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**Faculty of Tropical
AgriSciences**

**Competences and Employability of Erasmus
Mundus Graduates in Agriculture on the Job
Market in China and Mongolia**

Masters' thesis

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Declaration

I, Radek Vašíček hereby confirm that this diploma thesis entitled “**Competences and Employability of Erasmus Mundus Graduates in Agriculture on the Job Market in China and Mongolia**”, was done by myself and used only materials cited in the text and reported in bibliography.

In Brno 2016

.....

Radek Vašíček

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Abstract

Erasmus is European Action Scheme for the Mobility of University Students. This is European Union project to support international mobility of university students and teachers across the world with European universities. Erasmus programme was founded in 1987. More than 3,000 students attended international study visit from 11 countries in the first year of Erasmus Mundus. This programme focuses on student mobility and it significantly contributes to the future mobility of highly skilled workers. This thesis deals with the evaluating of the Erasmus Mundus study programmes completed by alumni from China and Mongolia. The success and comparative advantage of the graduates are evaluated. The objective of this study is to identify how Erasmus Mundus graduates in agri-related Life-Sciences perform on professional job market and evaluate specific skills and success of alumni who completed Erasmus Mundus programme in Europe. Comparison of competences and skills of alumni in agriculture-related Life-sciences gained and their comparative advantage and expectations of their employers in Asian job market after return from education/training period to home country is provided. Another important goal is to compare the results gained from China and Monogolia regarding specific competences and skills of gradutes. The data was gathered through a semi-structured on-line questionnaire distributed among the alumni from China and Mongolia graduates between 2004 and 2013 across various Erasmus Mundus programmes thanks to which students could study in the fields of agriculture and related Life-sciences. The questionnaires were created and analysed through the Limesurvey programme and 62 respondents presented research valid sample. The main finding is that EM programme was a great opportunity for all alumni. Shortened period for finding a job, more professional networks and career advancement belong to the common advantage highlighted by both Chinesee and Mongolian alumni. 76% of all currently working Chinesee strongly agreed that EM helped them to find job and begin the career. The graduates obtained education of high quality. Generally daily working skills were developed in both countries like: responsibility, Interaction with other people, communication skills, capacity to work in a team and of course language skills. A majority of the Mongolian graduates believe that European Degree gave them a better start and more opportunities than to local students. The graduates obtained very good quality education and which opened their minds. Allmost all graduates return to their countries after study and mainly find a job rapidly.

Key words

Student Mobility, Skills, Ability, Life-Sciences, Career, Labour Market, Higher Education, Employability, Scholarship, Study Programmes, Knowledge, Effectiveness

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List of abbreviations

EM	Erasmus Mundus
EU	European Union
EURASIA	European Academic Mobility Network with Asia
GDP	Gross domestic product
Q. and Q.	Quantity and Quality
HEI	Higher education institution
ILO	International Labour Organization
LLP	Lifelong Learning Programme
LOTUS	Linking Organizations Through University Synergies
MDGs	Millennium Development Goals
MSEC	Ministry of Science, Education and Culture
NAEP	Národní Agentura pro Evropské Vzdělávací Programy
NBRSC	National Bureau of Statistics of China
NGO	Non-governmental organization
UNICEF	United Nations Children's Fund
USA	United States of America
USD	United States Dollar

Introduction

Migration as a global phenomenon. This term refers to the movement of people who choose more favourable living conditions for different reasons. Among the reasons that lead to migration of humanity, are mainly political reasons, improved economic conditions in the chosen country and changes in natural conditions that affect human lives and the standard of natural disasters. Conditionality of population movement sees economic development as linked to democratic development. Another inhibitor of migration is, of course, studying abroad. Student travel market is growing (Brazova, 2011). People travelled more in past decade and this trend is continuously. Labour mobility thus accompanied humans since time immemorial. Young travellers have a lot of information about their target destinations and they also have wider range of options concerning the possibility of staying in the selected location. The young generation has the opportunity to travel and to prove their abilities. Currently, people are more open to travel for work, or even to the overall move their household to a place where they could find an employment in their field. This phenomenon can also be caused by the economic crisis, the number of jobs in the region is very limited, or it does not match the expertise of the individual. The development of modern technology, which allows to obtain information from anywhere and everywhere, is the source for another individual and streamlines decision making and desire for mobility (Daly, 2013).

Young people have many opportunities from the European Union (EU), which offers many options. The EU wants to support (and have already supported) students and young people in their requirements for discovering new cultures and new opportunities in order to remove the barriers between the borders of European countries and partner states. Erasmus programme was founded in 1987. European Union project to support international mobility of university students and teachers across the world with European universities will celebrate 30th anniversary (NAEP, 2015). The programme is called Erasmus to pay tribute to Erasmus of Rotterdam who was Dutch Renaissance humanist. Moreover, Erasmus is also acronym for the European Action Scheme for the Mobility of University Students.

More than 3,000 students attended international study visit from 11 countries in the first year. This programme focuses on student mobility and it significantly contributes to the future mobility of highly skilled workers. Since the Erasmus began many things very modified and improved. In 1995 Erasmus

became a part of the EU framework called Socrates. In the programming period 2007 to 2013, it was included as a part of the Lifelong Learning Programme (LLP) (NAEP, 2013).

Erasmus Mundus (EM) is a programme especially designed for mobility of European students outside of EU and students from other countries to EU universities. EM is advantageous to gain more international skills, which can be useful for graduates useful to become more competitive in local job market. EM consists of 3 main actions/parts (Action 1, 2, 3). Action 1 aims to support and develop high-quality joint Masters' and Doctoral studies in Europe and possibly at other non-European universities. Furthermore, financial support for students in Action 1 is provided in the form of scholarships. This action also offers financial support for research in the study of mobility and seeks to double or even to multiply the number of students who get their degree. Action 2 of Erasmus Mundus programme promotes mobility and collaboration between partners from European universities and schools from selected third countries. As part of this programme scholarships for students but also for researchers and staff from partner schools are provided in different lengths. To promote international prestige, access, image and visibility of European higher education is part called Action 3. This part includes many processes like recognition of credits, curricula, certificates, mobility and quality of demonstrations. The main evaluation of the projects on-going in different ways around the world includes: conferences, seminars, studies, analysis, pilot projects, awarding of the prizes and international networks. This study tries to provide actual information about Chinese and Mongolian graduates who studied in the EU universities and their later success at the local labour market.

Overview of China and Mongolia labour market and higher education

China

Economic growth in China in recent years is steadily growing. China's GDP is more than triple that in 2000. This growth (trend) brought 500 million people out of poverty (World Bank 2014). China's exchange rate is determined by fiat rather than market forces, measures GDP using the official exchange rate is not an accurate measure of the performance of China; GDP at the official exchange rate significantly undervalued the actual level of output of China vis-a-vis the rest of the world. GDP in purchasing power parity provides better performance comparison between countries (Index Mundi, 2015). China's economy is dependent on the size of the labour force and its productivity; this combination determines how much China can deliver without overloading himself. The urban workforce in the country that produces most of its production is growing more slowly. The current situation is that the age group from which the working spring force decreases. The population of working age declined by 2.44 million in 2013, having already fallen by several million a year ago. This demographic milestone has contributed to a significant slowdown in potential growth rate of Chinese growth (Economist, 2014). Unemployment rate over the last 10 years has remained unchanged for about 4% of the working population. From 2002 to 2014, the unemployment rate in China averaged 4.14 %, achieving a historic high of 4.3 % in the fourth quarter of 2003 and a record low of 3.9 % in the third quarter of 2002. In China, the unemployment rate measures the number of people who are actively looking for work as a percentage of the Labour force (Trading Economics, 2014). China successfully achieves some specific Millennium Development Goals (MDGs). Three factors were related to rapid economic expansion coupled with successive reforms; inclusiveness and development oriented government; and especially domestic social and demographic requirements; all signs of high performance (UNDP, 2015). China's economy has gradually shifted from a centrally planned to a market economy since 1978. China currently encouraged farmers to modernize and urbanize. The Chinese priority is export-led growth to reduce the risk of bankruptcy of many state enterprises. A series of pilot programmes to determine the correct policy, which allowed the government to experiment has adopted, rather than policy implementation on a larger scale (UNDP, 2015). The Chinese government is trying to transform

China from being the most famous low-cost manufacturing country in the world, in a country respected for its innovative capabilities (WEF, 2008).

Table 1: Overview of Chinese economy in years 2000 - 2014

	2000	2003	2009	2012	2013	2014
GDP per capita (constant 2005 US\$)	1,122	1,430	2,611	3,345	3,583	3,862
Agriculture value added (% of GDP)	15	13	10	10	10	9.2
Gross agricultural production value (constant 2004-2006 million US\$)	391,154	421,443	533,584	594,147	-	-
Population (1000)	1,262,645	1,288,400	1,331,260	1,350,695	1,357,380	1,364,270
Agricultural labour (1000)	509,262	509,818	508,708	504,523	502,213	499,340

Source: FAOSTAT, 2016; World Bank, 2016

Chinese economy is well known for strong growth in the manufacturing and services. Agriculture is still an important economic sector, accounting for a significant portion of both employment and overall economic output. Agriculture sector forms 10% of gross domestic product (GDP) (Worldbank, 2014) and more than 50% of total national employment (FAOSTAT, 2014a). This situation is constant in the last 4 years (Worldbank, 2014). China is great producer with amount of production 70% more than the entire agricultural output of the European Union, 150% more than India produce (Gianni et al., 2011). Rice is the most important food crop in China. "It is observed that more than 75% of the total cultivated land is used for producing food crops." Second most common crop cultivated in importance is wheat followed by potatoes, fish, flex, jute, meat and others. (ECONOMYWATCH, 2010). Strategy of China is to invest in

technologies and technics to improve level of productivity of foreigner countries (Gianni et al., 2011). Moreover, the National Bureau of Statistics of China (NBRSC) reports that total agricultural production in 2012 was valued at US\$1182.2billion, representing an increase of 41.4% in comparison to 2010 (FAOSTAT, 2014b).

Labour market assessment

The number of people working in agriculture sector is decreasing. Agriculture labour in 2014 counted 499,340 thousands of employees (Worldbank, 2016). In China 35% of the population was working in agriculture and rural development in 2011. Years before it, was 37%, respectively 38% (Worldbank, 2014). The amount of agricultural employment was higher also in years 2004-2008, when 47-50% of the population worked in the sector (Zhai, 2010). However, the Chinese economy is not growing as fast as it did in previous years and this in turn poses challenges for new graduates to enter the job market. A breakdown of unemployment in China by education attainment shows that unemployment rates are highest among people who have a tertiary education (16.4), nearly double the rates among people with secondary education, and 4 times higher than among individuals having only a primary education (Gan et al., 2013).

To employment and social protection in China has been given high priority. The improvement of vocational training and employment government services helped to college graduates, rural migrant workers, ex-soldiers and urban residents, because they have difficulty finding jobs. Minimum wages raised and harmonious labour relations were promoted after the Labour Contract Law and the Employment Promotion Law have been implemented. Those are breakthroughs in the Chinese development of the social security.

The system was created for all residents (urban and rural). Basic pension insurance for urban workers at the provincial level was put under unified central planning. A method was devised to transfer pension insurance coverage for workers moving from one province to another. Enterprise retirees' basic pension increased over the last seven years by an average 10% per year. In addition, the trials of a new type of standards cost 120 billion USD, an increase of over 89 billion USD in five years in China. Chinese people are actually better educated, more wealthy and healthier than ever before (ILO, 2015).

Many Chinese postgraduate students end up at universities and research institutions owned mostly by the public sector. Second, although it is assumed that top Chinese graduates generally prefer to work for private and multinational companies, this is no longer truth because of the oversupply of graduates in recent years with which the private sector cannot keep pace. The employment in the government and public sector is very secure and benefits is becoming increasingly attractive to higher education graduates (Zhai, 2010) and (Kuruvilla et al., 2011).

Challenges that the agricultural systems across the world are facing can be caused by the fact that the agricultural growth in China is no longer yielding enough jobs in general. Competitiveness on the international markets for agricultural and food commodities which are shifting the agricultural labour markets to quality-based market and are posing challenges to the higher agricultural institutions to produce a workforce that has capacity to engage in global agricultural value chains and to deal with the quality requirements and intellectual property rights of international high value markets in order to meet the changing demands of the agricultural labour market.

Higher education

The Chinese education system is the largest on the world. The tradition of education is more than three thousand years old and to be a teacher is a highly respected job. In China, primary school education is compulsory and it lasts 6 years. Secondary education is divided into two levels: Junior and Senior level. These both level during 3 years. Higher education level is divided into Bachelors, Masters and Doctoral degree only with one main difference, that Bachelor's degree is 4 years long (one year longer than in Europe (Classbase, 2013). Chinese children all get a primary and middle school public education.

There were 9.39 million students taking the China's National Higher Education Entrance Examination in June 2014. There was 40,527 agricultural higher education students enrolled in 2013 what is 1.527% of the all students enrolment in Chinese higher education. Gender equality is almost balanced because there were more than 50% of females students of all higher education students except Doctor's degree, where females present only in 36.9% of all the students (NBSC, 2015). Chinese government invest to the education system 4% of the GDP. Since the 1986 there is a mandatory 9-year education for all Chinese

children (CEC, 2015). Chinese citizens aged from 6 to 15 get education free of charge. Books and uniforms are only small things need to be paid (Mack, 2015). The official teaching language is Mandarin Chinese, but primary schools get students from ethnic minority. After middle school, parents pay for the public high schools, but in rural parts of the country majority of students stop their education at the age of 15 after the nine-year mandatory education. Wealthy Chinese children attend private high schools and international schools as well (Mack, 2014). In 2012, there were 7 million college graduates coming to the job market. Only 35% of them and only 26% of postgraduates had found the job by the April in 2013 (Yongqiang, 2013).

