



University of Pécs, Faculty of Health Sciences
Doctoral School of Health Sciences

Head of the Doctoral School:
Prof. Dr. József Bódis
Rector and Doctor of the Hungarian Academy of Sciences

**THE INTERCULTURAL IMPACT OF THE ERASMUS
PROGRAMME ON HUNGARIAN STUDENTS, WITH SPECIAL
REGARD TO STUDENTS OF MEDICINE AND HEALTH CARE**

Theses of the PhD Dissertation
by
Timea Németh

Frontiers of Health Sciences Programme

Head of the Doctoral Programme:

Prof. Dr. Gábor Kovács L.
Regular Member of the Hungarian Academy of Sciences

Supervisors:

Dr. Gábor Rébék-Nagy, PhD, habil.

Faculty of Medicine, University of Pécs

Dr. András Trócsányi, PhD, habil.

Faculty of Sciences, University of Pécs

Pécs

2015

1. Introduction

Globalization has not only brought about the rapid spread of new technologies, political and information systems, but also significant migration of work force, which have resulted in regular contacts of people with multicultural backgrounds. Due to globalization and geopolitical factors, Europe has changed radically since the end of the Second World War, not only in its geographical, political, economic and demographic structures, but in the mentality and quality of life of its people as well. Many Europeans start their studies in one country, continue in another and work in a third one. European societies are hence stimulating world-wide migration and changes, which have an impact on all social institutions, including education. The diversity of people coming from different countries and working together in multicultural groups may lead to cultural synergy as well as misunderstandings. As a result, cultural diversity is becoming an increasingly fundamental challenge for the health care system.

Hungary joined the European Union in 2004. Since then the number of migrants has been continuously growing in the country parallel with the outward migration tendencies, including a substantial number of health and medical care professionals. Some settle for good, while others relocate for shorter or longer periods of time for the purposes of professional development, to gain more experience and know-how. Moreover, EU membership has brought along the increase of the value of degrees and diplomas, thus calling forth the escalation in the number of international students across the country.

Therefore, it has become an imperative for Hungarian health care and medical education to address the above issues and contribute to the development of skills and competences both for students and staff which are indispensable in the multicultural world.

2. Goals and hypotheses

The review of the considerable amount of literature regarding the Erasmus programme and its impact from various angles revealed no relevant records to date concerning the intercultural impact of the programme on the Hungarian student population, let alone medical and health care students. No data were found regarding the factors that influence their satisfaction with their studies and cultural experience in the host country, either.

The primary aim of this dissertation is to *investigate whether the Erasmus mobility programme contributes to developing the intercultural competences of Hungarian students, especially medical and health care students, and to find out whether or not preliminary information concerning the culture of the host country has a positive impact on the level of satisfaction Hungarian students, especially medical and health care students perceive with regard to their studies and cultural experience in the host country.*

The following seven hypotheses were constructed to facilitate finding answers to the above objectives:

H₁: Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme, *develop their proficiency in English.*

H₂: Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme, *develop their proficiency in the language of the host country.*

H₃: *The proficiency in English develops more than the proficiency in the language of the host country* of those Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme.

H₄: Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme, *develop their knowledge and awareness of their own and other cultures.*

H₅: Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme, *develop their work related skills within multicultural settings.*

H₆: *Preliminary information concerning the culture of the host country has a positive impact on satisfaction with their studies in the host country* of those Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme.

H₇: *Preliminary information concerning the culture of the host country has a positive impact on satisfaction with their cultural experience in the host country* of those Hungarian students, with special regard to medical and health care students, who participate in the Erasmus mobility programme.

3. Materials and methods

This study is a blended-method research incorporating both quantitative and qualitative aspects which are as follows:

1. analysis of secondary source data, review of literature and statistical records
2. conduct of an online survey and analysis of the outcomes
3. comparative analysis
4. structured interviews
5. multivariate analysis: model by multiple linear regression

The majority of secondary source literature and statistical data, close to 90% was in English. To gather primary source data, an online survey was prepared adapting and modifying the questionnaire of the 2008 ESN (Erasmus Student Network) Survey. The survey contained 46 questions. The language of the questionnaire was English to enable comparative studies and to target international students as a future extension of the research. The questionnaire targeted all the 65 higher education institutions participating in the Erasmus programme in Hungary. The Erasmus coordinators of

these institutions were requested to distribute the link to the survey amongst their 2010/2011 outgoing Erasmus students. The online questionnaire was open for two weeks from 15 until 30 November, 2011. It took approximately 20 minutes to fill in the questionnaire. The data were analysed with SPSS (Statistical Package for the Social Sciences) Statistics 20.

