

## **THE CHALLENGES OF GLOBALIZATION - THE CHANGING ROLE OF CULTURAL INTELLIGENCE IN THE 21<sup>ST</sup> CENTURY**

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### **Abstract:**

As a result of inexorable globalization and European integration processes people have to face challenges deriving from cultural differences. A strong correlation exists between the capabilities of individuals to face these challenges and their cultural intelligence. The main goals of this paper are to define factors influencing cultural intelligence being one of the key competences of the 21th century. In an open economy like the Hungarian, workers and business partners alike find themselves, ever more often, facing challenges that arose due to cultural differences. Our empirical research is based on relationship between the success attitude and the cultural intelligence of full-time university students. The success attitude of university students ultimately refers to their preferences for a sense of success which is the drive that governs their thoughts and actions. We identified the indicators of success attitude in a previous study. The indicators were classified into five components using factor analysis. A strong, significant connection between the main components of success attitude and the factors of cultural intelligence has been established. We found the strongest connection between the motivation factor of cultural intelligence and the main component that encompasses positive feelings, speaking foreign languages or opportunities abroad. In addition, the main components of success attitude are in a positive relationship not only with the motivational factor, but also with all the factors of cultural intelligence. Thus based on the research analysis, it can be claimed that motivation plays an important role in shaping cultural intelligence.

*Keywords: changing role of cultural intelligence, globalization, success attitude.*

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## 1. INTRODUCTION

In today's extremely volatile and completely unpredictable global economy, it is rather difficult to meet external expectations (Friedman, 2005). As a result of globalization, the ever increasing dominance of multinational organizations and the free global movement of goods, services and labour, there are more and more conflicts caused by misunderstanding or the lack of understanding due to cultural differences (Triandis, 2006).

Undoubtedly, cultural challenges have become a part of our everyday life. The need to research cultural similarities and differences has been continually increasing (Van Dyne, et al., 2010). This need brought into being the novel concept of cultural intelligence in management sciences less than a decade ago (Earley, 2002).

Parallel to that the rapidly increasing global flow of information resulted in some considerable changes in the values respected by individuals and the way these values are interpreted by the society at large. It is especially true in case of the future's intellectuals who are studying at universities today.

After the short introductory thoughts the supporting literature of the research will be summarized, the applied research methodology and research results will be elaborated on.

## 2. LITERATURE REVIEW

### 2.1. Cultural Intelligence

Cultural intelligence (CQ) is the key competence of the twenty-first century. It is a person's capability to adapt effectively to new cultural contexts and it has both process and content features (Earley & Ang 2003). Cultural intelligence is a multi-dimensional construct. Cognitive and metacognitive, motivational and behavioural components shape the whole of CQ (Ang, 2006).

The *Metacognitive* component refers to the control and monitoring of cognition, the process of knowledge acquisition and comprehension. This ability includes not only the planning and monitoring of a cognitive model but also the adaptation and adjustment of the model to the cultural norms of others. In many ways, the metacognitive factor is a critical CQ component since it facilitates active thinking about people and situations in cross-cultural interactions.

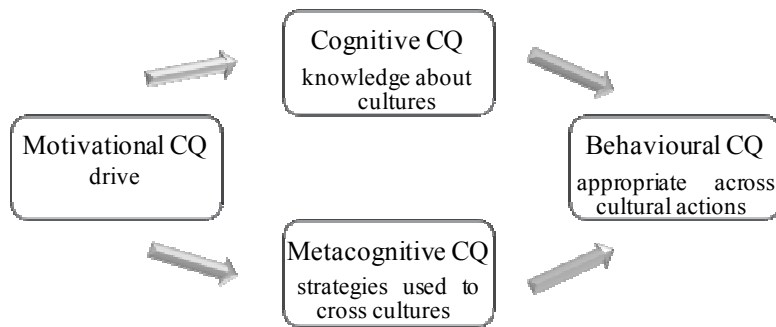
The *Cognitive* component includes the norms, values, religious beliefs, artistic values and language rules of different cultures which can be acquired through learning and experience. It also incorporates the values of various cultures and subcultures and their economic and judicial systems (Earley & Peterson, 2004).

The *Motivational* component determines on the one hand the ability to view cross-cultural interactions in a different way; on the other hand, make every effort to gain new experiences from people from other cultures. This is of central importance in solving problems. Motivational CQ is the ability to take into consideration the culturally different situations and learn from them and is likewise the source of action.

