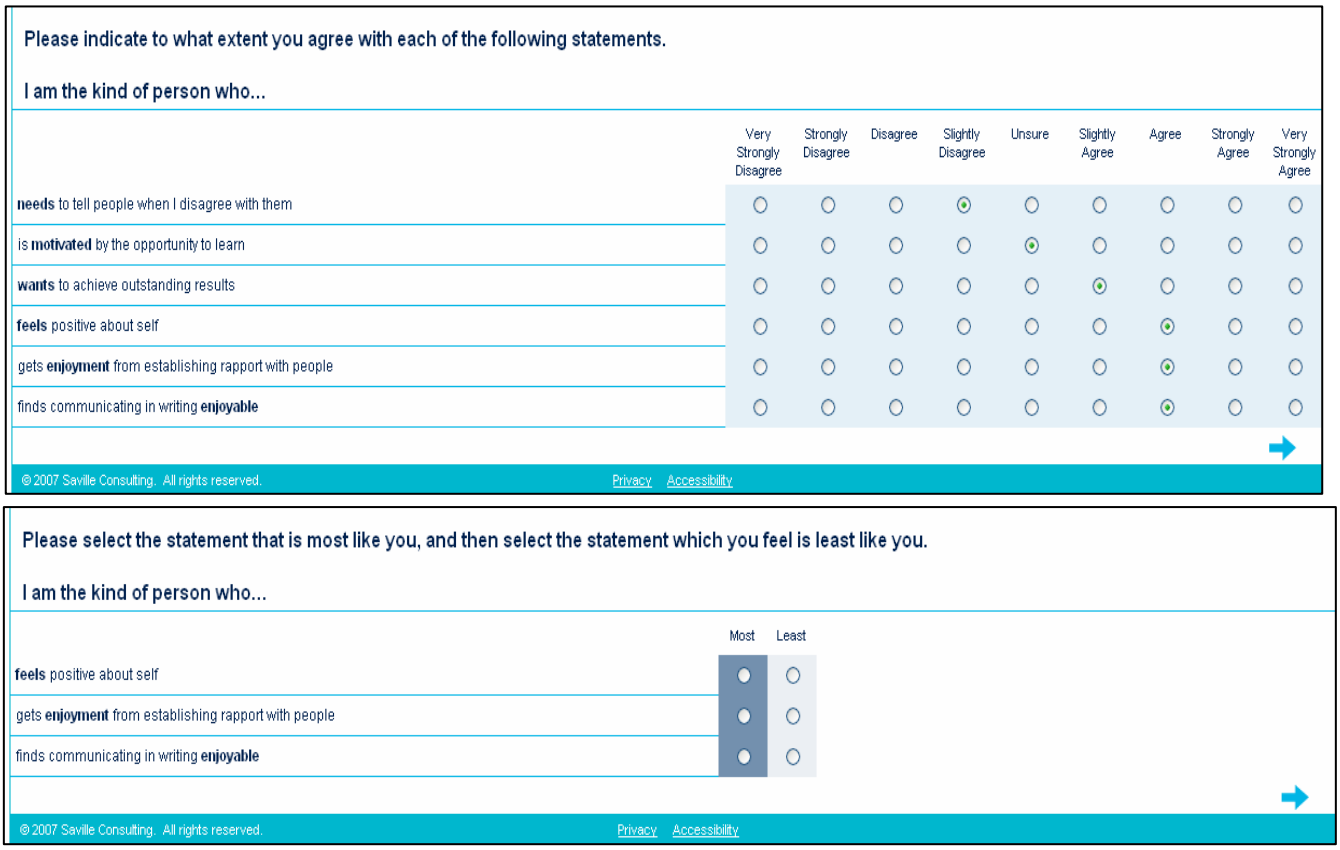


2) The Wave Focus Questionnaire

The 36 facets of the Wave Focus model are measured with two normative items each – one 'talent' and one 'motive' item. Furthermore, when the test-taker assigns more than one normative item the same value, they are prompted to rank themselves (ipsative items) on those particular items (see Figure 3).

Completion of this questionnaire takes approximately 15 minutes. In this instance, test-takers could download their results' report from a designated platform.

Figure 3 - Motive and talent items (normative and ipsative format) of the Focus questionnaire



A series of demographical questions preceded the two measures. Both questionnaires were administered in English; to assess the knowledge of English of non-native speakers, a demographical item asking participants to rate their level of proficiency in English, was included. 84.4 % of the German subgroup of participants rated their English as 'Good' or 'Fluent'.

Participants

A total of N = 222 completed both questionnaires. Of these, 35.1% were male, 64.9% were female. Participants were between 18 and 57 years old, the mean age being 25.01 years (SD = 7.32). 53.6 % were British, 20.3 % German (please refer to Table 2 for a breakdown of sample demographics) and the remaining 26.1 % originated from various continents. Individuals with a non-British/non-German cultural background were excluded from cultural subgroup comparisons. 47.3% of participants were students, 34.2 % were professionals – the remaining 18.5 % did not indicate their occupational status. The subgroup of professionals that was gathered work in a variety of jobs, areas and industry sectors such as healthcare, education and training, retail, science, hospitality, arts/entertainment/media, information technology, automotive/motor vehicle, engineering, telecommunications etc. As the two subgroups of professionals and students were similar with regard to their sample demographics, they were treated as one group for the purposes of construct and internal validation as well as the comparisons by culture (please refer to Table 3).

Table 2 - Demographic characteristics of the British and German subgroups

	British sample (n = 119)	German sample (n = 45)
Gender	34.5% male, 65.5% female	35.6% male, 64.4% female
Age	M = 25.15 (SD=8.26)	M = 24.31 (SD=6.45)
Occupational Status	40.3% students, 42.1% professionals (17.6% no information available)	55.6% students, 22.2% professionals (22.2% no information available)
Highest Qualification	15.1% postgraduate degree, 19.4% first degree, 34.5% high school, 5.9% professional qualification, 9.2 % other, 0.8% no formal qualifications (15.1% no information available)	11.1% postgraduate degree, 24.4% first degree, 46.7% high school (17.8% no information available)
Knowledge of English	92.4% not applicable (i.e. English 1st language), 7.6% fluent	33.3% fluent, 51.1% good, 8.9% intermediate, 6.7% basic

Table 3 - Demographic characteristics of the student and professionals subgroups

	Student sample (N=105)	Professional sample (N=76)
Gender	32.4% male, 67.6% female	43.4% male, 56.6% female
Age	M=23.24 (SD=5.07)	M=27.99 (SD=9.65)
Culture	45.7% British, 23.8% German, 8.6% other European countries, 21.9% non-European countries	65.8% British, 13.2% German, 10.5% other European countries, 10.5% non-European countries
Highest Qualification	17.1% postgraduate degree, 24.8% first degree, 45.6% high school, 2.9% professional qualification, 5.7 % other, 1.0% no formal qualifications (2.9% no information available)	26.4% postgraduate degree, 28.9% first degree, 27.6% high school, 6.6% professional qualification, 7.9% other (2.6% no information available)
Knowledge of English	52.4% not applicable (i.e. English 1st language)/26.7% fluent/15.2% good/2.9% intermediate/2.8% basic	67.1% not applicable (i.e. English 1st language)/27.6% fluent/5.3% good

Results*

External Validation of the COF: Construct Validity

Convergent (i.e. medium to high correlations) and divergent (i.e. correlations very low/close to zero) validities for the COF measure were calculated by correlating COF constructs with theoretically related Focus constructs (*cf.* Table 1 displaying the a priori mapping of the dimensions). Tables 4a and 4b show correlation coefficients of COF orientations/abilities with Focus sections – cells shaded in grey indicate correlations corresponding to a priori expectations. With regards to these expected **convergent validities**, the majority of hypothesised correlations were detected in the data set, with correlation coefficients of theoretically similar COF and Focus constructs mostly indicating medium effects (r =.30) (*cf.* Cohen, 1988) and hence providing some support for the measure's convergent validity. This suggests that there is some overlap, but also construct difference.

