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Brain Drain vs Brain Gain: How can Brain Drain in Kenya be Reversed to Brain Gain?

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Declaration of Authorship

I hereby declare that I have written this thesis without any help from others and without the use of documents and aids other than those stated and that I have mentioned all used sources and that I have cited them correctly according to established academic citation rules.

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Abstract

Kenya is considered to be among many developing countries, where highly skilled people are migrating to developed countries to make a fortune. For this reason, there was a need to look at the situation in Kenya. Therefore, a study based on an exploratory research was carried out, where seven Kenyan students in German Universities participated. The aim of the study was to provide the first insights on the recent debate of brain drain and brain gain in Kenya in terms of what could be done to reverse brain drain into brain gain. For a broader understanding of migration and how this relates to development, the concepts of brain drain and brain gain have been introduced.

Some of the factors that contribute to brain drain in Kenya as mentioned by the respondents include, cost of tertiary education and factors related to demand and supply for labour, while technological advancement and the availability of research and learning materials in developed countries play a role in attracting Kenyan students abroad. However, Kenyan emigrants are considered to contribute in poverty reduction through sending money (remittances) home to their family members and friends, to finance basic consumption, education, acquired healthcare services and micro enterprises. Also, remittances are a source of foreign exchange currency that finances the imports of goods and services in Kenya. According to the respondents, there is a need for the government of Kenya to intervene in higher education and in the labour market, for instance, through reduction of tuition fee, providing adequate learning materials and improving security standards in learning institutions, while in the labour market, the government could create jobs, increase wages, and enable Kenyans to develop their careers. These are some of the measures that could reverse the trend of brain drain to brain gain in Kenya.

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List of Abbreviations

CBK	Central Bank of Kenya
FDSE	Free Day Secondary Education
GoK	Government of Kenya
IMF	International Monetary Fund
IOM	International Organisation for Migration
ICT	Information and Communication Technology
IT	Information Technology
KCA	Kenyan Community Abroad
KDA	Kenya Development Associates
KNSB	Kenya National Bureau of Statistics
Kshs	Kenya Shillings
LDCs	Least Developed Countries
MoE	Ministry of Education
NRK's	Non-Residents Kenyans
NRW	North Rhine-Westphalia
OECD	Organisation for Economic Co-operation and Development
PKO	Persons of Kenyan Origin
UK	United Kingdom
UNESCO	United Nations Educational, Scientific and Cultural Organisation
UPE	Universal Primary Education
USD	United States Dollar
WENR	World Education News & Reviews

1. Introduction

Literature of brain drain (“the international transfer of resources in the form of human capital, i.e., the migration of relatively highly educated individuals from developing to developed countries” (Beine et al., 2003, p. 2) has indicated that there is a substantial loss (above 30 per cent) of highly skilled individuals from Africa to the developed countries (see for instance, IMF, 1998; OECD, 2012 and Oyelere, 2007). Oyelere (2007), for instance, indicated that Kenya has a significant skilled emigration rate of 35 per cent. Furthermore, latest studies have indicated that migration rate of highly qualified (persons with a tertiary education¹ qualifications) from Kenya to developed countries is increasing. According to a global profile of diasporas, the share of highly qualified Kenyan who migrated to OECD countries increased from 30.3 percent in 2000 to 46.6 percent in 2005/06 (OECD, 2012). Kirui² (2005) argued that “when people who are highly skilled leave the country, or those who have acquired high skills do not return, it poses serious brain drain, robbing the country of essential human capacity to help in socio-economic development” (Kirui, 2005 quoted in Siringi/ Kimani 2005)³ which might affect the level of human capital and the development processes in Kenya.

International Organisation for Migration (IOM) defines diaspora as “members of ethnic and national communities who have left, but maintain links with their homelands” (Republic of Kenya, 2014, p. 8) while according to Republic of Kenya diaspora constitutes Persons of Kenyan Origin (PKO) and Non-Residents Kenyans (NRK’s) (ibid.). The number of Kenyans within a diaspora is estimated at three million, which is approximately 7.5 per cent of the total population of Kenya. Furthermore, the Kenyan diaspora constitutes of highly and low educated (persons without tertiary education qualifications) Kenyans. In this case, Kenyans are not only migrating to developed countries but in the neighbouring countries as well. In 2010, 26 percent of Kenyans migrants went to Tanzania while Uganda recorded seven per cent of Kenyans migrants in the country⁴ in the same year. Considering the outflow from Kenya, it can be argued that there are possibilities that, the socioeconomics in Kenya is negatively affected, since people who are needed to deliver key public services as well as drive

¹ Tertiary education is defined as „all post-secondary education, including but not limited to universities.” (World Bank, 2015)

² Ms. Kirui is the former permanent secretary at the ministry of labour and human resources development in Kenya

³ See Siringi & Kimani (2005) in Daily Nation. Retrieved 09.05.2015, from, <http://www.afrika.no/Detailed/11015.html>

⁴ See, Interactive Map on Migration (2012). Retrieved 09.05.2015: <http://www.imap-migration.org/index.php?id=488>. Retrieved

economic growth and articulate calls for greater democracy and development are migrating to developed countries. Kenya is experiencing a considerable net emigration.⁵

Referring to OECD data, the rate of emigration for Kenya was ranked at position 144 out of 203 countries in the world and 21 out of 47 in the region (OECD, 2012⁶). For both cases, emigration involved both highly and low educated people. Moreover, Kenya turned out to be among the top fifties of the countries with the highest brain drain i.e. position 44 out of 157 countries in the world. The results signify a remarkable loss of human capital from Kenya. However, the emigration trend for low educated people to OECD countries is decreasing as the total percentage of Kenyans living in OECD countries decreased from 27.1 to 21.5 percent (ibid.). According to these results, it can be assumed that highly educated people have more opportunities to migrate to OECD countries than the low educated people.