In 2013 there were 879 higher education institutions (HEIs) in China. Universities are divided across 30 provinces. Institutions are divided in two kinds: academic and training. Academic institutions meaning the universities (public or private) or research institutions ending with diploma, while training institutions are finished with certification and provide training courses of specific skills (languages, business, IT, finance etc.) (AT-China, 2014).

They are plenty of agricultural universities providing agricultural education in China. The principal ones are: South China Agriculture University, Huazhong Agriculture University, China Agriculture University, Nanjing Agricultural University, Northeast Agricultural University, Sichuan Agricultural University, and Beijing University of Agriculture.

Mongolia

Mongolia is a developing country with fast growing GDP. GDP per capita changed since 2000 almost ten times according to the World Bank (2014). Since transitioning from socialism to a multi-party democracy, the economic situation of Mongolia has improved. According to the World Bank (2012) the economic growth rate was estimated to be 12.5% in 2013, compared to 6.4 % in 2010. Poverty has been declining over last years and in 2010-2011 it decreased from 39.2% to 29.8%. Millennium Development Goals has also been achieved, however, there are still significant disparities among regions, and most of them are between urban and rural areas. The economy of the rural areas is based on agriculture, which contributes

20% to the GDP of the country. Majority of agricultural activities are constituted by livestock production. Goats, sheep, cattle, yaks, horses and camels are very common (Mahul et al., 2009). Today, Mongolia is facing a major transformation brought about by increasing exploitation of its vast mineral resources. Mining contributes to GDP by a factor of 20%, which is twice as much as ten years ago (World Bank, 2012). According to the World Bank, Mongolia has not accumulated savings from its resource revenues during the recent high-growth period.

Table 2: Overview of Mongolian economy in years 2000 - 2014

	2000	2003	2009	2010	2012	2013	2014
GDP per capita (constant 2005 US\$)	768.9	861.4	1,216.4	1,273.2	1,620.2	1,776.7	1,882.4
Agriculture value added (% of GDP)	30,9	20,8	19,6	16,2	16,3	16,5	20,4
Gross agricultural production value (constant 2004-2006 million US\$)	363,5	257,5	394,3	339,3	423,1	432,4	-
Population (1000)	2407,5	2504,0	2735,8	2761,0	2867,7	2930,3	2995,9
Agricultural labour (1000)	393,5	387,5	348,8	346,6	370,0	329,1	-

Source: World Bank, 2015; FAOSTAT, 2015; Mongolian Statistical Information Service, 2015

The Government of Mongolia has prioritized the development of the livestock sector as a main sub-sector of agricultural development. This includes encouraging greater flexibility in the tenure of pastureland and increased investment in rural infrastructure and services. Government policy recognizes the need to improve the availability of finance in the rural areas to improve access by the poorer sections of the community to finance, production inputs and access to markets. A major thrust of government is to respond to the risks inherent in livestock husbandry through the establishment of clear and appropriate

public-private initiatives. In addition, the government is providing significant financial support for investment in the rehabilitation of disused pastureland wells and for the construction of new wells. This is in addition to major recurrent expenditure on vaccines and medicines for the control of animal diseases, seen as an essential government function (Rural Sector Strategy and Business Plan, 2006). In terms of direct government support for investment in agriculture, the main expenditure programmes are related to supplementary funding of irrigation; these are implemented by the private sector (roughly 8 million USD). This support relates directly to the widely-held position that the future of agriculture in Mongolia, particularly in terms of providing food for the urban consumers, lie in the development of irrigated farms. The vision is that such farms will incorporate both crop and livestock activities and that livestock production will become increasingly intensive (Mongolian economy, 2013). Today the Mongolian agriculture sector has four sub-sectors: (i) Extensive livestock; which is the traditional semi-nomadic pastoral system, where camels, horses, cattle, sheep and goats are grazed together; (ii) Intensive livestock, with housed dairy cattle, pigs and poultry; (iii) Mechanized large-area crop production of cereals and fodder crops; (iv) Intensive farming, producing potatoes and other vegetables, with both mechanized and simple production methods. Today, the labour force in the agriculture sector is estimated at 390,000, 15% of which are employed in crop production and 85% in livestock sector (Priess et al., 2011). As for plant production, wheat and potatoes are the main crops produced by Mongolia and those create, together with the meat and dairy products, 100% of the supply of daily consumption. Because of Mongolia's harsh climate, the agriculture sector remains heavily focused on nomadic animal husbandry. The principle issues for Mongolian agriculture are its low productivity and insufficient financial input. (Asian Development Bank, 2013)

Labour market assessment

The most significant employment sector in Mongolia is agriculture, comprising 49%, followed by industry with 12% and education with 5% from whole Mongolian GDP. Other sectors with relatively high employability are transportation, health and construction (International Monetary Fund, 2000). Because of the migration of particularly young people from rural to urban areas, the number of people working in the agricultural sector has decreased. As to gender participation, in 2000 there were 50.6% of the male population and 46.5% of the female population working in the agricultural sector. 12 years later, there was only 33% of males and 32% of females (Trading Economics, 2015).

The unemployment rate in Mongolia decreased to 7.40% in the first quarter of 2015 from 7.70% in the fourth quarter of 2014. Unemployment in Mongolia averaged 6.08% from 1990 until 2015, reaching an all-time high of 10.30% in the first quarter of 2012 and a record low of 2.80% in the fourth quarter of 2007 (Trading Economics, 2015).

Because of the migration of elements of the Mongolian population from rural to urban areas, there is an increasing scarcity of employees willing to work in agriculture. Therefore, there would be an advantage in establishing new jobs in rural areas, which would also help to mitigate urbanization. There are several organizations providing extension services for farmers and cooperatives in Mongolia. The most significant is the National Agricultural Extension Centre that provides practical knowledge to farmers and herders. NGO's and the public are also involved. It was found that farmers and cooperatives are interested in participating in extension services such as education programmes or receiving study materials, however, due to the geographical nature of Mongolia, it is difficult to spread information among farmers (Fellman, 2015). There are significant indicators of a lack of suitably-trained workers to fill available vacancies. Forecasts of future demand for labour suggest that the next 10 years will increasingly favour highly skilled professionals. One reason for the poor supply of sufficient labour to meet the demand is the low quality of graduates and/or graduates with professions, which are in low demand (Mongolian Economy, 2014).

Higher education

Historically, education in Mongolia was under control of Buddhist monasteries, where the education was done. Monks were hired as private teachers. Education system later began to imitate the system in the Soviet Union (Worden, 1991). In 1981, 20% of the state budget was spent on the education system and literacy level of 97.8% was achieved in 2005 (Bat-Ochir, 2006). The current status of Mongolian education is still in progress and it faces several problems. The main problems are poor quality of primary and secondary education and an urgent need of increasing the importance of education for the whole country. Another major issue is the lack of standards of education and weak teaching at schools. Since 2008, the government extended the education system to 12 years (UNICEF, 2007). The Ministry of Science, Education and Culture (MSEC) formulated education policy and standards, which should adhere to internationally recognized standards (Bat-Ochir, 2006).

Education in Mongolia is administrated by the Ministry of Education, Culture, and Science, which sets policy and oversees standards. Primary school usually starts at the age of six with duration of five years. Secondary school is divided into two cycles: lower secondary consists of grades 6 - 9, and upper secondary consists of grades 10 - 11. Primary and lower secondary education is compulsory (EPDC, 2015). The literacy rate is currently 97.4% and with number of students and teaching staff is increasing. The most significant fields of study are technology, science and economics (UNESCO, 2013). Geographic access to education is about 90-96% for lower secondary, and 60-70% for higher secondary education. Also access to education in urban areas is slightly better than in rural areas. For lower secondary the difference is about 2%, however for higher secondary it is almost 10%. As for gender, 65% of females and 45% of males study (Enkhiargal, 2010).

Mongolia is experiencing significant growth in enrolment in higher education. In 2013/14, Mongolian colleges and universities enrolled 174,075 students, of these 18,063 of these were in Masters' programmes, while 3,304 students were doing research at a PhD level. In 2013, there were 178 colleges and universities in Mongolia, however only 48 of them were public. The amount of students at public schools was still three times higher than at private schools. Under Communist rule all higher education was provided free of charge. Since the early 90s, fees have been introduced, though the government offers grants and scholarships (Mijid, 2003). Despite the introduction of fees, Mongolian scholars tend to be dissatisfied with their access to information. In many cases the resources of the university library are underdeveloped and it may not even be possible to subscribe to professional journals because of the cost and language barriers. So there is still ample space for improvement (Borchuluun, 2008).

The Ministry of Education, Culture, and Science, with the cooperation of NGOs have implemented non-formal distance education programmes promoting the development of basic skills. Nowadays, about 100,000 Mongolian adults benefit from some form of distance education. This system of education is suitable for nomads who could have problems attending school due to their migratory lifestyle. These programmes usually use radio communication and are focused mainly on rural areas. Core subjects include nutrition, first aid, wool production and home economics (Rosario, 2005). There continues to be a huge gap between Mongolian educational needs and the policies that the Mongolian government has implemented in response to the expansion of higher education. Education is not sufficient in quality to

achieve levels of international competitiveness and there is a mismatch between the demand and supply of education. There are also differences in the accessibility of education in rural versus urban areas and between the poor and the rich (ICEF, 2014).

Objectives

Main objective

The major objective of this thesis was to identify how Erasmus Mundus graduates in agri-related Life Sciences perform professional job market and evaluate specific skills and success of alumni who complete Erasmus Mundus programme in Europe. Comparison of competences and skills of alumni in agriculture-related life-sciences gained and their comparative advantage and expectations of their employers in Asian job market after return from education/training period to home country. The thesis is focused on two Asian countries: China and Mongolia.

Specific objectives

First specific objective was to evaluate the competences and skills of alumni in agriculture-related life-sciences gained in Europe and their comparative advantage in Asian job market.

Second specific objective was to specify the competences and skills of these graduates expected by the employers in China and Mongolia adopted after EM programme and effectiveness for their job

To compare the results gained from China and Mongolia regarding specific competences and skills of graduates

Hypotheses

Graduates with European diploma are more successful in local job market.

Graduates work in the same sector as they studied.

According to the employers, the most important candidates' background is practical training.

Methodology

Firstly, secondary data were collected from the books, scientific articles available on databases Science Direct supported by data searched on official European and students mobility datasheets, web pages etc.. Primary data collection was designed in order to return findings that fill in the gaps and complete the missing parts of already compiled studies. This study is based on two main parts: (i) an online survey with EM alumni and (ii) testimonies of selected alumni and their employers during focus group discussions and workshops abroad.

The on-line survey was targeted at EM alumni from China and Mongolia graduates between 2004 and 2013 across various Erasmus Mundus programmes that provided study in the fields of agriculture and related life-sciences. These countries were selected due to the fact that there was already a representative number of graduates who had been studying in Europe as a part of the Erasmus Mundus programme in the area of agriculture and life-sciences and, moreover, these sectors play an important role in the economy of each country.

A common database of graduates / EM participants was created by the partner universities in Asia as well as by the European coordinators of the Erasmus Mundus projects. EM projects were selected based on their orientation to provide scholarships to students coming from two selected countries (China and Mongolia) in the areas of agriculture and life-sciences. The respondents were selected and contacted based on this database, primarily through email, secondly through social and personal networks.

Data collection process

To reach the specific objectives, multiple means of data collection were used throughout the survey. Methods used to obtain the necessary information are electronic polling, collected data comparison method, as well as the method of correspondent interviews. The general procedure followed the overall

methodological framework explained in the ASK Asia Erasmus Mundus Alumni Employability Study (Chaloupkova et. al, 2015) and was used as basis for this work. Process of local data collection was the same in both examined countries, in China and Mongolia. The study itself consists of three main data collection approaches. Firstly quantitative methods were used as online survey. An online questionnaire was distributed among EM alumni. Secondly, semi-structured interviews were conducted in person with key employers and informants in the field of agriculture and related life sciences in China and Mongolia and, last but not least, focus group discussions were facilitated during the national workshop with representatives of alumni and employers. Some specifications were adjusted to suit the local conditions.

The total number of samples fully-completed the survey were more than 100. There were many mistakes and samples unused for our survey so after clearing our respondents were accepted for the country study 62 samples. This 62 samples consisting of: 47 from China and 15 alumni from Mongolia. Profiles of the respondents were different (age, education level, skills, etc.). Contact with the particular institutions that employ EM graduates was obtained via an online survey. The complementary respondents were chosen on the condition of to be agriculture, life-sciences related fields and recommended by local ASK Asia project partner institutions. Based on the information provided by the sample of Chinese and Mongolian alumni, a list consisting of the contact details of 30 employers was developed. From these, three employers were not based in China (Singapore, US, and Switzerland), so they were dropped from the sample because the objective of the study is to assess the performance of the EM graduates in the Chinese professional job market. The first national workshop was organized at the Nanjing Agricultural University in China on October 11, 2014. The workshop hosted 17 participants. Eight of these were from the sample of responding alumni, six were representatives of Asian institutions and three were representatives of European higher education. Mongolian national workshop was organized at the Mongolian University of Life Sciences in Ulaanbaatar on 15 October 2014. In total 27

participants contributed to the discussion, including 14 representatives of four employers (HEI, research institutes, state organizations and the private sector), ten alumni and three representatives of European universities. During the workshop, preliminary results of the employers' opinions and the alumnus survey were presented. Key issues raised by employers and alumni were then discussed.

Finally, lessons learnt from each country and final conclusions were discussed during the regional conference that was facilitated at the Princes of Songkla University in Thailand on February 2-4, 2015. The regional workshop hosted 25 representatives of European and Asian universities and consultants involved in the research process. Collected data were compared with the EU official documents.