Both instruments are meant to measure individual behavioural styles, and are conceptually related, yet distinct – which is supported by correlation coefficients found here. The COF questionnaire measures cultural orientations and the abilities to cope with those orientations, whereas the Focus assesses occupational personality traits and competencies. Some constructs theoretically share more of the same construct than others and for those it has been found that the correlation coefficients were indeed higher. A few examples are given here to illustrate this: One of the highest correlations was found between the COF orientation 'Direct/Indirect' and the Focus section 'Impactful' (r = -.45), indicating that a low score on the continuum 'Direct/Indirect', i.e. an inclination towards the 'Direct' pole, parallels a high score on 'Impactful'. These two variables would be expected to correlate highly, as their constructs are defined in very similar ways – 'Direct' being defined as 'In a conflict or with a tough message to deliver, get your point across clearly at the risk of offending or hurting' (Rosinski, 2007) and 'Impactful' defined by the facets 'Persuasive', 'Giving Presentations' and 'Prepared to Disagree' (Saville Consulting, 2006). 'Prepared to Disagree' has the highest negative correlation with 'Direct/Indirect' (r = -.43), which is explainable when comparing the constructs' definitions. Another particularly high correlation was found for the COF ability 'Change' with the Focus section 'Flexible' (r = .47). Again, the definitions of the two constructs are very similar – 'Change' is defined as 'Value a dynamic and flexible environment. Promote effectiveness through adaptability and innovation. Avoid routine, perceived as boring.' (Rosinski, 2007) and 'Flexible' is made up of the facets 'Optimistic', 'Accepting Change' and 'Receptive to Feedback' (Saville Consulting, 2006). It comes as no surprise that the Focus facet correlating highest with the COF ability 'Change' is 'Accepting Change' (r = -.54†). An instance of a medium correlation would be an r of .26 between the COF ability 'Scarce' and the Focus section 'Driven' – those two variables seem to tap into the same construct, yet they are distinct from each other; 'Scarce' is defined as 'Time is a scarce resource. Manage it carefully.' (Rosinski, 2007), whereas 'Driven' encompasses the facets 'Action Oriented', 'Entrepreneurial' and 'Results Driven' (Saville Consulting, 2006).

* Please note that a number of variables were transformed into being normally distributed before conducting further analysis in order to be able to perform parametric statistical procedures on the data set.
† Please note that the direction of this correlation coefficient is contrary to theoretical expectations. This is attributable to the fact that the ability 'Change' was subjected to transformation to achieve normal distribution.

Table 4a **- Convergent and divergent validities: COF orientations and Focus section. Shaded boxes indicate correlations corresponding to a-priori expectations**

COF \ Focus	Evaluative	Investigative	Imaginative	Sociable	Impactful	Assertive	Resilient	Flexible	Supportive	Conscientious	Structured	Driven
Control/Harmony/Humility	.13	.02	.05	-.173(**)	-.153(*)	-.12	-.05	.06	-.168(*)	-.04	-.06	-.188(**)
Scarce/Plentiful	.08	.11	-.12	-.05	-.07	-.142(*)	.07	.01	-.11	-.144(*)	-.257(**)	-.209(**)
Monochronic/Polychronic	.04	.03	.00	-.181(**)	-.07	-.03	-.11	.07	.02	.154(*)	.03	.03
Past/Present/Future	.03	.13	-.10	.06	-.06	-.04	-.04	.08	-.07	-.02	-.03	-.11
Being/Doing	.10	.02	.159(*)	-.10	.149(*)	.147(*)	-.01	.132(*)	.360(**)	.12	.156(*)	.306(**)
Individualistic/Collectivistic	-.05	.08	-.02	-.03	-.03	-.03	.01	-.139(*)	-.331(**)	.01	-.08	-.148(*)
Hierarchy/Equality	.04	-.139(*)	.03	.07	-.137(*)	-.137(*)	-.203(**)	-.04	-.133(*)	-.225(**)	-.134(*)	-.07
Universalist/Particularist	-.07	.12	.00	-.11	-.145(*)	.02	-.06	.06	-.241(**)	.13	.04	-.04
Stability/Change	-.03	.246(**)	-.266(**)	-.202(**)	-.09	-.05	-.07	.469(**)	-.02	.363(**)	.324(**)	-.152(*)
Competitive/Collaborative	-.02	.03	.12	.188(**)	.192(**)	.08	.11	.00	.266(**)	.00	.12	.246(**)
Protective/Sharing	-.136(*)	.00	-.04	.214(**)	.06	.188(**)	.153(*)	-.11	-.146(*)	-.03	.166(*)	.06
High Context/Low Context	.11	.11	-.03	-.10	.11	-.134(*)	-.13	.09	.249(**)	.11	.05	-.03
Direct/Indirect	-.08	.195(**)	-.186(**)	-.13	-.451(**)	-.269(**)	-.09	-.02	-.158(*)	.01	.01	-.162(*)
Affective/Neutral	.234(**)	.00	.10	-.403(**)	.12	.00	-.190(**)	.145(*)	.349(**)	.03	.02	.06
Formal/Informal	-.03	-.213(**)	.10	.258(**)	.02	.01	.13	-.302(**)	-.03	-.367(**)	-.197(**)	.08
Deductive/Inductive	.12	-.12	.08	-.156(*)	.00	-.03	-.06	.09	.02	.02	-.07	-.03
Analytical/Systemic	-.10	.05	.00	.09	.02	-.04	.00	-.01	.04	-.187(**)	-.144(*)	-.05

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Shaded boxes indicate correlations corresponding to a-priori expectations.

Table 4b **-Convergent and divergent validities: COF abilities and Focus sections. Shaded cells indicate correlations corresponding to a-priori expectations**