Altogether 4,164 Hungarian students were involved in Erasmus outgoing mobility during 2010/2011. Overall 657 valid responses from 37 higher education institutions were received, which is a 15% response rate, assuming that, in theory, all 2010/2011 Erasmus outgoing students received the link sent by their institutional coordinator. For comparative analysis the findings of the present research were compared with those of the ESN Survey of 2008.

For the structured interviews 15 administrative and academic staff were involved who work for various higher education institutions in Hungary. The interviews were conducted in Hungarian between January and August, 2014. The interview contained nine open-ended questions focusing on Erasmus programme-related experiences of the participants. The interview sessions lasted between 22 and 35 minutes.

4. Results

Outcomes of the online survey

The majority of the respondents (70%) were females (mean age: 24.41 years) and they lived in towns or small cities, their family income was average. The highest percentage of the students studied at the University of Pécs (14.5%) followed by Eötvös Loránd University (13%), the University of Debrecen (8.1%) and the University of Szeged (8%). 57.1% of the respondents were studying at bachelor level, 38.7% at master level, 1.8% at doctoral level and the rest, 2.4% at other, mostly undivided levels. 25.1% studied business and economics followed by students studying humanities (12.1%). Health care and medical students were represented by 5.7%. Most of the students studied in Germany (16%), followed by Finland (8.5%), Italy (8.1%) and Spain (7.6%). They spent 5.5 months abroad on average.

294 students (54.2%) used English for communication, 104 (19.2%) used the host country's language, whilst 144 (26.6%) communicated in different languages

depending on the situation. The following figure represents the progress students made both in English and the host language.

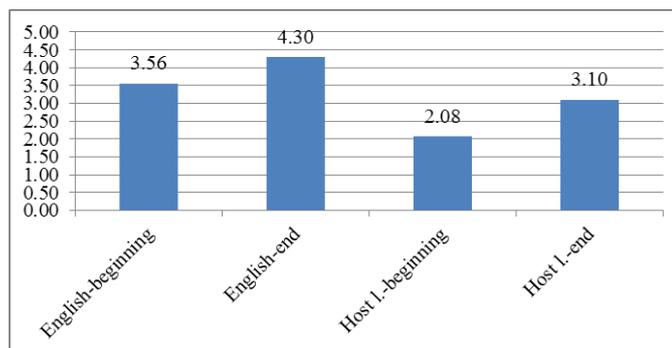


Figure 1 Language progress in English and the language of the host country (N=536)

Students were asked about preliminary information and knowledge of the host country and the majority of the students agreed or strongly agreed that they had enough information about the host country's culture, food, stereotypes and how the host culture differed from their own.

436 respondents (84.8%) agreed or strongly agreed that the stay abroad helped them improving their skills related to working in a team with people of different cultural backgrounds, 467 (91.1%) agreed or strongly agreed that their communication skills with people from different cultural backgrounds improved whereas 408 (80.6%) agreed or strongly agreed that their negotiating skills with people from different cultural backgrounds also developed. 367 (71.9%) agreed or strongly agreed that their conflict management skills with people from different cultural backgrounds improved.

Outcomes of the comparative analysis

The results of the ESN Survey of 2008 was compared with the outcomes of the present research. Regarding sex, age and place of residence the Hungarian Erasmus students data are consistent with those of the European Erasmus student population. However, there are some significant differences between the datasets in the percentage of students having below average ($p < 0.001$) and above average ($p < 0.001$) income. The figure below demonstrates the field of studies compared.

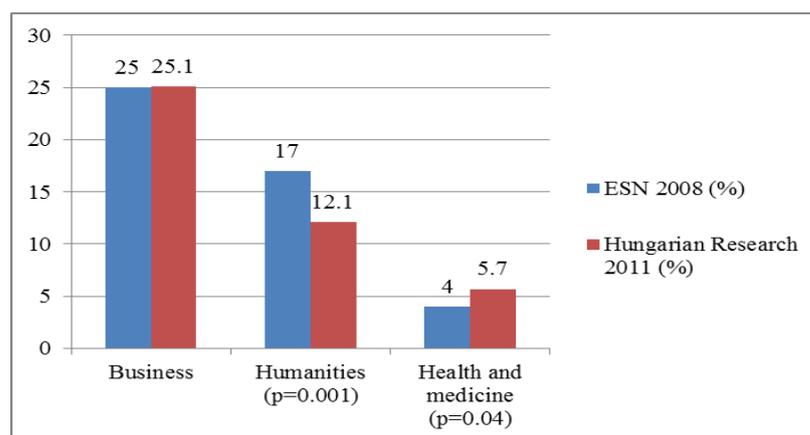


Figure 2 Area of studies compared

In the ESN Survey most of the exchange students (55%) stayed abroad for 4 to 6 months and the countries they studied in were Germany (14%), Spain (10.5%) and the UK (9%). In the survey underlying the present study they spent 5.5 months in the host country on average. Most of the students studied in Germany (16%), followed by Finland (8.5%), Italy (8.1%) and Spain (7.6%).