Data analysis

In order to improve the validity and reliability of data, various data collection techniques were used, such as a study of the literature, an online survey, interviews and focus-group discussions. Individual techniques are described in detail in this chapter. In addition, this study was complemented by two separate country case studies (China and Mongolia) and each study included its specific methodology, described in detail according to the situation in the respective country. The semi-structured quantitative questionnaire was sent to graduates for filling. This questionnaire consists of four general parts. These parts providing background info about graduates like: home university and studies there, country and university studied in Europe, language of study followed by job and competences part including, skills, competences and information about employers and their requirements. For data analysis was used mainly basic office programmes. Many parts were counted and graphically processed as support and final data. For data processing were used Limesurvey. Limesurvey is Open Source web appagelication to create, publish and collect responses to online & offline surveys. Supported data were evaluated by excel. Skills, abilities of the graduates and their own ranking of school system were evaluated by scale of numbers (preferences) from 1 to 5,

where the 5 is the best. Many various kinds of graphs and tables were used and created from data collected from literature review and some specific taken from Ask Asia project.

Limitations of the research

Although the research has reach the specific aims some limitations were present. From the beginning the language appeared to be one of the main limitations because of lack of high level of the English and misunderstanding of questions asked. The sample (meaning the number of respondents) proved to be another limitation in this study. Due to the rule of quantitative survey „more respondents you get, better the statistics will be“. The main problem of that limitation is the lack of respondents from agriculture-related studies because in general there were numerous samples (graduates), but not all of those were useful for this study. At least the time spent in both countries and for the whole research could be also one of the weaknesses because for more valid date more time would be required.

Results

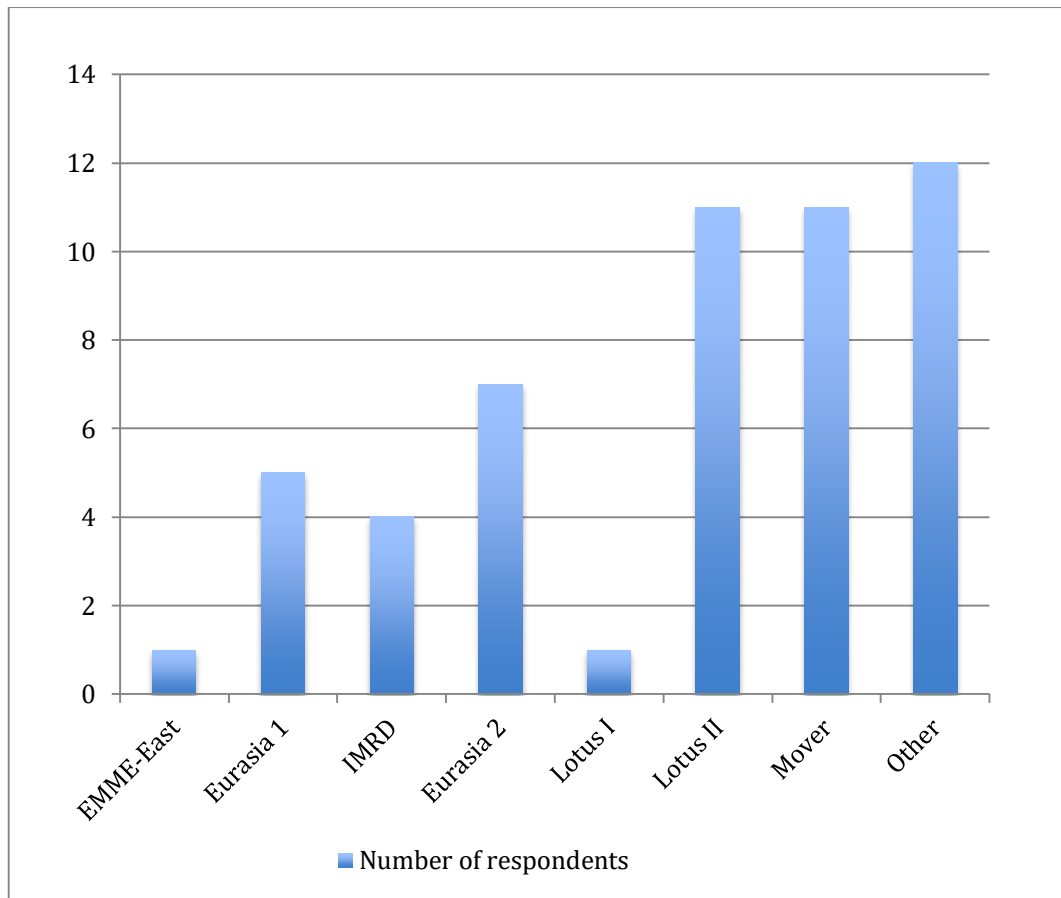
China Erasmus Mundus alumni experiences

In this chapter results from the Chinese alumni survey are presented, including general demographic information about the respondents, their study backgrounds, professional experience and skill development throughout the programme, as well as the current employment situation of EM alumni in the field of agriculture and related life sciences. Respondents are from many Chinese schools and studied in various European universities. Total number of complete the survey is 47.

Alumni characteristics

The age range of the sampled alumni is between 20 to 36 years old. The two largest age groups are “20-25” and “26-30” years. This seems to be that China alumni leaving mainly for Bachelor’s and Masters’ degree studies. The EM alumni come from different areas; being predominantly (85%) from urban area, where an easier access gets good education is available. With 51% of the alumni being female, a sound gender distribution is noticed amongst EM participants. The majority of the respondents had participated the EM project as a Masters’ degree student (42%), followed by post-doctoral (28%), Bachelor’s students (17%), and doctoral degree students (13%). Master’s students were mainly participating for a mobility of one or 2 years, while Bachelor’s students’ mobility lasted for a half or full year. Most participants were financed through one of the following 3 projects: Lotus II, Mover and Eurasia, as shown in the figure 1.

Figure 1. Alumni from China - distribution amongst EM projects



Source: Online survey on alumni experience with EM programme

The most visited country was Belgium (17% of the respondents), followed by Germany with 12%. The choice for a specific country was indicated as being decided based mainly on the personal interest in a particular university. The most stated reasons for opting for a specific host university were its offered study programs (30%), the offer by their sending university to study at particular European university (19%), or the reasons of specific working group/teacher or tutor in university (12%). The least mentioned reason (6%) indicates the students had found the university online and become interested.

The Chinese EM participants are not a homogenous group, as they come from different parts of China, have experienced different living conditions, and studied various specializations. 28% had a previous experience abroad before participating the EM project; more than half of them for a period of about 3-6 months, following

by who participating less than 3 months. The most previously visited countries/regions had been USA and EU.

The most frequent reason (15%) for conducting the mobility was indicated as desire to improve language skills. Overall the integration within then new society seems to have been quite smooth, as 55% indicated to have experience a good integration with only some minor problems.

The majority of alumni had studied mostly in the field of engineering (17%) and rural development (11%); more specifically biotechnology and animal science. 38% of all the respondents had chosen one of the above-mentioned fields. Within the other half, economics and law and business were the most represented. Alumni rather chose the country according to the particular university or offer from their own university or knowledge about the target country. Moreover, 6% wanted to improve their language skills. Erasmus Mundus students come to those new countries far away from their homes with other cultures, mentality and habits. Integration to a new society was quiet perfect. Good integration and just some little problems experienced 55% of them.

Most of the respondents (85%) returned home right after the end of their mobility. The rest of them remained longer within the EU, indicating they wanted to get a job in Europe, or that they had applied for a higher level of education.

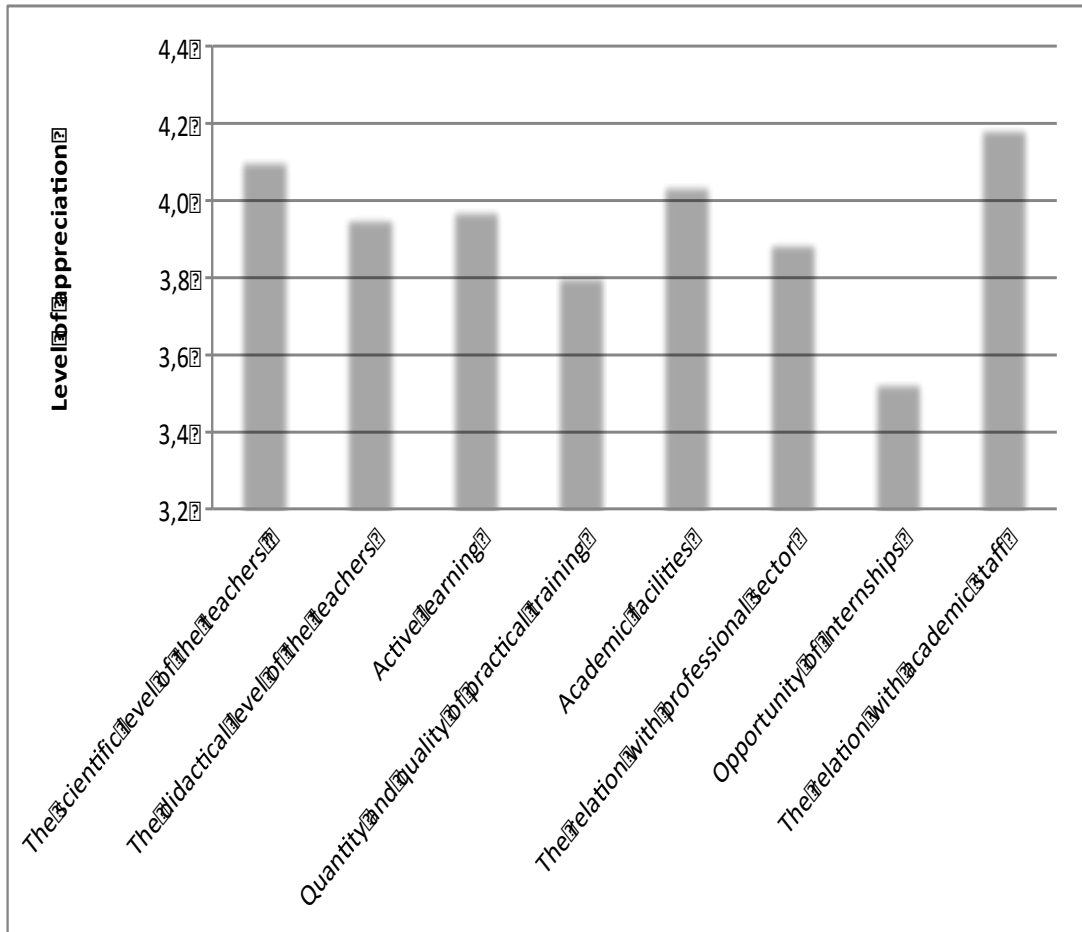
Knowledge and professionals skills

Graduates come from different conditions of living and parts of China and various specializations, so this part consists of their experiences before. Experience with staying abroad had 28% of students. More then half of them spent abroad 3-6 months, the rest various time periods. They have mostly visited countries of the EU, the USA, Singapore, Canada and New Zealand. More than half of the respondents gained professional experiences during studies in EU. These experiences had 70% of

the alumni. They gained these experiences because of getting a practise; few of them took internship and students jobs and volunteer work during the period out of China. The internship took 51% of the all respondents and mainly voluntary internship and 82% of the all currently working alumni strongly agree or agree that their participation in EM programme helped them to find a job and develop their career. When the graduates complete the programme, they should get back to their countries. The majority consisting of 83% of total came home right after the end of study. The rest of them stayed more time because they wanted to get a job in Europe or they applied for the higher level of education.

EM students developed specific skills and competences during their stay in the EU. Students mentioned the ability to be independent and the capacity to adapt to new situations as the most important skills they developed. Additionally, the surveyed students indicated they improved their oral and written communication, language skills, self-confidence, interaction with other people and cultures, and their capacity to learn. Students gave computer skill the relatively lowest score. However all skills were given a high grade. With regards to language skills, specifically English improved a lot (for 92% of the students). With the exception of French (11%), improvements in other languages were negligible. The overall appreciation of the European teaching and learning was very positive. Specially valued were the relations with the academic staff, and the scientific level of the teachers. Didactical level of the teachers, active learning and academic facilities had rank 4.1. The relations with professional sectors and the opportunity to conduct an internship were given the lowest grading (see figure below).

Figure 2. Results Chinese alumni appreciation of European teaching and learning



Source: Online survey on alumni experience with EM programme

The only one indicator was ranked close 3.5. That indicator was opportunity of internship offered by university. The lack of the offered internships is reason that majority 48% of the alumni gain experiences outside of university. More attention could be paid to offering some training or internships to students to gain more skills and experiences for future job market.

Employment

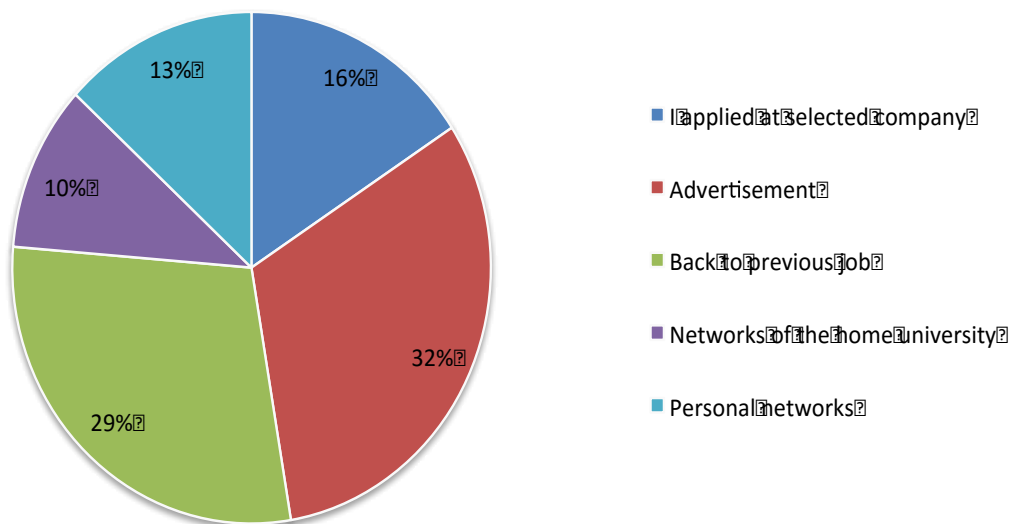
82% of all the currently working alumni agree or strongly agree that their participation in EM programmes helped them to find a job and develop their career. Over half of the respondents (63%) had some kind of practical experience

before participating in the programme. They gained experience through internships (48%), students' job or volunteering position during the period outside of China. Only one fifth of the alumni (18%) had a job before participating in the EM programme.