COF Focus	Evaluative	Investigative	Imaginative	Sociable	Impactful	Assertive	Resilient	Flexible	Supportive	Conscientious	Structured	Driven
Control	-,09	,184(**)	-,13	-,153(*)	-,253(**)	-,493(**)	-,11	,12	-,175(**)	,04	-,261(**)	-,346(**)
Harmony	,04	-,10	,156(*)	,08	-,02	,07	,173(**)	-,140(*)	-,13	,02	,13	,02
Humility	,08	,06	,00	-,08	-,207(**)	-,08	,05	-,132(*)	-,270(**)	,04	-,08	-,212(**)
Scarce	,07	-,169(*)	,08	-,03	,04	,230(**)	,152(*)	,03	,141(*)	,13	,498(**)	,257(**)
Plentiful	-,04	,07	,00	,06	-,04	-,12	,12	-,03	-,142(*)	,00	-,144(*)	-,149(*)
Monochronic	-,160(*)	,04	-,02	,219(**)	,03	-,04	,02	-,03	-,05	-,233(**)	-,136(*)	-,07
Polychronic	-,04	-,09	-,07	,09	-,02	,07	,08	-,08	-,09	-,06	,136(*)	-,07
Past	-,132(*)	,05	-,142(*)	,03	,08	-,07	-,09	,08	,149(*)	-,06	,03	,05
Present	,03	-,06	,08	,223(**)	,176(**)	,10	,165(*)	-,194(**)	,09	-,10	-,02	,167(*)
Future	,05	-,230(**)	,208(**)	,06	,154(*)	,280(**)	,11	-,136(*)	,09	,06	,169(*)	,240(**)
Being	,04	,193(**)	-,151(*)	-,364(**)	-,152(*)	-,224(**)	-,348(**)	,303(**)	,11	,147(*)	,01	-,09
Doing	,08	-,243(**)	,134(*)	,10	,10	,201(**)	,08	-,11	,156(*)	,132(*)	,235(**)	,356(**)
Individualistic	-,148(*)	,200(**)	-,149(*)	-,189(**)	-,238(**)	-,191(**)	-,06	,06	-,292(**)	,05	-,09	-,210(**)
Collectivistic	,06	-,09	,201(**)	,10	,04	,277(**)	,170(*)	-,190(**)	-,203(**)	,01	,00	,11
Hierarchy	-,13	-,169(*)	-,02	,08	,00	-,05	-,07	-,02	,02	-,303(**)	-,11	,03
Equality	,03	-,250(**)	,193(**)	,09	-,02	,12	-,04	-,167(*)	-,135(*)	-,175(**)	-,08	,134(*)
Universalist	,00	,08	-,03	-,11	-,197(**)	,00	-,11	,10	-,137(*)	,239(**)	,11	,02
Particularist	,09	-,336(**)	,271(**)	,240(**)	,271(**)	,162(*)	,158(*)	-,274(**)	,04	-,170(*)	-,11	,259(**)
Stability	,07	,12	-,136(*)	-,269(**)	-,08	-,01	-,150(*)	,263(**)	,06	,366(**)	,270(**)	,01
Change	-,04	,275(**)	-,330(**)	-,305(**)	-,191(**)	-,274(**)	-,138(*)	,469(**)	,05	,277(**)	,151(*)	-,280(**)
Competitive	,150(*)	-,283(**)	,261(**)	,265(**)	,251(**)	,284(**)	,13	-,134(*)	,267(**)	,00	,152(*)	,424(**)
Collaborative	,04	,12	-,158(*)	-,08	-,03	-,167(*)	-,05	,152(*)	,288(**)	,12	,12	-,08
Protective	-,13	,158(*)	-,08	,09	-,07	-,01	,05	-,01	-,02	,00	,11	-,01
Sharing	,213(**)	-,03	,06	-,241(**)	-,08	-,182(**)	-,199(**)	,136(*)	,259(**)	,04	-,07	,02
High Context	,11	,12	-,03	-,179(**)	-,03	-,13	-,12	,10	,236(**)	,142(*)	,02	-,01

COF / Focus	Evaluative	Investigative	Imaginative	Sociable	Impactful	Assertive	Resilient	Flexible	Supportive	Conscientious	Structured	Driven
Low Context	,145(*)	-,10	,11	,06	,173(**)	,10	,02	,01	,04	,154(*)	,144(*)	,04
Direct	,06	-,171(*)	,191(**)	,10	,397(**)	,388(**)	,163(*)	-,07	,278(**)	-,05	,07	,150(*)
Indirect	-,01	-,09	,08	,03	,173(*)	,10	-,02	,05	,187(**)	,05	,06	,09
Affective	,182(**)	,06	,04	-,408(**)	-,05	-,147(*)	-,248(**)	,145(*)	,309(**)	,06	-,09	-,07
Neutral	,226(**)	-,04	,195(**)	-,206(**)	,215(**)	,141(*)	-,06	,07	,161(*)	,05	,03	,09
Formal	-,11	-,08	,01	,13	,13	,06	,06	-,10	,07	-,398(**)	-,219(**)	,06
Informal	-,05	,260(**)	-,311(**)	-,403(**)	-,163(*)	-,154(*)	-,225(**)	,243(**)	,02	,381(**)	,187(**)	-,196(**)
Deductive	,189(**)	-,168(*)	,147(*)	-,08	,00	,05	-,01	,02	,05	,05	,03	,12
Inductive	-,134(*)	,154(*)	-,267(**)	-,204(**)	-,213(**)	-,190(**)	-,12	,140(*)	-,12	,139(*)	,05	-,267(**)
Analytical	,353(**)	-,138(*)	,229(**)	-,146(*)	,02	,11	-,02	-,09	,03	,13	,11	,05
Systemic	,155(*)	-,248(**)	,256(**)	,01	,10	,168(*)	,11	-,162(*)	,09	-,170(*)	-,02	,169(*)

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Shaded boxes indicate correlations corresponding to a-priori expectations.

A high number of very low/zero correlation coefficients between theoretically not related COF and Focus constructs is indicative of the COF's **divergent validities**, as many of the dimensions of the questionnaires are defined differently (*cf.* Tables 4a and 4b). This holds true for the orientations and for the abilities. Examples of this are the low correlations between the COF orientation 'Individualistic/Collectivistic' and the Focus section 'Resilient' (r = .01) or between the COF ability 'Systemic' and the Focus section 'Sociable' (r = .01) – in both examples, the definitions of the two respective dimensions have literally nothing in common (see Appendix A and B).

Internal Validation of the COF

Internal consistency reliabilities (Cronbach's alpha) of the COF structure were assessed. Alpha coefficients were obtained for the five COF categories containing more than one item. Table 5 shows that all coefficients are below the cut-off point of $\alpha = .70$ (Kline, 1999). This is not surprising as the dimensions within each category all appear to tap into different constructs despite being grouped under the same categories. Hence, low coefficients are not necessarily cause for concern, as they may rather indicate that each dimension measures diverse facets (Kline, 1999). However, given that the coefficients were below commonly accepted standards, internal consistency needs to be flagged here as an area for future study and investigation. In addition, negative coefficients, which were obtained for four of the five categories for the orientations, suggest that the respective construct may be split into two or more sub-constructs, or indeed measure different aspects altogether.

Table 5 - COF Alpha coefficients of internal consistency reliability

COF Category	**Cronbach's alpha for orientations**	**Cronbach's alpha for combined abilities**	**Cronbach's alpha for orientations and abilities combined**
Time Management Approaches	.10	.50	.30
Definitions of Identity and Purpose	-.63	.54	.28
Organizational Arrangements	-.22	.05	.43
Communication Patterns	-.19	.65	.30
Modes of Thinking	-.65	.66	.52

The current issue and full text archive of this journal is available
http://www.business.brookes.ac.uk/research/areas/coachingandmentoring/