The *Behavioural* component reflects actions; in other words, behavioural intelligence focuses on what individuals do rather than what they think or feel. Behavioural CQ is demonstrated

through the use of the appropriate verbal and non-verbal elements when interacting with people of different cultural backgrounds. It is essential because behavioural intelligence also reveals the primary attributes of sustaining a relationship. A face-to-face meeting is not suitable for identifying the latent thoughts and motivation of each other (Earley & Mosakowski, 2004).

**Figure 1:** The Four Factor Model of Cultural Intelligence



Source: Pauleen et al., 2006. p. 16.

Table 2 represents the four related elements which form a model, indicating a process. The starting point of the model is motivation and the motivational drive to gain knowledge (cognitive) and the urge to organize knowledge (metacognitive). The last stage of the model is behaviour which is considered appropriate across cultures (Pauleen et al., 2006).

Motivation is the key element of the notion of CQ unlike other intelligence types which rather neglect motivation as part of the construction of intelligence (Earley & Ang, 2003). There are some researchers though – and we fully agree with them - who do believe that motivation is a key element of CQ. As a result current research entirely focuses on CQ.

## 2.2. Success Attitude

Numerous research studies have addressed the scholastic achievement of university students (Stewart, 2006; Feith, et al., 2008). Additionally, scholars have examined students' family background characteristics (Ladner, 1998; Teachman, 1998; Clark, 1988; Fehrmann et al., 1987). Factors such as parental education, family financial resources and household resources have been directly and indirectly linked to youth's academic success (Garbarino, 1982; Roscigno & Ainsworth-Darnell, 1999). There is also literature on the scholastic success of students and students' family background in Hungary (Turcsán, 1998).

The social environment where children grew up plays also an important role (Stewart, 2006). Individuals are assumed to act according to what they think is expected from them. Based on a given set of norms and values they make choices according to the 'logic of appropriateness' (Hossler et al., 1999). As such they associate themselves with the norms, purposes, codes of rights and duties, procedures, methods, practices and techniques of their constituent group, where they live (March & Olsen, 1995).

Human factors are the values, work styles, emotions and experiences that power behaviours and relationships with other people (Lancaster & Stillman). Human factors are about individual differences and similarities and the need to consider these factors when working in

an organization or team. Nothing is more important to our success than being able to recognize and understand human similarities and differences (Wong, 2007).

However, the reasons underlying the success of students are not well understood, and far too little is known about the factors that contribute to the success attitude of this generation. The purpose of this study was to measure the success attitude of full time Hungarian university students.

### 3. METHODOLOGY

In the research, qualitative and quantitative method was also applied. Our empirical research can be divided into two parts. The first one was the compilation of the research questionnaire. In order to measure CQ the Hungarian version was completed which was a 20 item four-factor cultural intelligence questionnaire (CQS) originally developed by researchers of Michigan State University. The measurement tool of success attitude was developed based on our preliminary survey.

An international research group has developed the CQS questionnaire and scale to measure cultural intelligence. The results of various intelligence and intercultural competency researches had been taken into consideration along with validity and reliability (Ang, 2007). In the questionnaire the fifty-three original elements were first evaluated by academics and practical experts. As a result of their evaluation process, the number of elements was reduced to forty. Finally, factor analysis reduced the total number of elements to twenty. The present research applied this questionnaire.

In our questionnaire, there are four elements related to the metacognitive, six to the cognitive and five-five to the motivational and behavioural dimensions of cultural intelligence. The questionnaire contains short statements concerning the participants in order to determine their CQ factors (For example: "I use pause and silence differently to suit different cross-cultural situations - behavioural"). Every statement is evaluated on a scale from one to seven where 1 is irrelevant to the respondent and 7 is the most relevant.

For the measurement of success attitude first, we intended to get information about the students' opinion of their own success categories. Close to 700 students were requested to complete the following sentence: "To my opinion a student is considered successful if... ". The answers contained 1073 clauses and 3586 words in the unstructured text. Using text mining methods we determined 18 indicators of success attitude (SA). When forming the statements of the success attitude the original wording used by students had been applied. They evaluated the level of their agreement with the statement on a Likert-scale from 1 to 7. For the validation we accomplished interviews with focus groups.

In the second part of the empirical research, quantitative method was applied by using questionnaire to measure the cultural intelligence (CQ) and success attitude (SA) of students. In order to complete statistical analysis SPSS was used. We used a factor extraction method to form uncorrelated linear combinations of the observed variables of success attitude. Linear regression was used to detect the relationship between the factors of CQ and SA and correlation analysis to define the strength and intensity of the relationship.