At the time of this research, 58% of the respondents were working. Alumni who were working before EM programme are working mostly in the same job as before (67% of those with a job before starting EM), the rest of graduates are working in a new company.

Of the EM graduates that are currently unemployed, 48% is actively searching for a job now, while another 48% are on holiday, the remaining 4% are women on maternity leave. The majority of those that are currently looking for a job have been doing so for less than three months. To search for jobs, Chinese alumni make use of different types of media (newspaper, internet, etc.). Following figure no. 3 summarizes how the alumni found out about job.

Figure 3. How did the alumni find a job



Source: Online survey on alumni experience with EM programme

The majority (68%) of the alumni that are currently working have a job in the public sector, mainly in ministries, universities and national agencies. This fact could be understood that government supports this mobility to receive high skilled public servants with much foreign experience to help country with development. The private sector also has strong position in alumni job sector, because of employees with international experience and with foreigner language skills are welcome by many companies doing international business.

After EM programme more than half alumni returned to the same employer and same position as before. The field of current position is also the same as field of study abroad. This confirms that institutions/companies do not want to lose own skilled employees and support them. Moreover is interesting that also private sector supports the education/training of alumni what is not common in this part of the world. For summary of the alumni experience, the cluster analysis was implemented and alumni were divided in three clusters.

Cluster I.

Cluster I. represents the group of alumni (number) who were working before their participation in EM. These alumni are currently working in the same company/institution as before. Alumni from this group are working in the public sector, mainly universities and the rest in institutions. Alumni in this group are in the age group of 36 years and over. This category consists of Post-Doctoral researchers that carried out research in the EU for one year.

The following figure represents selected testimonies of alumni with EM experience to satisfaction with their position at the labour market:

+ Pros

- Cons

<ul style="list-style-type: none">-Studies are applied in practice-Job corresponds to the study field-Building capacities for higher education development-Ability to convert the knowledge and experience in home country	<ul style="list-style-type: none">-Lack of internship offers
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What do they consider to be the most important factor influencing their employability?

<ul style="list-style-type: none">-Experiencing a foreign culture-Language skills-Capacity to work in a team, networking-Self-confidence-Creativity-Capacity to adapt to new situations-Degree from Europe
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Cluster II.

The second cluster also represents alumni who were working before participating in the EM programme. This group also had professional experience before starting

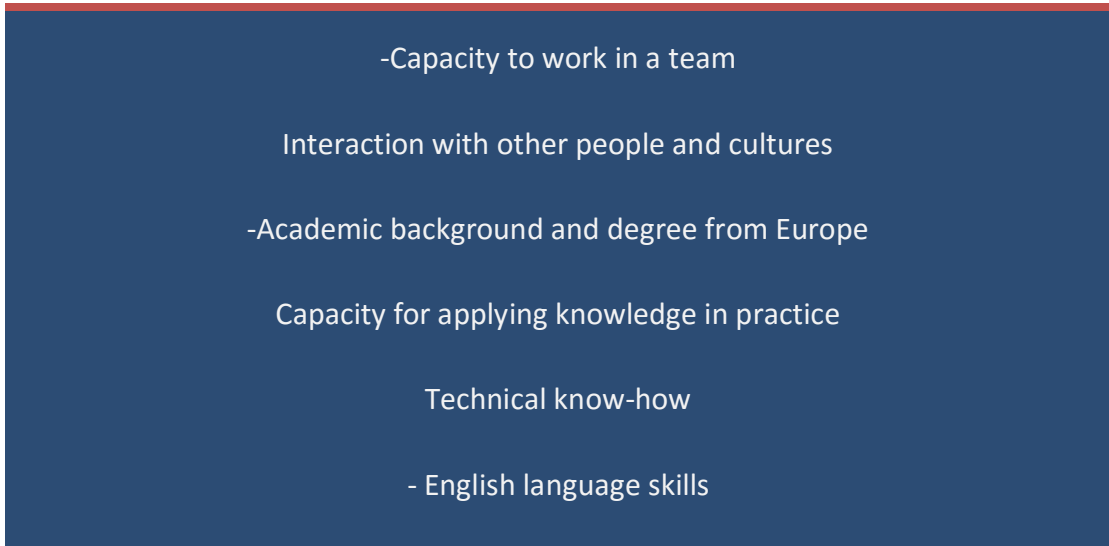
EM. Alumni from the second cluster are currently working in a different organization than before, but in the same sector. Also in this cluster almost all worked in the public. Similar as for Cluster I, the mobility of these alumni was for 1-year post-doctoral research. Alumni are in the age group of 36 years. They choose the exchange university based on a specific working group/teacher/tutor, recommended by schoolmate/tutor/teacher.

+ Pros

- Cons

<ul style="list-style-type: none">-Ability to learn new things in a multicultural environment-Research skills-Enjoy work on national and international project and-International relations/network	<p>- <i>none identified</i></p>
---	---------------------------------

What do they consider to be the most important factor influencing their employability?



Cluster III.

In the third cluster represents the alumni without working experience before participating the EM programme. This group is the largest. It consists of 82% of the alumni. To this cluster belong two age groups: between 20-25 years, and between 26-30 years. Alumni from this cluster studied mainly Masters' degrees, with a mobility duration of one to two years. In this group slightly more than half of the alumni are now working, while 23% is still looking for a job. However, the majority of those still looking for work have been doing so for less than three months.

+Pros

- Cons

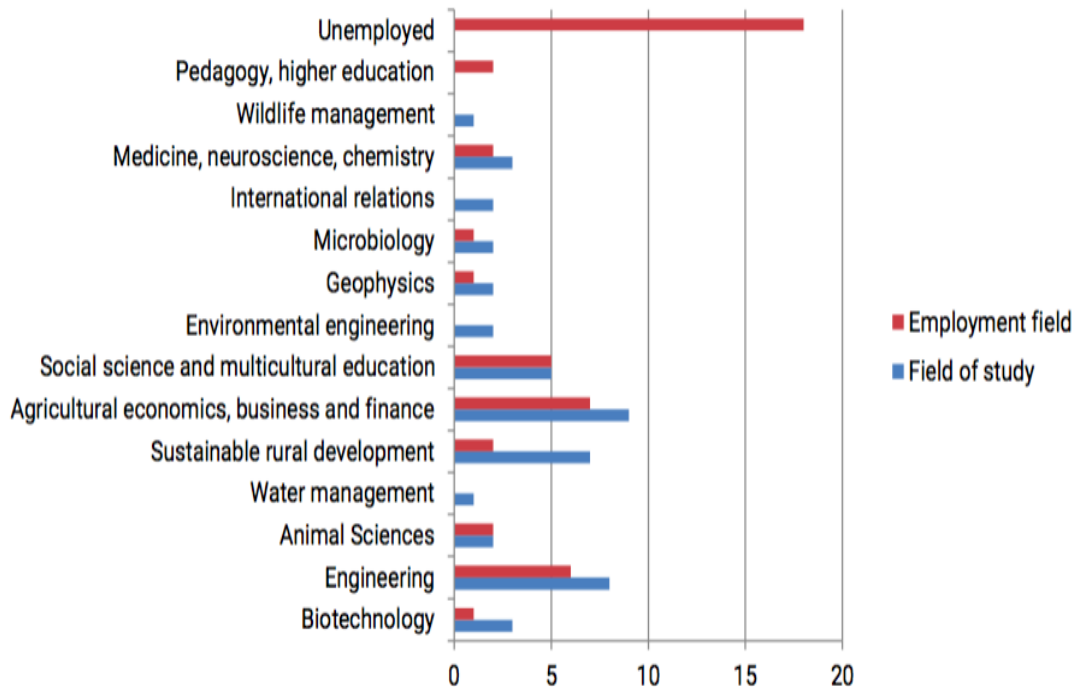
<ul style="list-style-type: none">-Ability to develop communication skills, time management and expertise-Culture exchange-Contribution to higher education development-Research and work related skills	<p>- <i>none identified</i></p>
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What do they consider to be the most important factor influencing their employability?

<ul style="list-style-type: none">-IndependenceCapacity to adapt to new situationsCapacity to learnSelf-confidenceDegree from Europe- Language skills
--

Regarding to the field of studies and current employment, the majority of alumni found a job in the field related to their studies. With only a three alumni are working in a field that is not related to their studies as it is represented in the following figure.

Figure 4: Study fields and current employment of alumni



Source: Online survey on alumni experience with EM programme

The biggest group of alumni (47%) works as an academically qualified employee without management function. On the second place (13% each) are groups of jobs, specifically: research assistant, executive employee and qualified employee. Further, 11% of respondents get job as academically qualified employees with management functions. That group work as project managers. Only one respondent is an ordinary employee.

Alumni are working in various institutions and companies. Employers require different work skills and competences. According the survey, the most important skills required are the capacity to learn, capacity to work in a team, ability in problem solving, responsibility, an analytical capacity. The least required skill was computer skills.

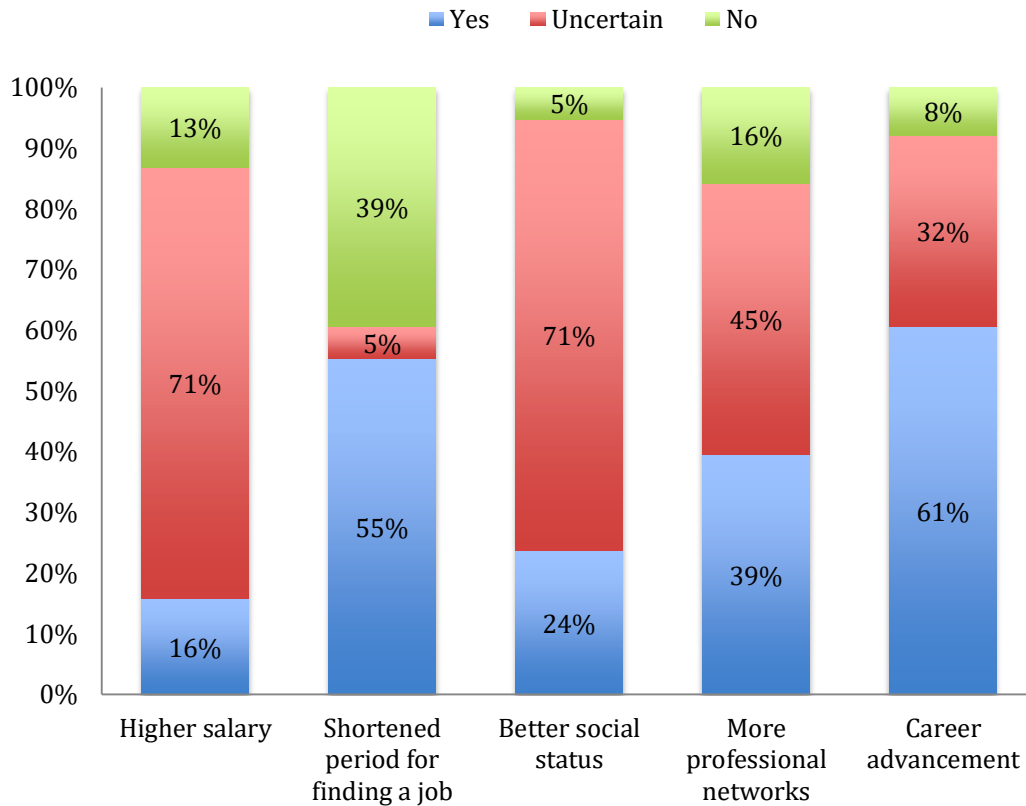
Position at the job market

How competitive alumni will be on the labour market is influenced by the level of confidence they have in themselves. Do they feel an advantage in comparison with graduates from a Chinese university who did not have the opportunity and possibility to study in foreign country? The figure 5 bellow shows the respondents' perceived advantages.

Respondents consider that their participation in the EM programme gave them advantages on the labour market. Studying abroad has more advantages for future career. Many of the participants surveyed considered the EM programme as a big opportunity. Through their participation they achieved improvements in work and living development was obtained. In addition, they stated that they developed competences important for the Chinese labour market.

Shorter period of finding job is considered an advantage after the EM programme. However, alumni are uncertain whether the EM participation provided higher salary and a better social status. More professional networks are considered an advantage for most respondents, although for some whether this is an advantage is uncertain.