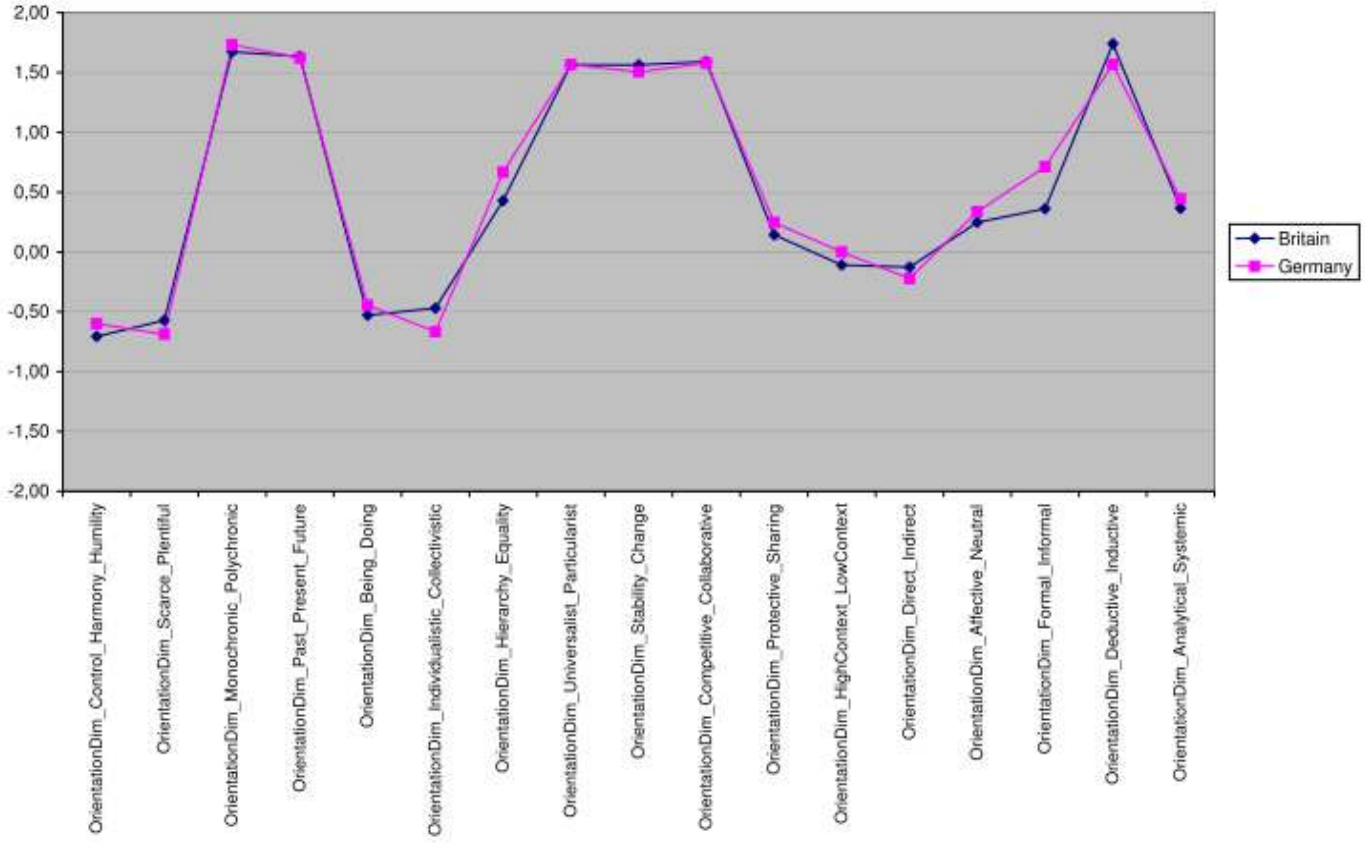
International Journal of Evidence Based Coaching and Mentoring
Vol. 8, No. 2, August 2010, Page 15

Comparison of Cultural Subgroups

i) By culture

Effect sizes of the means (Cohen's d) were obtained for COF orientations and abilities and for Focus clusters and sections (see Table 6). The majority of these effects were classified as small (d = .20) (*cf.* Cohen, 1988), suggesting that the two cultures do not appear to differ on many dimensions. Differences between the German and the British subsample were also graphically represented, as exemplified by Figure 4, showing that German and British people rated themselves similarly on most of the COF orientations (please remember that orientations are measured on a continuum). Larger differences were only found for the dimensions 'Individualistic/Collectivistic' (with Germans being slightly more inclined towards Individualism than British people), 'Hierarchy/Equality' (Germans slightly more oriented towards Equality than British) and 'Formal/Informal' (German people more inclined towards Formality than British people).

Figure 4 - Subgroup differences for origin (COF)



ii) By gender

The observed differences between the male and the female subsample (*cf.* Table 6) were larger differences than for culture. On the COF orientations, significant (alpha level of .05) differences (medium effects) were detected for the dimensions 'Hierarchy-Equality', with women showing a higher tendency towards 'Equality' than men, for 'Direct-Indirect', with men being more inclined towards a direct approach than women and for 'Affective-Neutral', where women showed a higher tendency towards the 'Affective' pole than men. With regard to the COF abilities, it was

found that women rated themselves higher on the dimensions 'Polychronic' and 'Affective'; men had a higher mean on the dimensions 'Competitive', 'Direct' and 'Neutral'. On seven of the twelve Focus sections, subgroup means for men and women differed markedly: men rated themselves higher on 'Evaluative', 'Imaginative' (both belonging to the 'Thought' Cluster), 'Impactful' and 'Assertive' (both belonging to the 'Influence' Cluster); women had a higher mean on 'Supportive', 'Conscientious' and 'Structured' (the last two being part of the 'Delivery' Cluster).

Table 6 - Effect sizes of the means (Cohen's d). Light shaded cells represent small (d = .20) and dark shaded cells medium (d = .50) effects

	N	**Gender** M=78, F=144 **Effect Size** d	**Age** Y=186, O=36 **Effect Size** d	**Origin** GB=119, Ger=45 **Effect Size** d	**Occupation** Stu=105, Prof=76 **Effect Size** d
COF Orientations	**Control/Harmony/Humility**	-.03	-.30	-.11	.12
	Scarce/Plentiful	.01	.13	.12	.07
	Monochronic/Polychronic	.08	.26	-.17	.10
	Past/Present/Future	-.26	-.03	.04	.06
	Being/Doing	.22	.26	-.08	-.12
	Individualistic/Collectivistic	-.15	-.33	.19	-.08
	Hierarchy/Equality	-.46	-.14	-.23	.17
	Universalist/Particularist	.04	.24	.00	-.03
	Stability/Change	-.22	.28	.17	.03
	Competitive/Collaborative	.24	.12	.04	.11
	Protective/Sharing	-.14	.17	-.08	-.17
	High Context/Low Context	.11	.18	-.09	-.07
	Direct/Indirect	-.36	-.15	.08	-.07
	Affective/Neutral	.46	.13	-.41	.18
	Formal/Informal	-.09	-.10	-.34	-.21
	Deductive/Inductive	.41	-.18	.58	.01
	Analytical/Systemic	-.13	.25	-.38	.01
COF Single Abilities	**Control**	-.27	.14	-.15	.33
	Harmony	.01	-.26	-.05	.05
	Humility	.11	-.36	.03	.15
	Scarce	.09	-.27	-.19	-.20
	Plentiful	.11	.18	-.09	.43
	Monochronic	-.11	-.07	.06	-.16
	Polychronic	-.44	-.08	-.05	-.24
	Past	-.02	.53	-.17	.01
	Present	.02	-.20	-.21	.07
	Future	.09	-.08	.34	.03
	Being	-.06	.00	-.14	-.02
	Doing	.02	.19	-.07	-.07
	Individualistic	-.34	-.31	.35	-.09
	Collectivistic	.09	-.06	.05	-.16
	Hierarchy	-.24	.01	-.06	.35
	Equality	-.13	-.25	.06	-.04
	Universalist	.01	-.06	.06	-.09
	Particularist	.22	-.24	.36	-.25
	Stability	.01	.17	.29	-.01

	N	Gender M=78, F=144 Effect Size d	Age Y=186, O=36 Effect Size d	Origin GB=119, Ger=45 Effect Size d	Occupation Stu=105, Prof=76 Effect Size d
	Change	-.31	.22	-.13	.28
	Competitive	.46	.03	.08	-.09
	Collaborative	.08	.06	-.08	.13
	Protective	-.14	.43	-.54	.02
	Sharing	.40	.23	-.10	.16
	High Context	.17	.40	-.14	.14
	Low Context	-.11	-.10	.32	-.09
	Direct	.43	-.08	.12	-.17
	Indirect	.02	.38	-.01	.16
	Affective	.51	.16	-.16	.00
	Neutral	.40	.01	-.13	-.07
	Formal	.19	.17	-.27	.06
	Informal	-.16	.22	.01	.27
	Deductive	.30	-.12	.18	.08
	Inductive	-.16	.13	-.03	.37
	Analytical	.22	-.50	.33	-.12
	Systemic	.21	-.07	-.26	-.23
Focus Cluster	**Thought**	.60	-.34	-.03	-.22
	Influence	.30	-.02	-.25	-.24
	Adapt	.13	.63	-.02	.18
	Delivery	-.40	.38	.05	-.08
Focus Sections	**Evaluative**	.52	-.19	-.04	-.12
	Investigative	-.13	.22	-.20	.28
	Imaginative	.61	-.36	-.17	-.10
	Sociable	-.17	.13	.01	.02
	Impactful	.43	-.12	-.44	-.19
	Assertive	.43	-.05	-.12	-.38
	Resilient	.24	-.39	-.22	-.07
	Flexible	-.01	.30	.32	.18
	Supportive	.55	.31	-.50	.12
	Conscientious	-.40	.40	.34	.25
	Structured	-.62	.17	-.18	-.16
	Driven	.28	.21	-.09	-.34

Moreover, tests of difference were conducted to assess whether differences between the two cultural subgroups are statistically significant. In accordance with the small effect sizes found, results indicate that there are hardly any (significant) differences between Germans and British. The most (and significant) differences were found between men and women (*cf.* Table 7).