Language use and the progress made both in English and the language of the host country represent the same tendency: the progress both European and Hungarian Erasmus students made is faster in the language of the host country than in English.

Both European and Hungarian Erasmus students demonstrate the same knowledge improvement, nevertheless there is a significant difference ($p < 0.001$) between the two samples regarding new university teaching methods, as Hungarian students considered that they had learnt less from this method.

Outcomes of the structured interviews

The structured interviews were targeted at groups of stakeholders of universities in Hungary both at administrative and academic levels who work in an international, multicultural setting. In conclusion it can be claimed that the majority of stakeholders considered the Erasmus programme as a positive attribute to developing students' intercultural competence, however there are some specific downsides of the programme (financial problems and difficulties regarding the recognition of studies) that deter students from participating. As there are still a high number of non-mobile

students within the country, specific training programmes, case studies, international involvement, projects and the importance of learning foreign languages have been mentioned as alternative methods to this cohort.

5. Discussion

The present research set the aim to investigate whether the Erasmus mobility programme contributes to developing the intercultural competences of Hungarian students, with special regard to medical and health care students. Another goal was to find out whether preliminary information on the culture of the host country has a positive impact on the level of satisfaction Hungarian students, especially medical and health care students participating in Erasmus mobility programmes perceive with regard to their cultural experience in the host country.

The *first two hypotheses* of the study were related to *progress in second and third language knowledge*, i.e. English and the language of the host country. The findings of both quantitative and qualitative analyses (online survey, comparative analysis and structured interviews) suggest that the foreign language knowledge improves significantly both in English and the language of the host country of those Hungarian students, especially medical and health care students, who participate in Erasmus mobility programmes. One novel and unanticipated finding to emerge from this study was concerning *hypothesis 3*, i.e. *the proficiency in English improves more than the proficiency in the language of the host country of those Hungarian students, especially medical and health care students, who participate in Erasmus mobility programmes*. The findings in the present study do not justify this hypothesis, as their proficiency development in the language of the host country is significantly greater than in English.

To the best of the author's knowledge no research had been conducted earlier to investigate this phenomenon and therefore these results may serve as novel data for those intending to carry out further studies in this field.

Hypothesis 4, claiming that the *knowledge and awareness of their own and other cultures develop* after participating in the programme, was found to be justified both by quantitative and qualitative methods.

Another important finding of the present study was that participation in *the Erasmus programme increases the work related skills within multicultural settings (hypothesis 5) of those Hungarian students, especially medical and health care students, who participate in Erasmus mobility programmes*. The majority of students claimed that their communication, conflict management and negotiating skills with people from different cultural backgrounds improved along with problem solving and time and project management skills.

A major and novel finding to emerge from this study was related to the last two hypotheses of the research, hypothesising that *preliminary information concerning the culture of the host country has a positive impact on students' satisfaction with their studies and cultural experience in the host country*. The relevance of preliminary cultural information regarding the host country is clearly supported by the findings of the present research.

Taken together, these findings suggest a role for *preliminary information concerning the culture of the host country* in promoting *satisfaction with their studies and cultural experience in the host country*. Higher satisfaction levels result in the acquisition of enhanced intercultural competence, which is a necessary tool for providing better work, services and care in a multicultural environment.

6. Innovation of the study

To the best of the author's knowledge no research has been carried out to date on the intercultural impact of any mobility programmes, let alone the Erasmus programme on Hungarian students, including medical and health care students, nor on identifying the factors that influence their satisfaction with their studies and cultural experience during the programme. Therefore, the study presents new findings in this field. This research has gone some way towards enhancing our understanding of the importance

of intercultural competence and an innovation of the present study is that the outcomes add substantially to highlighting the relevance of intercultural competence within the scope of the Hungarian medical and health care education.

7. Conclusions

One of the major challenges for the medical and health care systems around the globe is that culturally diverse groups comprise a significant segment of the patient population. Since the last decade Hungary has become increasingly multicultural. One of the consequences of these changes in the population is the challenge medical and health care providers face when integrating immigrant groups into well-established medical and health care services. Health care options and outcomes must be clear and understandable to all patients regardless of their own culture and experience, thereby cultural and language obstacles are the primary challenges for meeting the health care needs of this diverse immigrant population. Thus, medical and health care professionals are faced with the need to develop intercultural competences that facilitate the understanding of their own and the patients' cultural norms and accordingly adjust their behaviours to get the best out of medical and health care in the interest of the patients.