Figure 5. Perception of labour market advantages of EM alumni



Source: Online survey on alumni experience with EM programme

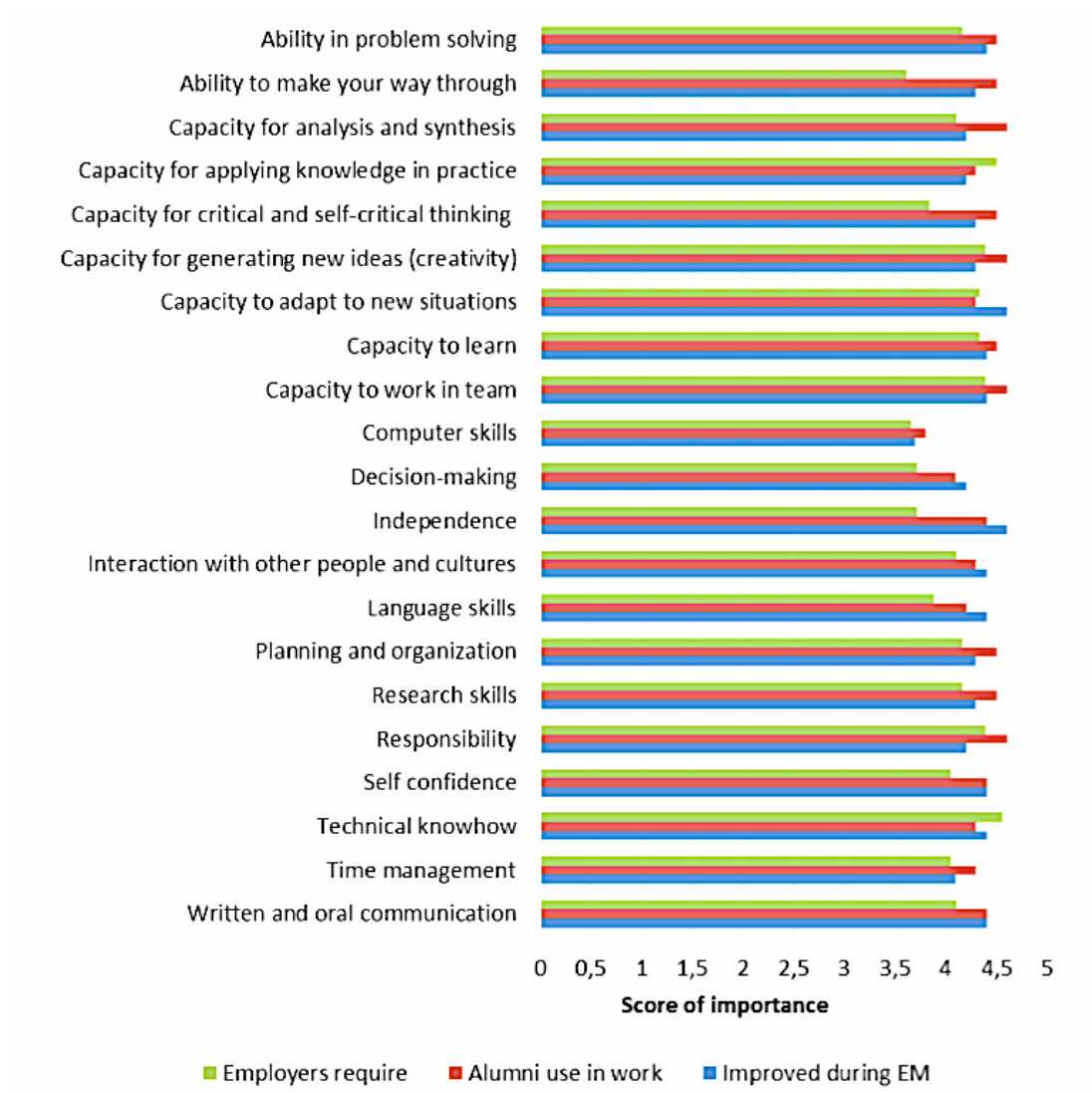
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Respondents are very positive with regards to their position on the labour market. Moreover, many alumni are satisfied with their own position, and most of them learned new things at work and improved themselves. Many people who were unsatisfied would have preferred a job position where the English language is used, instead of Chinese.

There are several factors, which can be important and influencing alumni's employability. These factors are affected by whether the employer is from the public or the private sector. Some of the most important and common factors of influence for EM graduates are: skills from the EU, having had the opportunity to study abroad, communication and English skills. These skills improve the alumni's position on the Chinese job market. The majority of the alumni surveyed believe that the degree they obtained in the EU gave them a better start and more possibilities. The experiences and knowledge gained in the EU graduates used often in their daily working life.

Figure 6. Perception of labour market advantages of EM alumni



Source: Online survey on alumni experience with EM programme

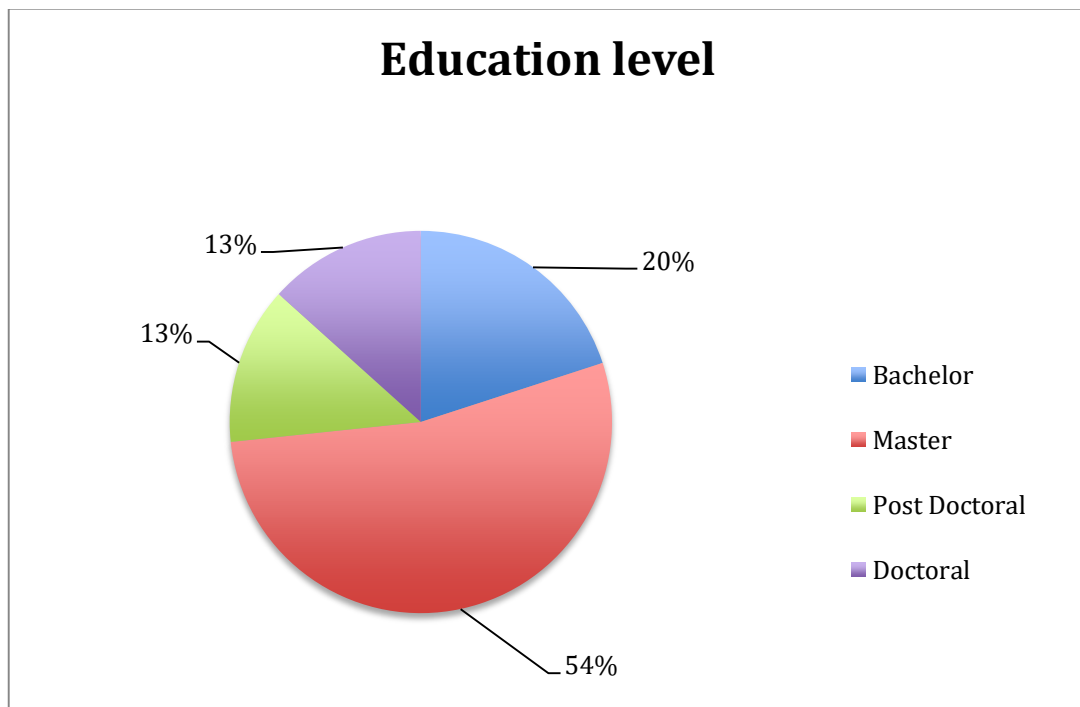
Mongolia

In this chapter results from the Mongolian alumni survey are presented, including general demographic information about the respondents, their study backgrounds, professional experience and skill development throughout the programme, as well as the current employment situation of EM alumni in the field of agriculture and related life sciences. Respondents are from main Mongolian Universities and who studied at various European Universities.

Alumni characteristics

The total number of respondents was 12. The age range of the alumni was quite wide, reaching from 20 to over 36. The two biggest age groups represented were: “36 or over” and “26-30”. As you can see on Figure 7, Mongolian alumni left mainly to do Masters' studies - 54%, followed by Bachelor's studies (20%). At Doctoral and Post Doctoral levels, 13% of alumni participated in each. Masters' studies were financed mainly for one year or for the complete period of two years. This confirms the expectation of studying for a full programme in the EU. Bachelor’s studies were covered for half a year or for one full year. The studies were financed mainly through Eurasia projects, 53% through Eurasia 1 and 33% through Eurasia 2.

Figure 7. Education level of respondents



Source: Online survey on alumni experience with EM programme

True to expectation, 93 % of alumni came from urban parts of Mongolia. This offered them easier access to education and in turn this might be an indicator of a strong urbanization process in Mongolia. Gender distribution in the EM programmes was quite balanced; 53 % of the alumni were male, the rest female.

Half of the alumni involved in the research chose two countries for their EM programme. The most frequently visited country was Poland, with 29% of alumni. Poland seems to be a popular destination because of the high level of education, economical conditions and the study programmes offered. The Czech Republic followed Poland with 24% of alumni, where the reasons also were economic as well as the fact that study programmes are offered in English and are focused on developing countries. The main reason for the choice of country was the offer of a particular university by home university.

EM alumni could have chosen from a range of fields of study at the partner universities. The majority of alumni studied agricultural economics (27%) due to the importance and usability of this field in Mongolia. The second most popular choice was animal science at 13%. Apart from these two, the other most preferred fields of study were biotechnology, rural development and water management. Only one third of all respondents chose another field of study, mainly general economics, international economic development and environmental economics.

Reasons for choosing a particular university were also identified. The biggest group of alumni chose the university because of an offer from their own university (33%), followed by the offers of study programmes at the selected universities (27%) and due to research activities of the specific universities (20%). The rest of the alumni chose the university due to its ranking, based on recommendations from schoolmates/a tutor/a friend or due to specific working groups/teachers/tutors.

Alumni with no previous experience in the EU decided to participate in the programme due to the opportunity of studying and living there. All respondents returned home right after the programme was terminated. Erasmus Mundus alumni came to new countries far away from their homes with different cultures, mentalities and habits. Integration into the new society was very good; in a few cases they experienced minor problems caused by the language barrier and cultural differences.

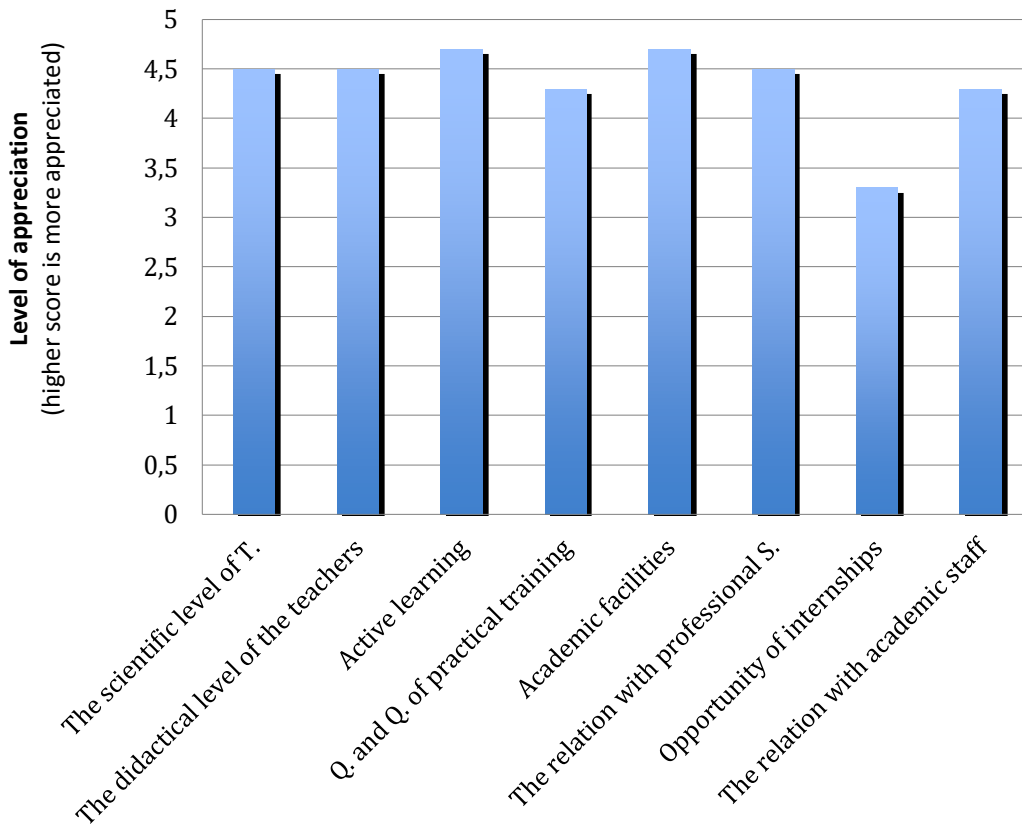
Knowledge and professionals skills

The overall performance and integration of alumni could be influenced by previous experiences from abroad. In fact, 40% of alumni already had experience staying abroad. Two thirds of these spent more than one year in a foreign country, the rest less than one year. Half of them had experience in a European country, the rest in China, Korea and Thailand. Moreover, 60% of the alumni had professional experience before the EM programme, in particular internships and student and volunteer jobs.

EM alumni were asked to evaluate what skills and competences they developed during their stay in the EU. The skill most developed by students was interaction with other people, followed by: increasing responsibility, oral and written communication, self-confidence, independence, time management, the capacity to work in a team, the capacity to adapt to new situations, planning and organisation, the ability to make their way and finally the capacity to learn. The least developed skill was computer skills. This may be taken to show that Mongolian students were accustomed to using computers in the local university. Language skills were developed at a high level; 87% of alumni improved their English during their stay in the EU. Other language improvements were negligible, with the exception of German - improved by 13% of alumni.

Valuation of European teaching and learning was very positive. Students evaluated their satisfaction on a scale from 1 to 5, where 5 was the best. With a score nearing 5, relations with academic staff and active learning were highly ranked, followed by the scientific level of the teachers, the didactic level of the teachers and relations with the professional sector, can be seen in the following figure.