Table 7 - Results of Mann-Whitney U tests of difference. Cells shaded in dark grey represent an alpha level of .01 (2-tailed), in light grey an alpha level of .05 (2-tailed).

		Gender			Age			Origin			Occupation		
		U	z	p	U	z	p	U	z	P	U	z	p
COF Orientations	**Control/Harmony/Humility**	5537.50	-.18	.86	2734.00	-1.83	.07	2541.00	-.53	.60	3754.00	-.71	.47
	Scarce/Plentiful	5612.50	-.01	.99	3119.50	-.68	.50	2561.00	-.45	.65	3769.00	-.67	.50
	Monochronic/Polychronic	5331.00	-.64	.52	2923.50	-1.24	.21	2398.50	-1.07	.29	3772.00	-.65	.52
	Past/Present/Future	4861.50	-1.71	.09	3295.00	-.16	.88	2618.00	-.23	.82	3855.50	-.40	.69
	Being/Doing	4999.00	-1.40	.16	2890.50	-1.34	.18	2594.50	-.32	.75	3647.50	-1.02	.31
	Individualistic/Collectivistic	5124.50	-1.12	.26	2755.50	-1.75	.08	2428.50	-.96	.34	3774.50	-.64	.52
	Hierarchy/Equality	4337.00	-2.92	.00	2970.00	-1.12	.26	2369.00	-1.18	.24	3621.00	-1.10	.27
	Universalist/Particularist	5510.50	-.24	.81	2985.00	-1.08	.28	2659.00	-.07	.94	3871.50	-.36	.72
	Stability/Change	4970.50	-1.48	.14	2875.50	-1.40	.16	2430.50	-.95	.34	3908.50	-.24	.81
	Competitive/Collaborative	4877.00	-1.68	.09	3154.00	-.57	.57	2616.00	-.24	.81	3751.50	-.71	.48
	Protective/Sharing	5162.50	-1.02	.31	3031.50	-.92	.36	2561.00	-.44	.66	3607.00	-1.13	.26
	High Context/Low Context	5283.00	-.75	.45	2995.50	-1.02	.31	2546.50	-.50	.62	3847.00	-.42	.67
	Direct/Indirect	4565.00	-2.39	.02	3049.50	-.88	.38	2554.50	-.47	.64	3819.50	-.51	.61
	Affective/Neutral	4205.00	-3.24	.00	3107.50	-.72	.47	2041.00	-2.46	.01	3600.00	-1.17	.24
	Formal/Informal	5416.00	-.46	.65	3207.50	-.42	.68	2118.50	-2.14	.03	3622.50	-1.10	.27
	Deductive/Inductive	4294.50	-3.00	.00	2967.00	-1.12	.26	1870.50	-3.10	.00	3942.00	-.14	.89
	Analytical/Systemic	5260.00	-.80	.42	2858.50	-1.42	.15	2177.50	-1.90	.06	3892.50	-.29	.77
COF Abilities	**Control**	4823.00	-1.86	.06	3127.00	-.67	.50	2431.00	-.98	.33	3339.50	-2.01	.04
	Harmony	5580.50	-.08	.93	2858.00	-1.46	.14	2596.50	-.32	.75	3822.00	-.51	.61
	Humility	5268.00	-.79	.43	2675.50	-1.99	.05	2597.50	-.31	.76	3703.50	-.86	.39
	Scarce	5278.00	-.77	.44	2856.00	-1.45	.15	2406.50	-1.04	.30	3511.50	-1.43	.15
	Plentiful	5189.50	-.97	.33	3082.00	-.78	.43	2519.00	-.61	.54	2986.00	-3.00	.00
	Monochronic	5254.50	-.83	.41	3264.00	-.25	.80	2603.00	-.29	.77	3638.00	-1.06	.29
	Polychronic	4415.50	-2.77	.01	3186.50	-.48	.63	2567.00	-.43	.67	3396.50	-1.80	.07
	Past	5424.50	-.46	.64	2434.00	-2.85	.00	2369.00	-1.26	.21	3946.00	-.14	.89
	Present	5493.50	-.28	.78	2914.50	-1.30	.19	2288.50	-1.52	.13	3848.50	-.43	.67
	Future	5371.00	-.56	.57	3281.50	-.20	.84	2155.00	-2.01	.04	3904.50	-.26	.80
	Being	5343.00	-.64	.52	3334.50	-.04	.97	2523.00	-.62	.54	3917.00	-.22	.82
	Doing	5547.00	-.16	.87	3065.50	-.86	.39	2671.50	-.02	.98	3834.50	-.48	.63
	Individualistic	4643.00	-2.31	.02	2816.00	-1.64	.10	2187.50	-1.97	.05	3806.00	-.58	.56
	Collectivistic	5263.00	-.82	.41	3208.00	-.42	.67	2635.50	-.17	.87	3661.50	-1.01	.31
	Hierarchy	4868.00	-1.72	.08	3334.50	-.04	.97	2621.50	-.22	.83	3317.50	-2.03	.04
	Equality	5204.00	-.98	.33	2851.50	-1.53	.13	2610.50	-.27	.79	3978.00	-.04	.97