Returning to the hypotheses posed at the beginning of this study, it is now possible to state that the Erasmus programme contributes to developing the intercultural competences of Hungarian students regarding the development in their language and cultural knowledge, awareness and work-related skills. These outcomes also corroborate the findings of previous work in this field and contribute additional evidence that suggests the vital importance of intercultural competence. An interesting result this study revealed is that students' satisfaction with their studies and cultural experience is greatly influenced by the preliminary cultural information they are provided by before the start of their programme.

However, as not all students are mobile, alternative methods should be implemented in the education system, including medical and health care education to increase the

intercultural competence of non-mobile students locally, as the lack of a common language between patient and health care provider can result in misdiagnoses and may lead to improper treatment.

Therefore, the implementation of an international dimension in the medical and health care curriculum is recommended. The importance of foreign language classes for medical and health care purposes has to be highlighted and maintained in Hungarian higher education.

Furthermore, classes developing students' intercultural competence need to be developed along with training programs to increase cultural awareness, knowledge and skills. Involvement in international projects and studies, involving international guest lecturers are essential means of an internationalised curriculum. Hungarian medical and health care education involves hundreds of international students nowadays, therefore the introduction of tandem classes, where Hungarian students can study together with their international peers could well serve the purposes of enhancing intercultural competence and would be beneficial for both target groups.

PUBLICATIONS OF THE AUTHOR IN THE FIELD OF THE DISSERTATION

- Németh, T., & Rébék-Nagy, G. (2015). The importance of intercultural competence within health care. *Porta Lingua*, IN PRINT
- Németh, T., & Kajos, A. (2014). How to develop the intercultural competence of Hungarian students. *Porta Lingua*, 155-164.
- Németh, T. (2010). *A new era is a must*. Retrieved March 12, 2010, from Erasmus Student Network: <http://www.esn.org/publications>
- Németh, T., Barakonyi, E., & Pozsgai, G. (2010). The role of education and training in the Hungarian labour market. (pp. 1098-1106). Komárno: Harsányi János Szakkollégium .
- Németh, T., Kivés, Z., Diffelné, N. M., Máté, O., Komlódiné Pozsgai, G., & Sütő, B. (2010). Internationalising the curriculum: a utopia or a must have in higher health care education in Hungary? In Á. Bálint, & B. Di Blasio (Eds.), *Az utópia ezer arca: Tanulmányok* (pp. 255-262). Pécs.
- Németh, T., Máté, O., Diffelné Németh, M., Kivés, Z., Pozsgai, G., & Sütő, B. (2009). Hungarian health care through the eyes of international students. In J. T. Čurčić D, *Internationalisation and the Role of University Networks: Proceedings of the 2009 EMUNI Conference on Higher Education and Research*. (pp. 58-67).
- Németh, T., Trócsányi, A., & Sütő, B. (2009). The need for a study to measure the intercultural impact of mobility programmes among health care students in Hungary. In W. Coudenys (Ed.). (pp. 175-182). Liverpool: Whose culture(s)? Proceedings of the Second Annual Conference of the University Network of European Capitals of Culture Liverpool 16/17 October 2008.
- Betlehem, J., Németh, T., & Goján, R. (2003). Nemzetköziesedés az ápolóképzésben. *Magyar Felsőoktatás*, 9-10, 18-21.

ACKNOWLEDGEMENTS

First of all, I am greatly indebted to my supervisors, Dr. Gábor Rébék-Nagy and Dr. András Trócsányi for their inestimable help and advice during all phases of my doctoral research and guiding me in finding my research scope.

I would like to thank the Doctoral School of the Faculty of Health Sciences for providing the opportunity for performing interdisciplinary health science studies.

I wish to thank Kinga Szabó, Attila Kajos and Péter Mátrai for their expert help in the statistical analyses and to Mauro Henrique, whose help and effort in developing the online version of the questionnaire is greatly appreciated.

I would like to express my gratitude for all the critical remarks and recommendations provided by Dr. Kinga Lampek and Dr. Csilla Keresztes, preliminary opponents of this dissertation.

I am grateful to all my colleagues and friends at the Department of Languages for Medical Purposes, who helped, inspired and encouraged me through all the difficult fields of a quest that a PhD student might face.

Last, but not least, I wish to thank my husband, Balázs and three children, Annamária, Benedek and Zsigmond for their patience, tolerance and understanding, when I could not devote as much time to them as I had really wanted.