### *Characteristics of the Research Sample*

During our research, we asked full-time undergraduate students. The actual data collection took place in the 2009/10 academic year. During this phase we aimed to maximise the number of respondents in order to exceed the required minimum to enable analysis from several angles, and the creation of appropriate subsets as well. During the sessions when the questionnaires were filled in, supervision was provided only to ensure anonymity, not to make sure that the forms are properly filled in. To ensure anonymity, respondents filled in the forms in groups and placed the sheets in an envelope themselves. In the end, for analysis, we could use 95 % (1427) of the total 1500 questionnaires.

## **4. EMPIRICAL FINDINGS AND DISCUSSION**

In assessing the results, we first drew conclusions from the statistical analyses of the questionnaire responses. The research sample profile characteristics are as follows: 65 % of respondents were women, only 1 % was older than 25 years of age. The vast majority (82 %) were participating in state-financed programmes. Most of the respondents will be first generation intellectuals because their parents have only secondary education. People whose parents only had primary education represented only 2 % of the entire sample. Similarly, only 8 % of the respondents deemed their parents poor. A quarter of respondents are from small rural settlements.

Before examining the relationship between the cultural intelligence of students and the success attitude it was necessary to reduce the number of variables of the success attitude because it would have been impossible to overview the relationships of 18 different variables. To reduce the number of variables we applied factor analysis which includes the methods of multi-variable statistical analysis. Factor analysis enables researchers to reveal the deep structure of variables and to reduce their number. We applied the Principle Components method with which the reduction of the number of variables can be achieved through linear transformation. Linear transformation means that the original variables are weighted but the new variables still bear most of the information content yet they are independent. As a result the new variables show well the information contents/meaning of the original variables to make sure that the research results are not distorted

We classified the 18 variables of success attitude into five main components using factor analysis. The names of the main components had to be short but it also had to reflect the contents of the variables. The main components were named as follows: *Meaningful student life*, *Professional and social appreciation*, *Personal relationships*, *Labour market readiness* and *Compliance* (Table 1).

**Table 1:** The structure of success attitude and the components

Variables	Components
like and enjoy what they study speak foreign languages have excellent communication skills generally feel happy and satisfied travel abroad while studying learn how to solve problems alone	<i>Meaningful student life</i>
being effective in academic competitions actively involved in student life being recognized and appraised by peer students and teachers	<i>Professional and social appreciation</i>

Variables	Components
able to form good relationships during study-years (BA/MA programs) have enough free time to do sports or have fun	<i>Personal relationships</i>
acquire a competitive degree upon finishing their studies	<i>Labour market readiness</i>
complete courses on time or earlier visit lectures regularly	<i>Compliance</i>

The main components covered contents that represented values for students. Yet, from among the original variables, some items did not appear in any of the main components: taking exams successfully, getting top bursary, or using the acquired knowledge, for example.

This is most likely related to the fact that in the credit systems, it is not necessarily a sign of failure if students do not earn their credits or pass their exams as recommended. State financing and the relatively low level of bursaries does not motivate students to earn top marks that would qualify them for bursary. The exclusion of using the acquired knowledge probably reflects that students are still at the beginning of their studies thus feel this to be less of a priority.

Only the relevant literature – those using the CQS questionnaire to measure the cultural intelligence of university students – had been used for the comparative analysis of the cultural intelligence and the value of the CQ components of Hungarian students. Our own research results and published data are summed up in Table 2. Published data did not allow econometrical analysis as a result statistical analyses had been completed.

Comparing the cultural intelligence of Hungarian students to values published in the professional literature, it can be stated that Hungarian students score only a few points higher than the international average (Table 2). The higher scores appear in three components: motivational, cognitive and behavioural, while in the case of the metacognitive component, scores are somewhat lower than average. The metacognitive component is responsible for organising knowledge, the ability to reshape thought patterns. Results suggest that Hungarian students are less capable of doing so.