		Gender			Age			Origin			Occupation		
		U	z	p	U	z	p	U	z	P	U	z	p
	Universalist	5449.50	-.38	.70	3215.00	-.40	.69	2553.00	-.49	.63	3832.50	-.47	.63
	Particularist	4829.50	-1.83	.07	2934.00	-1.25	.21	2167.00	-2.01	.04	3424.00	-1.72	.09
	Stability	5568.50	-.11	.91	3065.50	-.84	.40	2157.00	-2.02	.04	3904.50	-.26	.80
	Change	4661.00	-2.27	.02	2989.00	-1.10	.27	2478.00	-.80	.42	3371.00	-1.92	.05
	Competitive	4219.00	-3.20	.00	3175.00	-.51	.61	2540.50	-.53	.60	3947.50	-.13	.90
	Collaborative	5384.00	-.57	.57	3286.00	-.20	.84	2538.50	-.57	.57	3696.00	-.94	.35
	Protective	5125.50	-1.13	.26	2568.00	-2.32	.02	1869.00	-3.12	.00	3956.50	-.10	.92
	Sharing	4460.50	-2.65	.01	2939.50	-1.21	.23	2561.50	-.45	.65	3676.00	-.94	.35
	High Context	5184.50	-1.00	.32	2631.00	-2.14	.03	2503.50	-.68	.50	3664.00	-.99	.32
	Low Context	5284.00	-.78	.44	3114.00	-.71	.48	2210.00	-1.86	.06	3748.50	-.75	.45
	Direct	4287.00	-3.01	.00	3211.50	-.40	.69	2470.00	-.79	.43	3633.00	-1.06	.29
	Indirect	5534.50	-.19	.85	2694.00	-1.96	.05	2630.50	-.18	.85	3731.50	-.79	.43
	Affective	4207.00	-3.29	.00	3000.50	-1.05	.29	2481.00	-.77	.44	3976.00	-.04	.97
	Neutral	4365.50	-2.85	.00	3293.50	-.16	.87	2536.00	-.54	.59	3803.00	-.56	.58
	Formal	5033.00	-1.36	.17	2995.50	-1.06	.29	2261.50	-1.65	.10	3775.50	-.65	.51
	Informal	4994.00	-1.46	.14	2950.50	-1.21	.23	2640.50	-.14	.88	3442.50	-1.69	.09
	Deductive	4830.50	-2.13	.03	3166.00	-.64	.52	2459.00	-1.01	.31	3848.50	-.51	.61
	Inductive	5064.00	-1.28	.20	3168.00	-.54	.59	2623.00	-.21	.83	3176.00	-2.48	.01
	Analytical	4914.00	-1.63	.10	2466.00	-2.65	.01	2254.00	-1.66	.10	3832.50	-.48	.63
	Systemic	4865.50	-1.73	.08	3180.00	-.50	.62	2299.50	-1.46	.14	3499.00	-1.49	.14
Focus Clusters	**Thought**	3805.00	-3.96	.00	2730.00	-1.75	.08	2677.00	.00	1.00	3501.50	-1.40	.16
	Influence	4616.00	-2.19	.03	3290.00	-.16	.87	2263.00	-1.53	.13	3451.50	-1.55	.12
	Adaptability	5354.50	-.57	.57	2374.00	-2.76	.01	2669.50	-.03	.98	3558.50	-1.24	.21
	Delivery	4298.00	-2.89	.00	2820.50	-1.50	.13	2614.50	-.23	.82	3815.50	-.50	.62
Focus Sections	**Evaluative**	4014.50	-3.51	.00	3133.50	-.61	.54	2620.50	-.21	.83	3763.50	-.65	.51
	Investigative	5106.50	-1.12	.26	3015.50	-.94	.35	2422.50	-.94	.35	3190.00	-2.30	.02
	Imaginative	3789.50	-4.00	.00	2627.00	-2.04	.04	2456.00	-.82	.41	3850.00	-.40	.69
	Sociable	5086.50	-1.16	.25	3083.50	-.75	.45	2666.50	-.04	.97	3951.50	-.11	.91
	Impactful	4255.50	-2.98	.00	3037.00	-.88	.38	2018.50	-2.43	.02	3441.00	-1.58	.11
	Assertive	4240.50	-3.01	.00	3241.50	-.30	.76	2483.00	-.72	.47	3209.50	-2.24	.02
	Resilient	4924.00	-1.51	.13	2557.50	-2.24	.02	2343.00	-1.23	.22	3880.00	-.32	.75
	Flexible	5587.50	-.06	.95	2748.50	-1.70	.09	2268.50	-1.51	.13	3543.00	-1.29	.20
	Supportive	3901.50	-3.75	.00	2863.50	-1.37	.17	1886.50	-2.92	.00	3739.00	-.72	.47
	Conscientious	4289.50	-2.90	.00	2533.50	-2.31	.02	2231.50	-1.64	.10	3369.00	-1.79	.07
	Structured	3776.50	-4.03	.00	3044.00	-.86	.39	2388.00	-1.07	.29	3759.00	-.66	.51

Discussion

With reference to our initial objectives, this initial validation of the COF measure produced the following findings:

(1) To cross-validate the COF measure against the Wave Focus (external validation)

The **construct validity** of the COF measure, as assessed by its convergent and divergent validities with the Focus questionnaire, is psychometrically adequate, thus lending some support for the underlying model. Correlations were not particularly high, but this is perhaps not surprising given the differences in the measurement focus of the two instruments: Although both instruments are meant to measure individual behavioural styles, and are conceptually related through the overlap in particular dimensions (such as the Focus section 'Evaluative' and the COF dimension 'Analytical/Systemic'), each measure nonetheless has distinct aspects. A wide-ranging and broad measure of competence and preference such as the Wave Focus Styles stems from different theoretical roots (the Big Five, Great Eight; *cf.* Costa & McCrae, 1990; Bartram, 2005) than a measure that specifically taps into culture such as the COF.

(2) To evaluate the psychometric properties of the COF measure in itself (internal validation)

Internal consistency reliability: Alpha coefficients were not supportive of the measure's internal consistency. However, the instrument overall is very brief and the categories are rather heterogeneous, an example of this is the category 'Time Management Approaches': Indeed, its dimensions all relate to the subject of time, yet they are concerned with distinct aspects of time, namely with the definition of time ('Scarce/Plentiful'), the structuring of time ('Monochronic/Polychronic') and the (short- versus long-term) time orientation ('Past/Present/Future'). Rather than regard the negative or low alpha coefficients as a concern, it is suggested that the categories be understood as 'umbrellas', each encompassing a number of constructs, which help to establish a structure within the COF. Nevertheless, the questionnaire would benefit from adding supplementary items to each scale, based on prior investigations of the measure's structure. More precisely, this would entail an inspection of the constructs within each category of the COF and how they could best be separated out into relevant orientations and abilities, thus resulting in a more internally consistent and ultimately more valid measure.

A general finding was that the abilities seemed to measure the COF's constructs more precisely than the orientations. This is likely to result from the fact that they measure the cultural orientation poles separately, whereas these are measured by one item only for the orientations. This observation also lends support for the notion that a more extensive measure may provide a more rounded assessment.

(3) To determine cross-cultural differences and similarities between Germany and Britain, including a comparison of other subgroups (e.g. gender)

Overall, the differences between the German and the British subsamples are small, particularly in comparison to the observed gender differences. Some previous studies had suggested that Germany and Britain have distinct cultural profiles and therefore belong to different cultural clusters (Ronen & Shenkar, 1985; Schwartz, 1999; House et al., 2004). On the basis of the tentative present results, however, there appeared little support for classifying the two countries into different cultural clusters, especially given that the few differences found between Germans and British were

in contrast to previous findings. An example of this is an earlier finding that Germans are higher on 'Conscientiousness' than English people (McCrae et al., 2005), a result which is in contrast to the present study, which found British to rate themselves more conscientious than German people.

However, in line with previous research, the present outcomes suggest that the differences within one culture are bigger than the differences between cultures, and are mostly attributable to gender (*cf.* Bartram et al., 2006), age, occupation or other inter-individual variables (*cf.* Ronen & Shenkar) – with reference in particular to gender, it was observed that men and women rated themselves differently on a number of scales, both for the COF and for the Focus Styles, with differences being in line with typical gender stereotypes. This may indicate that culture is not influenced by nationality alone, but by a variety of group level influences, as asserted by Rosinski (2003; 2007).

(4) To identify issues that could feed into a best practice guide for using the COF in coaching.

We noted above that the COF would benefit from potential revisions to formulate a longer and more robust questionnaire.

Whilst Rosinski (2003) emphasises that the instrument purpose is to facilitate discussion, rather than a robust psychometric tool, end users have immediate access to graphically presented results, which have the look and feel of an objective assessment. Thus, we would recommend that the results are discussed between coach and coachee as soon as they are available, in order to facilitate use. Individuals' self-ratings on the relevant scales can serve to initiate and inspire conversation about coachees' cognitions and beliefs about culture and hence stimulate individual development. In comparison to other cultural assessments, such as Hofstede's measure (1980; 2001), one of the COF's advantages is that it stays clear of simple categorisations whilst remaining easy to understand. However, we also note that further evaluation is extant in terms of determining face validity (how do coaches and coachees react to the tool and its output?) and an independent investigation of what exactly the tool contributes to a cross-cultural coaching process. Coaches should be mindful when using this English-language instrument with non-native speakers and take particular care to ensure that all items have been understood in a one-to-one feedback interview. Based on the present findings, we would recommend that in order to understand a coachee's cultural orientations fully, it would also be helpful to include a personality questionnaire such as the Focus Styles measure in any assessment process. Culture is a product of our personal preferences and our environment, and skilful discussion of psychometric profiles could be helpful in promoting coachee's self-awareness of the former (McDowall & Kurz, 2007).