Figure 8. Appreciation of the European teaching and learning by alumni



Source: Online survey on alumni experience with EM programme

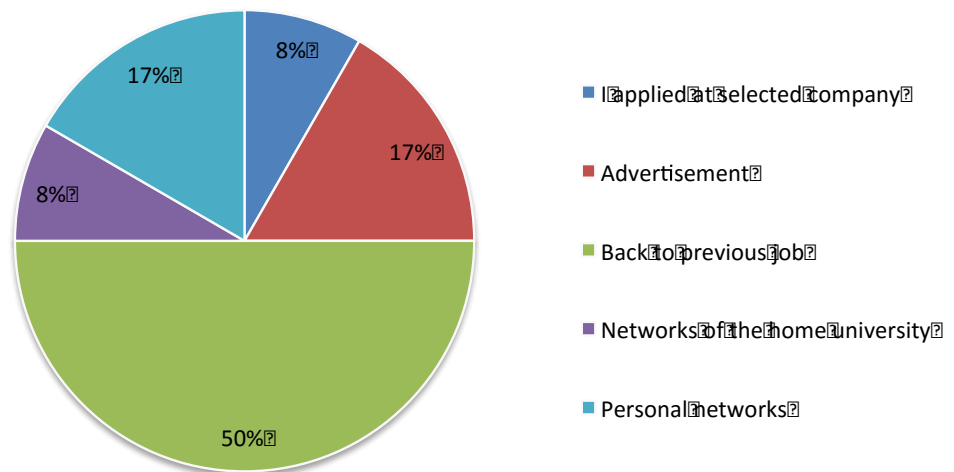
The only indicator lagging behind in the ranking, reaching a score 3.3, was the opportunity to do an internship offered by the hosting university. During the studies only 40% of the alumni gained some experience outside of the university. More attention should be paid to training and internships being offered to students so that they can gain more practical skills and experience for their future jobs.

Employment

The 60% of the alumni had a job before moving to the EU and thus the mobility was intended to increase their already-existing competences and qualifications. At the time of the research, 80% of alumni were working. Alumni who were already working before the EM programme mostly remained working in the same job (67%

of those with work experience before). Alumni who were, at the time of data collection, unemployed were searching for a job (67%); only one was on maternity leave. The alumni who were unemployed were searching for a job for a period between three months and over one year. There were many ways of how to apply for a job. Mongolian alumni mainly look for jobs through advertisements in different types of media (newspapers, the internet, etc.) and the use of personal networks is also very common. Half of the alumni went back to their previous job or applied at a selected company. How alumni found their jobs is shown in the Figure 9 below.

Figure 9. How the alumni found a job in Mongolia



Source: Online survey on alumni experience with EM programme

The majority of the currently working alumni (83%) were working in the public sector, mainly in ministries, universities and national agencies. This fact could be the reason for governmental support of mobilities, as they get highly skilled public servants with wide-ranging foreign experience to help the country with its development. The private sector does not have such a strong position with regards to the employment of alumni with European experience.

For a summary of the experiences of alumni, a cluster analysis was implemented and the alumni were divided into three clusters.

Cluster I.

Cluster number one represents a group of alumni (42% of graduates) who were working before EM and already had some working experience before the EM programme. These alumni were currently working in the same company/institution as before. All these alumni were employed in the public sector, predominantly in universities and their jobs were arranged before their return from the EU. This fact explains the effort of the institution to improve the quality of their own employees. These alumni belonged to the age group “36 and over” except for one from the age group 26-30. This category consisted of Post Doctoral, Masters' and Doctoral students who studied in the EU from half a year to two full years.

The following figure represents selected findings of alumni as to satisfaction with their position on the labour market:

+ Pros	- Cons
<ul style="list-style-type: none">-Studies are applied in practise-Job corresponds to the field of study or very similar-Training obtained during the studies-Ability to convert knowledge and experience into practice in the home country-Research skills	<ul style="list-style-type: none">- None identified in this cluster

What do they consider to be the most important factor influencing their employability?

-Experience of a foreign culture

-Capacity to work with a team, networking

-Language skills

-Responsibility

-Creativity

-Capacity to adapt to a new situation

-Good written and oral communication

-A Degree from Europe

Cluster II.

The second cluster represents a group of alumni (25% of graduates) who were working before EM and obtained some work experience before the programme. Alumni from this second cluster are currently working in different organizations than before, but in the same sector, a majority in the public sector. They spent two years in the EU and completed a Master's degree. These alumni belong to the age group 26-30 and 36 or over. They chose a particular university due to the suggestion being made by their university and the offer of the study programme.

+ Pros

- Cons

<p>-Ability to learn new things in the multicultural environment</p> <p>Research skills</p> <p>Knowledge and use of economics</p> <p>-Benefit from work on national and international projects and relations</p>	<p>- Longer time of job search</p>
--	------------------------------------

What do they consider to be the most important factor influencing their employability?

<p>Educational level and experience</p> <p>Interaction with other people and cultures</p> <p>-Academic background and a degree from Europe</p> <p>Decision making</p> <p>- Language skills</p>
--

Cluster III.

The third cluster represents alumni without any working experience before the EM programme. This group consists of 25% of responded alumni. Representatives of this cluster belong to the age groups from 26-30 to 31-35. Alumni from this cluster studied mainly for a Bachelor's or Master's degree and took the mobility from a half a year to two years. Half of this group is currently working; the unemployment rate in this cluster is high, possibly due to a lack of previous work experience.

+Pros

- Cons

<ul style="list-style-type: none">-Ability to develop communication skills and time management-Cultural exchange-Contribution to higher education development-Research and work related skills	<ul style="list-style-type: none">- Unemployment
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What do they consider to be the most important factor influencing their employability?

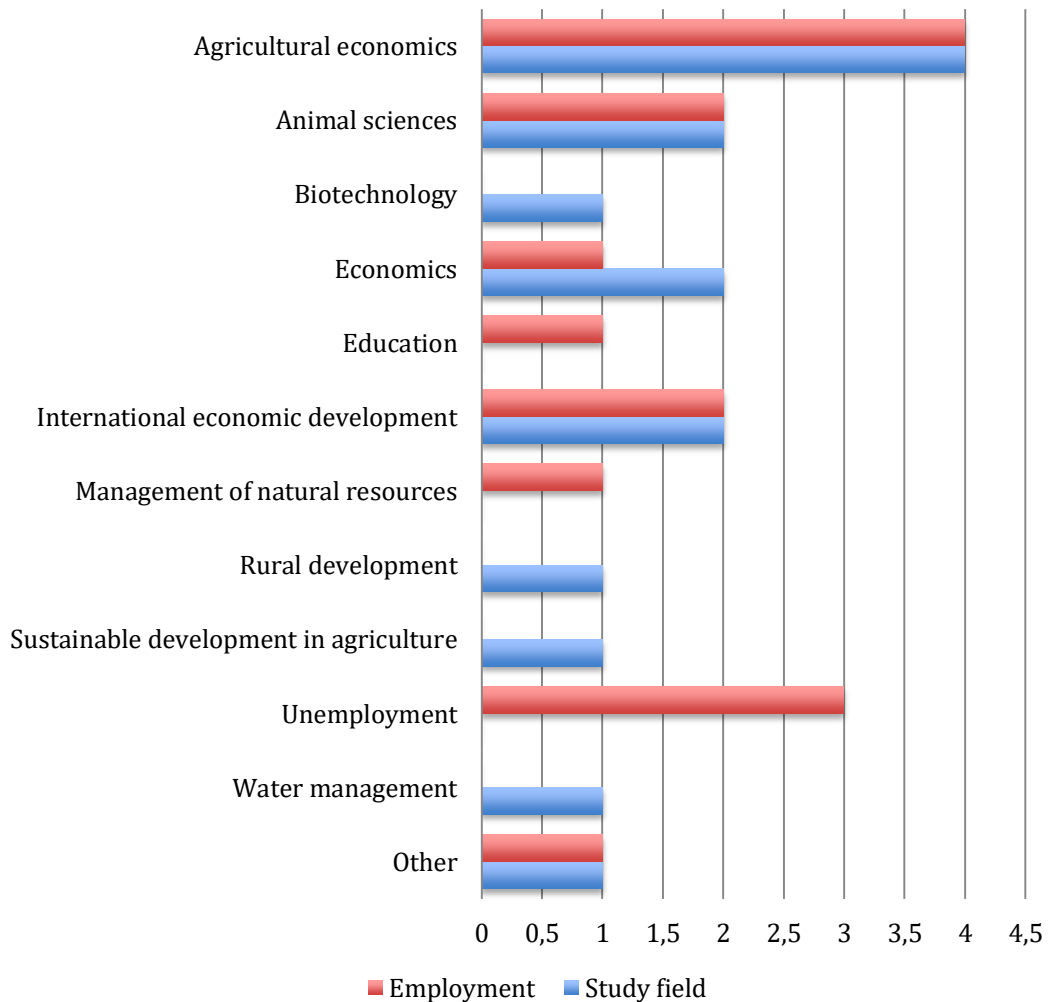
<ul style="list-style-type: none">-IndependenceCapacity to adapt to new situationsCapacity to learnSelf-confidence-A Diploma from EuropeLanguage skills-Experiences

Various kinds of employment and fields of study in the area of agriculture and related life sciences were cited. The majority of the alumni found a job in a field related to their studies. Only a few exceptions chose a different one, as is shown in the Figure 10 below.

The biggest group of alumni consisted of 25% of those employed, who worked as academically qualified employees with a management function. In second place, 17%

each were: research assistants, academically qualified employees without a management function and qualified employees. Only one respondent each were: public servants at a lower/middle level, public servants at an upper level, and self-employed.

Figure 10. Fields of study and current employment of alumni



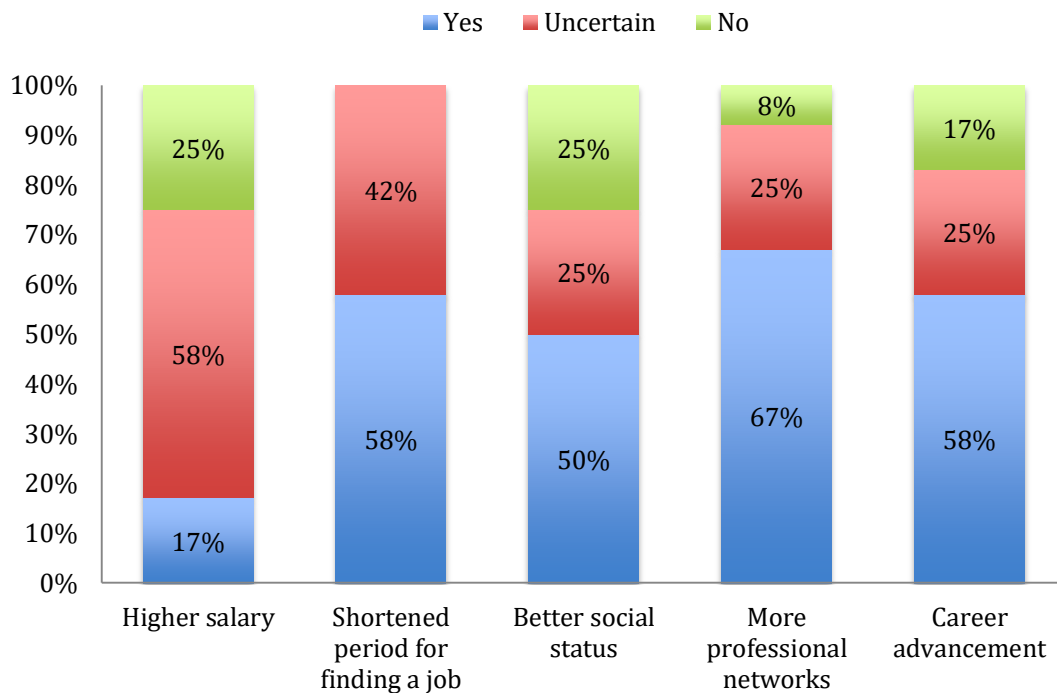
Source: Online survey on alumni experience with EM programme

Alumni worked in various institutions and companies. Employers required different work skills and competences. According to the survey of alumni, the most important skills required in jobs were: responsibility, planning and organisation, oral and written communication, languages skills, research skills, the capacity for applying knowledge in practice and the capacity for analysis and synthesis.

Position at the job market

How competitive alumni are on the labour market is influenced also by the level of confidence they have in themselves. Do they feel that they have an advantage in comparison with home (Mongolian) university graduates who did not have an opportunity to study in a foreigner country? The figure 10 shows the perceived advantages of EM alumni.