**Table 2:** The values of cultural intelligence and its components (based on the literature and own research)

	Components of cultural intelligence				Cultural intelligence
	motivational (MO)	metacognitive (MC)	cognitive (CO)	behavioural (BE)	CQ
Hungarian students	23,2	17,3	22,4	24,0	86,8
International students*	22,8	18,4	20,4	21,3	83,0

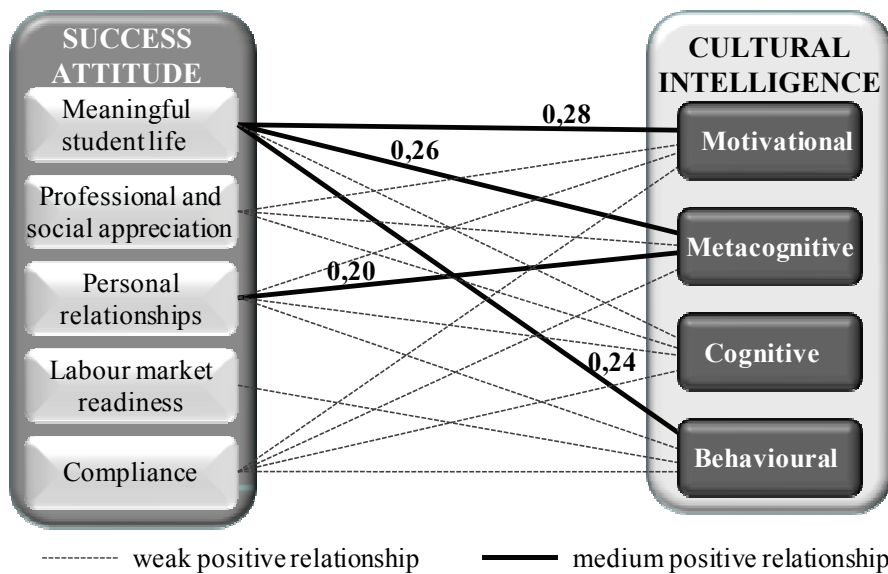
\*the average of more than 2000 students from almost 20 countries

After the general and comparative analysis of the cultural intelligence of full-time students and the factors as the dependent variables of the research model the following part of the paper focuses on the research results of the independent variable called the intellectual values will be presented.

There is a significant positive correlation between the cultural intelligence of students and the components of the success attitude as indicated on Figure 2.



**Figure 2:** The relationship between components of success attitude and cultural intelligence



As it is indicated on Figure 2 the “*Meaningful student life*” component of the success attitude shows a medium intensity relationship with the motivational, metacognitive and behavioural components of cultural intelligence and shows a weak intensity relationship with the cognitive component. The “*Professional and social appreciation*” component – in accordance with the GLM analysis – shows weak intensity correlation with the motivational, metacognitive and cognitive components of cultural intelligence and its relationship with the behavioural component is not significant

There is a strong correlation between the “*Personal relationships*” component and the metacognitive components of cultural intelligence and there is a weak correlation with the other three CQ factors. The “*Labour market readiness*” component has very weak correlation only with the behavioural component of the cultural intelligence. The “*Compliance*” component of the success attitude has weak correlation with all four factors of cultural intelligence.

We have found the strongest connection between the motivation factor of cultural intelligence and the main component that encompasses positive feelings (like, enjoy, satisfied) and speaking foreign languages or opportunities abroad. In addition, the main components of success attitude are in a positive relationship not only with the motivational factor, but with all the factors of cultural intelligence. Thus based on the research analysis, it can be claimed that motivation plays an important role in shaping cultural intelligence.

## 5. CONCLUSIONS

Our conviction that motivated this research was that higher education is more than just a place of professional knowledge transfer, it has an important role in shaping students' values and the base upon which they can become intellectuals. As a result of globalisation, the global movement of labour, one needs to face intercultural challenges ever more often. This is where intellectuals, professionals in managerial roles have an important part to play.

Conflicts and tension arising from cultural differences often negatively impact the performance of individuals and organisations, this is why it is vital to take every means to prevent or solve these conflicts. One of these means, in our belief, is cultural intelligence.

Cultural intelligence is the individual's ability not only to bridge the gap between people from different cultures, cultural backgrounds, but also to turn cultural pluralism into an asset. Cultural intelligence links the cognitive, emotional and practical dimensions of intercultural situations. Knowing someone's cultural intelligence plays an important part in the proper management of human resources. On the one hand, it can be a selection criterion for positions where cultural differences are at the forefront. On the other hand, it can help identify areas that require development, and also aid in selecting the training potential.

The research has proved that cultural intelligence is in relationship with the individual's motivation. We considered this to be extremely important because this is the crucial difference between cultural intelligence and other intelligences. Higher education, thus, has an even more emphatic role in creating new opportunities and utilising existing ones to improve students' cultural intelligence.

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