In terms of actual differences, the preliminary findings from this present research showed that the British and German cultures do not vary greatly in their personality, competency and cultural orientations. One potential conclusion from this study is then that cultures are not as black-and-white as has been portrayed in previous research (e.g. Ronen & Shenkar, 1985; Hofstede, 1980; 2001), where countries were assigned to clusters according to their personality profiles. Instead, the wider context should be considered. Researchers and practitioners may need to be mindful that, especially in today's cosmopolitan societies, differences between individuals are likely to relate to a complex interplay of inter-individual, occupational and other influences, rather than being attributable to (national) culture alone. In our practice as coaches, we thus need to be aware of and respect the multitude of potential interacting influences that each individual is exposed to and shaped by when we are working cross-culturally, national culture being only one of them. The use of specific assessment instruments may facilitate mutual understanding and awareness of any such differences as part of a coaching process.

Limitations of the research

We note the following limitations of the present study:

- We gathered a convenience sample and hence cannot exclude the possibility of sampling error (e.g. Dillman, 2000). Nevertheless, a wide student and professional population in two countries was addressed to make the sample as representative as possible. Although demographic statistics of the two subgroups indicated that they were similar (and therefore the decision was made to treat them as one group for the ensuing analysis), we acknowledge the possibility that using students for this research might have impacted on the questionnaires' results, in particular the Wave Focus which was designed for a professional population. It would be important therefore to replicate our initial findings with a more homogenous sample that more closely reflects a potential coachee population (given that the COF is designed for use in coaching).
- Both questionnaires were administered in English across both cultures and thus we cannot discount the possibility that detected differences between the two cultures might be a result of language difficulties, rather than actual cultural differences.
- It was the purpose of our study to cross-validate the COF against a behavioural styles questionnaire such as the Wave Focus Styles, but we acknowledge that further studies are needed to cross-validate this instrument against measures that tap into national culture.
- The scope of our analysis was to some extent limited by the properties of the COF such as the nature and number of items. This precluded us from using more sophisticated multivariate statistical techniques such as factor analysis which are typically employed for full construct validation (*cf.* Kline, 1999).

Despite these reservations, the COF is one of the few instruments designed for coaching and thus has specific user-received validity (MacIver et al., 2008).

Conclusion

The present research concerned the cross-validation of two different tools, one of these (COF) being designed specifically for use in cross-cultural coaching. Whilst we acknowledge that replication and extension of our findings is needed for a full psychometric validation, our preliminary results have implications on three levels. First, they indicate some support for the construct validity of the COF, but scope for optimising internal consistency. Secondly, the results indicate the need for a more fluid and inclusive understanding of culture in coaching, as we show how the COF might be used as part of coaching sessions specifically targeted at enhancing cultural awareness. Thirdly, the results also point to avenues for future research to develop a more process-driven research on cultural differences to help us understand the drivers of cultural orientations and abilities at an individual level. Whilst full validation evidence in cross-cultural contexts is extant on the COF, we would also recommend to triangulate any results with other psychometrics in order to help coaches and coachees understand internal drivers of cultural orientations.

References

Abbott, G. & Rosinski, P. (2007). Global coaching and evidence based coaching: Multiple perspectives operating in a process of pragmatic humanism. *International Journal of Evidence Based Coaching and Mentoring, 5*(1), pp. 58-77.

Bailey, R., Bartram, D. & Kurz, R. (2001, March). *Cracking Competencies: Development of the SHL Competency Framework.* Paper presented at the BPS Centenary Conference, Glasgow.

Bartram, D. (2005). The Great Eight Competencies: A Criterion-Centric Approach to Validation. *Journal of Applied Psychology, 90*(6), pp. 1185–1203.

Bartram, D., Inceoglu, I., Brown, A. & Fleck, S. (2006, May). *Personality at work: Gender and national differences in a sample of 60,000 working adults.* Paper presented at the 21st Annual Conference of the Society for Industrial and Organizational Psychology, Dallas, Texas.

Boyatzis, R.E. (1982). *The Competent Manager: A Model for Effective Performance.* New York: John Wiley.

Cattell, R.B. (1965). *The scientific analysis of personality*. Harmondsworth: Penguin.

Cohen, J. (1988). *Statistical power analysis for the behavioural sciences* (2nd ed.). New York: Academic Press.

Costa, P.T., Jr. & McCrae, R.R. (1990). *The NEO Personality Inventory Manual.* Odessa, FL: Psychological Assessment Resources.

Daouk, L. & McDowall, A. (2006, May). *Do work psychologists have the tools to assess across cultures and national boundaries in a global world?* Paper presented at the WP Congress 2006, Leipzig.

Daouk, L., McDowall, A. & Rust, J. (2006, July). *Does the internet lull us into a false sense of security? The real issues in testing across languages and cultures.* Paper presented at the International Applied Psychology Congress 2006, Athens.

Dillman, D.A. (2000). *Mail and internet surveys: The tailored design method* (2nd ed.). NY: John Wiley & Sons.

Hall, E. T. (1976). *Beyond Culture.* New York: Anchor Books.

Hofstede, G. (1980). *Culture's Consequences: International Differences in Work Related Values.* Thousand Oaks, CA: Sage.

Hofstede, G. (2001). *Culture's Consequences: Comparing Values, Behaviors, Institutions, and Organizations Across Nations* (2nd ed.). Thousand Oaks, CA: Sage.

House, R.J., Hanges, P.J., Javidan, M., Dorfman, P.W. & Gupta, V. (Eds.). (2004). *Culture, Leadership, and Organizations. The GLOBE study of 62 societies.* Thousand Oaks: Sage.

House, R.J., Javidan, M., Hanges, P. & Dorfman, P. (2002). Understanding cultures and implicit leadership theories across the globe: an introduction to project GLOBE. *Journal of World Business, 37*, pp. 3-10.

International Test Commission (ITC, 2001). ITC International Guidelines for Test Use. *International Journal of Testing, 1, 93-114*.

Jayne, S., Small, C. & Oxley, H. (2006). *Wave Focus Organisational Feedback Report. Total Standardisation Pilot Group.* Jersey (UK): Saville Consulting Group.

Jenkins, J. (2006). Dividends & interest: Coaching meets the cross-cultural challenge. *Leadership in Action, 26*(5), pp. 23-24.

Jung, C. G. (1974). *The Undiscovered Self.* London: Routledge and Kegan Paul.

Kline, P. (1999). *The handbook of psychological testing* (2nd ed.). London: Routledge.

Kluckhohn, F.R. & Strodtbeck, F.L. (1961). *Variations in Value Orientations.* Westport, Connecticut: Greenwood Press.

Lynn, R. & Martin, T. (1995). National differences for thirty-seven nations in extraversion, neuroticism, psychoticism and economic, demographic and other correlates. *Personality of Individual Differences, 19*(3), pp.403-406.

MacIver, R., Saville, P., Kurz, R., Anderson, N. & Evers, A. (2008). New Aspects of Validity: User Available and User Received Validity. Paper presented at the 6th Conference of the International Test Committee, Liverpool.

MacIver, R., Saville, P., Kurz, R., Mitchener, A., Mariscal, K., Parry, G., Becker, S., Saville, W., O'Connor, K., Patterson, R. Oxley, H. (2006). Making Waves – Saville Consulting Wave Styles questionnaires. *Selection & Development Review, 22*(2), pp. 17-23.