Figure 11. Advantages of EM alumni



Source: Online survey on alumni experience with EM programme

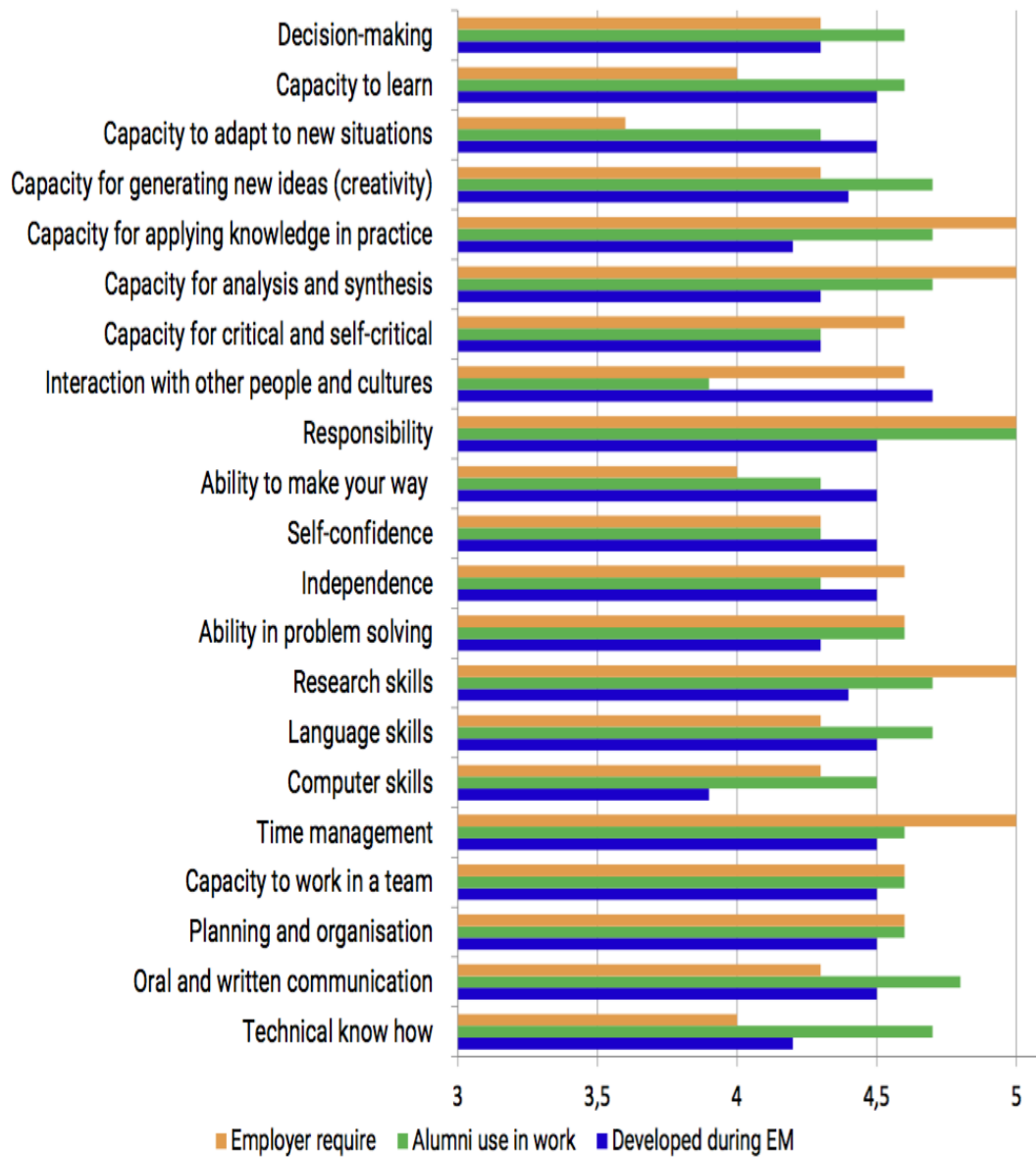
Many students thought the EM programme a significant opportunity and help in the future progress of their careers. Development was noted in their work and living conditions. They also felt that the development of their competences helped their position on the labour market. The professional network that was created during the mobility was strongly felt to be an advantage after the Erasmus Mundus programme. Shorter periods of job search was returned by more than half but with

some doubts, as the rest of the alumni were uncertain about this. Alumni were deeply uncertain as to whether their participation in the EM programme ensured them a higher salary. Half of working alumni agreed that better social status was attained and that this was an advantage of the programme.

Satisfaction with their position on the labour market was very positive; most of them learnt new things at work and had improved their performance. Many alumni appreciated the contacts from their study period and new opportunities were open to them. There were several factors, which could be important and influence the employability of alumni, variously in the public and private sector. Some of the most important and common reasons of higher employability were due to: their responsibility, professional skills from Europe, study abroad, communication and English skills (important for international business and communication with the rest of the world). These factors make alumni better off in the local job market. A majority of the alumni believe that a degree obtained in the EU gave them a better start and more opportunities. The experience and knowledge gained in the EU were used by alumni very often in their daily working life and they very much appreciated the high educational level they reached in the EU.

Alumni were assigned to perform a variety of duties in their jobs, depending on the given position. The figure 12 shows the results of their subjective evaluation of skills gained during studies and compared with employers and daily used skills. According to alumni, responsibility (scoring the highest possible grade of 5) was the most important competence required for success in a range of positions. Oral and written communication (scoring 4.8) were also important skills for job performance. In order to get a better job, employees needed to have the capacity to generate new ideas and to be creative, responsibility and time management. On the other side technical know how is daily used by alumni, but these findings indicate that soft skills and personal qualities are the most needed and valued. Furthermore, critical thinking, planning and organization, problem solving and independence were valued in job seekers on the professional market.

Figure 12. Comparison of skills and competences developed and demanded



Source: Online survey on alumni experience with EM programme

Discussion

Across the two countries China and Mongolia, where surveys and interviews were conducted, the messages sent by the alumni were remarkably similar. Studying in Europe had positive impact on their professional life. Most of the graduates from both countries valued the impact of the mobility to European Union, which had positive effect on their employment capacities. Graduates Impact survey from 2013 confirm our result with 64.4% graduates being satisfied after return (EMA, 2013). The majority of the Chinese alumni was studying Master degree (42%), what is less than in Mongolia (54%). The second largest group in Mongolia was presented by Bachelors student's what is the reason that studied mainly complete programme in EU. Results from EMA (2012) said that alumni choose programme mainly due to scholarship what is totally different result than Chinese graduates, because their desire to study abroad was influenced by the intention to improve language skills (mainly English), which increases the chance to get international job. The mastery of English as a language of communication is seen as a major advantage for those who have studied abroad. This is assumed to open up a higher number of specific opportunities during their professional life. The reasons why Mongolian studied abroad and chose a specific school were mainly the opportunity to study abroad affected by study programs offered.

The relation between the field of study and area of work in Mongolia were almost the same that supports hypothesis that graduates work in the same sector. This is confirmed particularly by the fact that 59,4% had best match of field of study with area of work (EMA, 2013). Results from China indicate some difficulties on local job arket because of major group of graduates work in a different sector. How do the graduates find a job? 50% of Mongolian alumni get back to previous job whilst 17% of them use the personal networks and 17% of the get the job via advertisement. This is applied on majority of employees from public sector, which is more stable. Results from China are more various - 31% of alumni get back to previous job as

well as find a job via advertisement which again indicate more competitive and unstable local job market or the popularity of the modern technology using. The return to the previous job also confirms that graduates after return are more skilled and institutions want to use this advantage.

Career advancement, shortened period for finding a job and more professional networks were agreed as being an advantage after EM programme in both countries. Very interesting results can be found in Mongolia, because for 50% of them studying abroad provides better social status what's confirm high level of European studies. This is also be one of consequences why all graduates from Mongolia and almost all from China return and live in home countries, what is confirmed by results from EMA (2012). The graduates gain a potential to work abroad for international companies, but they rather stay in the region. Kalinova (2013) said that graduates from China got better chance to higher salary and to get a job, but according to our survey 70% of graduates are not sure what the consequences of job market change might be. The lack of internships researched in EMA (2012) confirmed our results from China. The same problem consider all graduates from Chinese Cluster 1 (15% of the respondents). The results of Mongolia are only particularly lack of internships, because of higher amount of skilled graduates from past. The main problem of that limitation is the lower amount of respondents from agriculture-related studies because in general there were numerous samples (graduates) with compare EMA (2012) and EMA (2013), but trying to be more deeply in comparison with skills developed from various point of view. In general seems Erasmus Mundus to be very effective programme with longer future continuation.

Conclusions and Recommendations

China

Agriculture is an important pillar of the economy of China; it accounts for a significant portion of both employment and overall economic output. The sector is developing dynamically thanks to sharply increasing demand for food products by domestic and global consumers. Based on the results of the questionnaire we can suppose that the graduates from China who obtained the Masters/Doctorates in Europe are well prepared for professional life and for 60% of them were career advancement. The most of the students found their expectations during their study programmes and gave the high appreciations in evaluation of the study programmes. Chinese developed many skills during the studies like etc. communication skills, language skills and self-confidence and technical know how. Many of those skills helped to graduates get job or shorter period for finding job in comparison with local graduates. The employability in Chinese graduates were influenced by the employer were from public or private sector. The language skills gained were very welcomed in international companies. Skills like capacity to work in team, responsibility and problem solving were required by employers.

Despite the positive results from the survey there can be still found some recommendations for improvement of process for future exchange programme. Graduates were welcomed for more internships during the studies. According their expectations should be more practical internships during their studies. With respect to Erasmus Mundus projectants, more practical internships will help to be more qualified and skills obtained very welcomed by employers.

Mongolia

As the agricultural sector of Mongolia is developing towards becoming more integrated and intensified, new positions are opening up, which need specialists capable of developing agriculture in competitive agri- businesses by a process of innovation in all aspects of sustainable development. Most of the employers wished to employ graduates from a foreign country as long as they had built up their horizontal skills such as independence in work, responsibility, self-confidence, thinking in an innovative way and language skills, which leaves them more advantaged than those who did not study abroad. According to the employers, there is a high demand for skilled and competent human resources in Mongolia. EM programme helped them develop their competences, become competitive and advance their careers. Better social status were with career advancement very strong and important advantage of EM programme for Mongolian graduates. That is reason why almost all graduates study and after working in same field. 50% of the graduates returned to previous job, to the same organisation and engaged in the same sector prior to the EM programme after study in the EU. This is the other reason that employers supported mongolian graduates during studies in Europe due to predictability of higher skilled employees. The public sector is again with very strong position as in China. The skills most influenced graduates employability were: responsibility, Most of the employers wished to employ graduates from a foreign country as long as they had built up their horizontal skills such as independence in work, responsibility, self-confidence, thinking in an innovative way and language skills, which leaves them more advantaged than those who did not study abroad and what amlumni realize in their daily work.

Even if the Mongolian graduates were satisfied can be still found some recommendations for improvement for future exchange programme. Mongolian government should create programme to help younger graduates without any experiences before. They should support their employability to be more interesting instead of hiring people from abroad.

Remark

During the studies, major results, which several of them are in this thesis, were presented on conferences/workshops in held in Prague (2015), China (2014) and Mongolia (2014) and published in the ASK Asia project with references listed bellow.

Chaloupkova P. (Coordinator), et al. 2015. *Ask Asia: Erasmus Mundus Alumni Employability Study in the Field of Agriculture and Related Life Sciences*, Report to EACEA, Czech University of Life Sciences Prague, 300 p.

References

EMA report. 2012. The extensive survey report 2011-2012. Erasmus Mundus Students and Alumni Association. Available from: <http://www.em-a.eu/en/erasmus-mundus/graduate-impact-survey.html>: Accessed 2015-12-07.

EMA report. 2013. The extensive survey report 2012-2013. Erasmus Mundus Students and Alumni Association Available at: <http://www.em-a.eu/en/erasmus-mundus/graduate-impact-survey.html>: Accessed 2015-10-05.

Kalinova K. 2013. Competences and employability of Erasmus Mundus Graduates in Agriculture on the Asian Market.

Worden R. L. and Savada M. A., editors., 1991. *Mongolia: A Country Study*. Washington: GPO for the Library of Congress, 320 p. **ISBN-10:** 0160294622

Brázová V. et. Al. 2011. Migrace a rozvoj: rozvojový potenciál mezinárodní migrace. Vyd. 1. Praha: Fakulta sociálních věd UK, s. 147-171. ISBN 9788087404102.

Classbase. 2013. Education System in China. Available at: <http://www.classbase.com/Countries/china/Education-System>: Accessed 2015-10-23.

NAEP. 2013. 15 let programu Erasmus v České republice. Available at: <http://erasmus15let5.webnode.cz/>: Accessed 2015-07-23.

NAEP. 2015. Program Erasmus. Available at: http://www.naep.cz/index.php?a=view-project-folder&project_folder_id=34&view_type_code=program&#record_67: Accessed 2015-03-17.

AT-China. 2014. What is Project 211 in China. Available at: <http://news.at0086.com/China-University-Guide/What-is-Project-211-in-China.html>: Accessed 2014-09-09.

CEC. 2015. China Education. Available at: <http://www.chinaeducenter.com/en/cedu.php>: Accessed 2015-02-04.

Economist. T. 2014. China's economy In three parts. Available at: <http://www.economist.com/news/finance-and-economics/21594999-some-chinese-economic-indicators-are-moving-right-direction-others-are>: Accessed 2014-08-13.

ECONOMYWATCH. 2010. China Agriculture. Available at: <http://www.economywatch.com/agriculture/country-wide/china.html>: Accessed 2014-07-30.

European Commission. 2014. *Erasmus Mundus (2004-2013) in Asia*.

FAOSTAT. 2014a. China Country Profile. Available at: http://faostat.fao.org/CountryProfiles/Country_Profile/Direct.aspx?lang=en&area=351: Accessed 2014-10-12.

FAOSTAT. 2014b. Production Indices. Available at: <http://faostat.fao.org/site/613/default.aspx#ancor>: Accessed 2014-11-05.

Gan, L., Yin, Z., Jia, N., Xu, S., Ma, S., and Zheng, Lu. 2013. Data You Need to Know about China: Research Report of China Household Finance Survey 2012. Berlin and Heidelberg:Springer, 187 p.

Gianni, Origoni, Grippo, C.& P.,2011. China's Agricultural Sector: the Big Opportunity.

Chaloupkova P. (Coordinator), et al. 2015. *Ask Asia: Erasmus Mundus Alumni Employability Study in the Field of Agriculture and Related Life Sciences, Report to EACEA*, Czech University of Life Sciences Prague, 300 p.

ILO. 2015. *Decent Work Country Programme in the People's Republic of China 2013 – 2015*,41 p.

Bat-Ochir, M. 2006. *Mongolian Education System*, 24 p.

Index Mundi. 2015. China Economy Profile 2014. Available at: www.indexmundi.com/china/economy_profile.html: Accessed 2015-01-03.

Kuruvilla, S., Gallagher, M.E. & Lee, C.K. 2011. *Conclusion: from iron rice bowl to informalization: markets, workers, and the state in a changing China*. USA: ILR Press, p248.

Mack, L. 2014. School in China: Introduction to School and Education in China. Available at: <http://chineseculture.about.com/od/thechineselanguage/a/Introduction-To-Education-In-China.htm>: Accessed 2014-09-10.

NBSC. 2015. China statistical yearbook - 2014. Available at: <http://www.stats.gov.cn/tjsj/ndsj/2014/indexeh.htm>: Accessed 2015-04-01.

Trading Economics. 2014. China Unemployment Rate.