McCrae, R.R. & Terracciano, A. & 79 Members of the Personality Profiles of Cultures Project (2005). Personality Profiles of Cultures: Aggregate Personality Traits. *Journal of Personality and Social Psychology, 89*(3), pp. 407-425.

McDowall, A & Kurz, R. (2007). Making the most of psychometric profiles – effective integration into the coaching process. *International Coaching Psychology Review, 2*(3), 299-309.

Peterson, D.B. (2007). Executive coaching in a cross-cultural context. *Consulting Psychology Journal: Practice and Research, 59*(4), pp. 261-271.

Ronen, S. & Shenkar, O. (1985). Clustering Countries on Attitudinal Dimensions: A Review and Synthesis. *The Academy of Management Review, 10*(3), pp. 435-454.

Rosinski, P. (2003). *Coaching Across Cultures. New Tools for Leveraging National, Corporate & Professional Differences.* London: N. Brealey.

Rosinski, P. (2007). *The Cultural Orientations Framework (COF™) assessment questionnaire.* Rhode-St-Genèse (Belgium): Rosinski & Company, sprl. Retrieved 21/04/2008, from www.rosinski.com

Saville Consulting (2005). *Saville Consulting Wave. Technical Document.* Jersey (UK): Saville Consulting Group.

Saville Consulting (2006). *Saville Consulting Wave Focus. Focus Styles.* Jersey (UK): Saville Consulting Group.

Saville, P., Holdsworth, R., Nyfield, G., Cramp, L. & Mabey, W. (1984). *The Occupational Personality Questionnaire (OPQ).* London: Saville & Holdsworth (UK) Ltd.

Saville, P., MacIver, R., Kurz, R. & Hopton, T. (2008). *Project Epsom: How Valid Is Your Questionnaire? Phase 1: A New Comparative Study of the Major Personality Questionnaires in Predicting Job Performance.* Jersey (UK): Saville Consulting Group.

Schwartz, S.H. (1999). A Theory of Cultural Values and Some Implications for Work. *Applied Psychology: An International Review, 48*(1), pp.23-47.

SHL (1999). *OPQ32 Manual and User's Guide.* Thames Ditton, UK: SHL Group plc.

Skinner, B. F. (1974). *About Behaviourism*. London: Cape.

Trompenaars, F. & Hampden-Turner, C. (1997). *Riding the Waves of Culture: Understanding Cultural Diversity in Business* (2nd ed.). London: Nicholas Brealey.

Van de Vijver, F. & Poortinga, Y.H. (1997). Towards an Integrated Analysis of Bias in Cross-Cultural Assessment. *European Journal of Psychological Assessment, 13*(1), pp.29-37.

Céline Rojon is a PhD student at the University of Surrey. Her interdisciplinary research is concerned with individual workplace performance, specifically with modelling, operationalising and measuring the criterion-domain.

Almuth McDowall combines a full-time lecturing role at the University of Surrey with consultancy in private practice, expertise work-life balance, development, coaching and feedback and cross-cultural issues in leadership and assessment.

APPENDICES

Appendix A. Wave Focus Model (adapted from Jayne et al., 2006).

4 Wave Focus Cluster: Highest Level	12 Wave Focus Sections: Middle Level	36 Wave Focus Facets: Lowest Level
Thought	Evaluative	Analysing Information Written Communication Number Fluency
	Investigative	Open to Learning Quick Learning Seeking Improvement
	Imaginative	Creative Conceptual Developing Strategy
Influence	Sociable	Lively Establishing Rapport Attention Seeking
	Impactful	Persuasive Giving Presentations Prepared to Disagree
	Assertive	Making Decisions Leadership Oriented Motivating Others
Adaptability	Resilient	Self-confident Poised Handling Upset People
	Flexible	Optimistic Accepting Change Receptive to Feedback
	Supportive	Empathetic Team Oriented Considerate
Delivery	Conscientious	Meeting Deadlines Detailed Rule Bound
	Structured	Self-Organised Planning Quick Working
	Driven	Action Oriented Entrepreneurial Results Driven

Appendix B. The Cultural Orientations Framework (Rosinski, 2003; 2007)

Categories	Dimensions	Descriptions
Sense of Power and Responsibility	Control/Harmony/ Humility	*Control*: People have a determinant power to forge the life they want. *Harmony*: Strive for balance and harmony with nature. *Humility*: Accept inevitable natural limitations.
Time Management Approaches	Scarce/Plentiful	*Scarce*: Time is a scarce resource. Manage it carefully. *Plentiful*: Time is abundant. Relax!
	Monochronic/ Polychronic	*Monochronic*: Concentrate on one activity and/or relationship at a time. *Polychronic*: Concentrate simultaneously on multiple tasks and/or relationships.
	Past/Present/ Future	*Past*: Learn from the past. The present is essentially a continuation or a repetition of past occurrences. *Present*: Focus on the "here and now" and short-term benefits. *Future*: Have a bias toward long-term benefits. Promote a far-reaching vision.
Definitions of Identity and Purpose	Being/Doing	*Being*: Stress living itself and the development of talents and relationships. *Doing*: Focus on accomplishments and visible achievements.
	Individualistic/ Collectivistic	*Individualistic*: Emphasize individual attributes and projects. *Collectivistic*: Emphasize affiliation with a group.
Organizational Arrangements	Hierarchy/ Equality	*Hierarchy*: Society and organizations must be socially stratified to function properly. *Equality*: People are equals who often happen to play different roles.
	Universalist/ Particularist	*Universalist*: All cases should be treated in the same universal manner. Adopt common processes for consistency and economies of scale. *Particularist*: Emphasize particular circumstances. Favour decentralization and tailored solutions.
	Stability/Change	*Stability*: Value a static and orderly environment. Encourage efficiency through systematic and disciplined work. Minimize change and ambiguity, perceived as disruptive. *Change*: Value a dynamic and flexible environment. Promote effectiveness through adaptability and innovation. Avoid routine, perceived as boring.
	Competitive/ Collaborative	*Competitive*: Promote success and progress through competitive stimulation. *Collaborative*: Promote success and progress through mutual support, sharing of best practices and solidarity.
Notions of Territory and Boundaries	Protective/ Sharing	*Protective*: Protect yourself by keeping personal life and feelings private (mental boundaries), and by minimizing intrusions in your physical space (physical boundaries). *Sharing*: Build closer relationships by sharing your psychological and physical domains.
Communication Patterns	High Context/ Low Context	*High Context*: Rely on implicit communication. Appreciate the meaning of gestures, posture, voice and context. *Low Context*: Rely on explicit communication. Favour clear and detailed instructions.
	Direct/Indirect	*Direct*: In a conflict or with a tough message to deliver, get your point across clearly at the risk of offending or hurting. *Indirect*: In a conflict or with a tough message to deliver, favour maintaining a cordial relationship at the risk of misunderstanding.
	Affective/Neutral	*Affective*: Display emotions and warmth when communicating. Establishing and maintaining personal and social connections is key. *Neutral*: Stress conciseness, precision and detachment when communicating.
	Formal/Informal	*Formal*: Observe strict protocols and rituals. *Informal*: Favour familiarity and spontaneity.
Modes of Thinking	Deductive/ Inductive	*Deductive*: Emphasize concepts, theories and general principles. Then, through logical reasoning, derive practical applications and solutions. *Inductive*: Start with experiences, concrete situations and cases. Then, using intuition, formulate general models and theories.
	Analytical/ Systemic	*Analytical*: Separate a whole into its constituent elements. Dissect a problem into smaller chunks. *Systemic*: Assemble the parts into a cohesive whole. Explore connections between elements and focus on the whole system.