UNDP. 2015. *Human development report 2014*,

WEF. 2008. China as a Global Player.

WorldBank. 2014. China Overview. Available at: <http://www.worldbank.org/en/country/china/overview>: Accessed 2014-01-02.

WorldBank. 2014. World DataBank - China. Available at: <http://databank.worldbank.org/data/views/reports/tableview.aspx>: Accessed 2014-09-04.

Asian Development Bank. 2013. Asian Development Bank: Mongolia: Agriculture Sector Development Program and Project. Available at <http://www.adb.org/documents/mongolia-agriculture-sector-development-program-and-project/>: accessed 2015-06-27

Borchuluun Y. 2008. Report of the Study on Information Needs of Mongolian Scholars. Mongolia: American Center for Mongolian Studies Library. 24p.

Enkhjargal A. 2010. Gender Equity in Access to Higher Education in Mongolia. Doctoral Dissertation, University of Pittsburgh.

EPDC. 2015. Education Policy and Data Center: Mongolia flag Mongolia. Available at <http://www.epdc.org/country/mongolia/>: accessed 2015-06-25.

FAO. 2015. World Bank Databank/FAOSTAT: GDP per capita. Available at <http://databank.worldbank.org/>: accessed 2015-06-10.

FAO. 2015. World Bank Databank/FAOSTAT: Agriculture added value. Available at <http://databank.worldbank.org/>: accessed 2015-06-10.

FAO. 2015. FAOSAT: Gross agricultural production value (constant 2004-2006 million US\$). Available at <http://faostat.fao.org/site/339/default.aspx/>: accessed 2015-06-10.

Fellman F. 2015. Mongolia Extension Service to Provide Practicable Knowledge for Farmers. Ulaanbaatar: Swiss Agency for Development and Cooperation

ICEF. 2014. Monitor ICEF: Market Snapshot: Mongolia. Available at <http://monitor.icef.com/>: accessed 2015-06-26.

International Monetary Fund. 2000. Mongolia – Statistical Annex. Washington DC: IMF Staff Country Report. No.26

Mahul O, Belete N, Goodland A. 2009. Index-based livestock insurance in Mongolia. Washington: International Food Policy Research Institute (IFPRI). 2p.

Mijid B. 2003. The Changing Structure of Higher Education in Mongolia. Mongolia: World Education News and Reviews. 16p.

Mongolian Economy. 2014. Labour market of Mongolia by 2020. Available at <http://mongolianeconomy.mn/en/i/5439>: accessed 2014-04-01

Mongolian Statistical Information Service. 2015. POPULATION, by regions, aimags and the Capital, Urban and Rural. Available at <http://www.1212.mn/en/>: accessed 2015-06-10

Mongolian Statistical Information Service. 2015. Agricultural Labour/Employees population aged 15 and over. Available at <http://www.1212.mn/en/>: accessed 2015-06-10

Priess JA., Schweitzer C, Wimmer F, Batkishig O, Mimler M. 2011. The consequences of land-use change and water demands in Central Mongolia. Land Use Policy, 28(1), 4-10.

Trading Economics. 2015. Trading Economics: Employment in Agriculture % of Total Employment. Available at <http://www.tradingeconomics.com/mongolia/employment-in-agriculture-%-of-total-employment/> : accessed 2015-06-27

Rosario M. 2005. Mongolian Dropout Study. Mongolia: Mongolian Education Alliance Ulaanbataar . 7p.

Rural sector strategy and business plan. 2006. Available at <http://www.eastagri.org>

Trading Economics. 2015. Trading Economics: Unemployment Rate. Available at <http://www.tradingeconomics.com/mongolia/unemployment-rate/> : accessed 2015-06-27

UNESCO. 2013. United Nations Educational, Scientific and Cultural Organization: International Literacy Data 2013. Available at <http://www.uis.unesco.org/literacy/>: accessed 2015-06-26.

World Bank. 2012. Mongolia - Country partnership strategy for the period FY2013-2017. Washington, D.C.: World Bank Publications. 95p.

Zhai, J. 2010. Analysis on Graduates Preference for the civil service - Public Administration Review. , (19 (1)), pp.27–42.

Daly L. 2013. New horizons III.; 20p. Available a
<https://wysetc.files.wordpress.com/2013/09/newhorizonsiii-v7-execsummary-v4s.pdf>

Yongqiang, G. 2013. Available at: <http://world.time.com/2013/07/04/in-china-higher-education-brings-few-guarantees/> :Accessed 2014-12-10.

Annexes

ANNEX 1. Online survey on alumni experience with EM programme

Dear Erasmus Mundus graduate,

You have studied in Europe thanks to one of the Erasmus Mundus (EM) projects. Now, the universities of Ghent, BOKU, the Czech University of Life Sciences Prague, and Montpellier SupAgro, together with AGRINATURA and the Erasmus Mundus Students' and Alumni Association would like to analyse what the strengths and weaknesses of their graduates are, with special focus on the question of employability in the Asian job market.

We are aware that you have filled out several evaluations and surveys already at the end of your studies in Europe, but we wish to underline **that we do not want to assess the academic quality of your training, but to compare the practical skills and competences that helped you to find a job with the expectations of the Asian employers.**

The questions you answer will help us to determine the effectiveness of the study programmes within EM, including the focus on any weaknesses of the programmes. Moreover, we shall send you the results, which may help you to better evaluate your professional position and highlight your most-valued skills and competences. Finally, we will invite five Alumni per country to participate in a regional workshop with representatives of the professional sector in Cambodia, China, Indonesia, Mongolia, Thailand and Vietnam.

The survey will take you around **10-15 minutes to complete**. Please allow enough time as you cannot re-enter the survey. All responses are completely **confidential**. While filling the questionnaire, we ask you to pay attention to the questions – either closed choices or open boxes - this will allow us to identify the specific characteristics of your professional experience.

Thank you very much for your time,

With kind regards,

The ASK Asia team
www: askasia.culs-prague.eu

Join us at our Facebook group: ASK Asia

DEMOGRAPHIC DATA

Your age is:

20-25 31-35
26-30 36 or over

Your gender is:

Female Male

Which of the following best describes the area (hometown/workplace) you come from?

U b R
r u u
b r r
a b a
n a l
S n
u

What is your nationality?

What is the country of your home university? (Home university sending you to the Erasmus Mundus programme / University)

STUDY PROGRAMME

Which EM programme did you participate in?

Bachelor's
Master's
Doctoral
Post Doctoral

Funded by Erasmus Mundus project:

Eura	Lotu	Lotu
sia	s I	s III
Eura	Lotu	IMR
sia 2	s II	D
Agri	Mov	Tech
sMu	er	no II
ndus	Area	EM
Expe	s	ME-
rts I	PAN	East
Expe	ACE	othe
rts II	A	r:
Expe	GAT	(ple
rts	E	ase
III	Tech	spec
MAH	no I	ify)
EVA		

In which year(s) did you study within the EM programme?

For how long did you study / conduct research within the EM programme?

up	10	24
to 5	mon	mon
mon	ths	ths
ths	18	36
6	mon	mon
mon	ths	ths
ths		

In which country did you study in Europe? (more options are possible)

What was your field of study in Europe? (Mark just one answer)

Water		
manag		
ement		
Manag	in	Landsc
ement	agricult	ape
of	ure	archite
natural	Food	cture
resourc	science	and
es	s	plannin
Animal	Rural	g
science	develo	Biotech
s	pment	nology
Crop	Agricul	Engine
science	tural	ering
s	econo	Other –
Sustain	mics	Please
able	Forestr	specify
develo	y	
pment		

Why did you decide to study in Europe through an EM programme?

Acade	univers	study
mic	ity	progra
level of	Availab	mme
exchan	ility of	Reputa
ge	your	tion of

Erasmus
 Mundus
 Multiplex

degree
 opportunity
 to get
 scholarship

Possibility of
 living
 and
 studying in
 Europe

Why did you choose the particular country/countries where you studied? (Please mark the most important one)

To get knowledge about the country
 (culture, history, etc.)
 To improve language skills

Lower costs of living
 Offered by your university
 Interest in particular university

Recommended by your employer
 Recommended by
 schoolmate/tutor/friend...

The reason why you chose the particular European university for your studies was: (Please mark one the most important)

Offered by your university
 Ranking of the university
 Offer of the study programmes at the
 selected university

Recommended by
 schoolmate/tutor/friend...
 Recommended by your employer
 Found on websites

Specific working group/teacher/tutor
 Research activities of specific university

Had you participated in any study programme / work / research abroad before the EM exchange?

No

Yes

Please, specify the country:

For how long?

< 3 months
 3 – 6 months

< 1 year
 1 year

Did you gain any professional experience during your study programme in Europe?

No

Yes, volunteer work

Yes, a student job

Yes, training / internship

Did you do any internship during your course of studies in Europe? (This does not refer to team projects, practical courses, etc.)

No internships

Yes, mandatory internship(s)

Yes, voluntary internships(s)

LEARNING OUTCOMES

Did any of these language/s improve thanks to your studies in Europe?

English
 German

Italian
 Spanish

Czech

What is your personal appreciation of the European quality of teaching and learning? (1 is the best and 5 the worst)

	1	2	3	4	5
The scientific level of the teachers					
The didactic level of the teachers					
Active learning: work on case studies, group work, surveys					
Quantity and quality of practical training					
Academic facilities/IT/campus/laboratories etc.					
The relation with the professional sector/courses given by professionals					
Opportunities for doing internships					
Relations with academic staff (open to students, trying to solve problems, help with studies...)					

How would you describe your integration into the host society?

Perfect, without problems

Good, some little problems

Bad, I had problems

What kind of problems did you have?

Economic barriers
Language barriers

Unfriendly people
Racism

Cultural differences

How did the following skills and competences develop thanks to your studies in Europe? (Rank: 1 improved, 3 remained the same, 5 worsened)

	1	2	3	4	5
Technical know-how					
Oral and written communication					
Planning and organisation					
Capacity to work in a team					
Time management					
Computer skills					
Language skills					
Research skills					
Ability in problem solving					
Independence					
Self-confidence					
Ability to make your way through					
Responsibility					
Interaction with other people and cultures					
Capacity for critical and self-critical thinking (asking questions)					
Capacity for analysis and synthesis					
Capacity for applying knowledge in practice					
Capacity for generating new ideas (creativity)					
Capacity to adapt to new situations					
Capacity to learn					
Decision-making					

Did you come back directly to your country after your EM experience?

Yes

No

Why did you not come back directly to your country after your Erasmus Mundus experience?

I applied for another scholarship for a higher level of education

I started to work in Europe
I married in Europe

WORK

Did you work before EM?

No

Yes

Before staying in Europe I worked in:

The same organization in same sector
The same organization in different sector

A different organization in same sector
A different organization in different sector

Are you working now?

Why are you not working?

I am on maternity leave / sick leave

I am on holiday

I am searching for a job

For how long have you been searching for a job?

< 3 months
3 - 6 months

< 1 year
1 year

Is this your first position after the EM scholarship?

Yes

No

Field of your current employment:

Water management
Management of natural resources
Animal sciences
Crop sciences
Sustainable development in agriculture

Food sciences
Rural development
Agricultural economics
Forestry
Landscape architecture and planning

Biotechnology
Engineering
Other:

Please specify job sector:

Private sector

Public sector (Universities, Ministries,
National Agencies etc.)

NGO

Please describe your position in the company:

Executive Employee
Academically qualified employee with a moderate management function (e.g. project manager)
Academically qualified employee without any management function
Qualified employee

Ordinary employee (e.g. salesperson/secretary)
Freelancer
Self-employed
Self-employed with incentive type contract
Public servant at a higher level
Public servant at an upper level

Public servant at a lower/middle level
Research assistant
Trainee
Volunteer
Labourer

Details about the employer:

Name of the company:
Address:
Section:
Website:
Contact person (boss or human resources manager):

How did you find the job? (Just 1 option)

Advertisement
I was approached by a company (head-hunter)

I applied at selected company
Personal networks
Networks from the EM stay

Networks of the home university
Back to previous job

How long were you looking for your job??

Already arranged before the return
less than 1 month after the return

less than 3 months after the return
less than 6 months after the return

less than 1 year after the return
more than 1 year after the return

What are the skills and competences which your job requires the most? (Rank 1 to 5):

(Rank: 1 the most required, 5 not required at all)

	1	2	3	4	5
Technical know-how					
Oral and written communication					
Planning and organisation					
Capacity to work in team					
Time management					
Computer skills					
Language skills					
Research skills					
Ability in problem solving					
Independence					
Self-confidence					
Ability to make your way through					
Responsibility					
Interaction with other people and cultures					
Capacity for critical and self-critical thinking (asking questions)					

Capacity for analysis and synthesis					
Capacity for applying knowledge in practice					
Capacity for generating new ideas (creativity)					
Capacity to adapt to new situations					
Capacity to learn					
Decision-making					

Is there demand for a job with your specialization in your country?

Yes

No

I do not know

Do EM graduates / alumni have an advantage in comparison with other graduates (who did not study in Europe) as follows?

	YES	Uncertain	NO
Higher salary			
The possibility of a shortened period for finding a job			
Better social status			
More professional networks			
Career advancement			

Did your stay in Europe help you find a job/develop your career?

Strongly Agree

Neither Agree nor Disagree

Strongly Disagree

Agree

Disagree

During your EM studies, have you collected important contacts for your professional life?

No

Yes, with academic staff

Yes, with classmates

Yes, with companies (private sector)

Yes, with local authorities (public sector)

Yes, with NGO

Are you satisfied with your position in the labour market?

Yes

No

Are you satisfied with your position in the labour market?

Yes
No

What you consider to be the most important factor influencing your employability

Are you satisfied with your position in the labour market?

Yes

No

**What you consider to be the most important factor
influencing your employability**