Considering the statistics of the emigrant population in Kenya, there is a need to find out what the brain drain really means for Kenya and how the brain drain might be reversed into a brain gain (immigration of highly educated people, mostly in developed countries). For instance, how do policy makers consider this situation? Are there policies to make Kenya attractive for the emigrants and the economy? What are the perceptions of the highly educated people on the debate of brain drain and brain gain in the country? For this reason, the following research question will be posed: How can brain drain in Kenya be reversed to brain gain? The goal of the study is, therefore, to provide first insights to this debate. The research question is extremely relevant for Kenya since Kenya is, as already mentioned, considered as a developing country with a large efflux of people migrating to developed countries to make a fortune. However, Kenyan migrants remain in contact with their family members in Kenya and they also support them in different ways such as sending them money (remittances).

The government of Kenya (GoK) recognizes the enormous potential skills, knowledge and expertise by the Kenyans abroad, that need to be tapped to positively contribute to the growth of Kenya (Republic of Kenya, 2014). It has pointed out the importance of remittances in the way they contribute to development (ibid.) as the trend of inward remittances is increasing. For instance, in Sep. 2015, the amount of inward remittances increased by 0.9 per cent to USD. 128.4. million in 2015 compared to USD. 127.4 million in Sep. 2014 (Central Bank of Kenya (CBK), 2015). Additionally, the government supports that Kenyans abroad are contributing to the development processes through technology transfer.

⁵ Net emigration means that the “departures of citizens exceed arrivals of foreigners” (IOM, 2015:17).

⁶ See, OECD (2012). Connecting with Emigrants. A Global Profile of Diasporas. Retrieved 09.05.2015, from <http://dx.doi.org/10.1787/9789264177949-en>.

The objective of this paper is to contribute to the general brain drain and brain gain debates through a small-sized case study on Kenyan students in Germany that involved the use of open ended questions and in-depth interview in order to learn about experiences and perceptions on migrant's development efforts in Kenya. The goal, as mentioned earlier, was to provide first insights (through students' point of view) to the topic of brain drain and brain gain in Kenya since this is a topic that is largely unresearched.

The paper is organized as follows: in the second section, the concepts of brain drain and brain gain and the methodology will be explained. The former will give a thorough introduction of the recent brain drain and brain gain debate while for the latter a description of the research design will be given. Section three will describe interview findings i.e. how the students have responded including their views and suggestions to the brain drain and brain gain debate. Further, in section four, there will be a discussion of the findings of the study that will relate the results to the concept of brain drain and brain gain and to the theories discussed in this paper and finally a general conclusion will be drawn.

2. Theoretical Framework and Methodology

In the following section, a closer look on theories that will be applied to give some background information on the research question of this paper will take place. Moreover, the theories are expected to provide a broader understanding of brain drain and brain gain phenomenon.

2.1 Concept of Brain Drain and Brain Gain

For decades, migration researchers have debated about the loss encountered by developing countries when highly qualified and skilled ("people with a university degree or equivalent skills or training (Lindley, 2012)) people leave their country. Migration literature (especially in the 1960s) assumed that when the highly educated leave their countries (for instance, to study or for employment), their countries of origin will lack people who can bring forth socio-economic and political developments. This phenomenon is assumed to contribute to "mitigation of innovation and development" (Candan & Hunger, 2013). In this case, the source countries are assumed to be 'robbed' of essential human capacity. Bhagwati and Hamada (1974) argued that, brain drain is detrimental in the source countries because it has negative externality for the people who are left in source countries (see also Ionescu & Polgreen, 2008). Scholars of migration and development (for instance, Bhagwati, 1976) assume, that there should be reimbursement of education costs to developing countries by the governments of the host countries to compensate for the 'loss' of skilled citizen. Some developing countries

such as Malawi are considered to face severe impacts of emigration of skilled health workers and professional clinical staffs (Vidal, 2012). Miyagiwa (1991) has presented a model of brain drain that shows why advanced countries attract the best professionals from the developing countries. The researcher indicated that source countries possess imperfect information about the skills of foreign-trained students, and therefore, they only offer wages based on the average quality of the returnees, while the host countries offer commensurate wages because they know the real abilities of the students who are studying in their countries. This situation may affect remigration decisions. In addition, Glennie & Chappell (2010) have mentioned five factors that make skilled people to migrate to other (developed) countries. These factors are “wage, employment, professional development, network and socioeconomic and political conditions”⁷ According to the researchers, in some cases, skilled migrants migrate to countries where wages are higher compared to their countries of origin. For instance, “a software developer from India can roughly triple his or her real earnings in the US” (Clemens, 2009 quoted in Lindney, 2012). Students are assumed to give employment a high priority as to why they emigrate (Glennie & Chappell, 2010). Further, in order to develop careers and increase experiences, expatriates are more likely to give professional development high priority to migrate than under graduates (ibid.). In addition, networks are assumed to make people to realize the possibility to migrate and also to connect people to their family members abroad thereby inducing emigration. According to Glennie and Chappel (2011) socioeconomic and political factors can also play a role as to why skilled migrants leave their countries. They argue, that the situation based on these phenomena at the source country may influence individuals to migrate to other countries, for instance as asylum seekers or refugees. These are some of the factors that may contribute to foreign-trained students leave their country or to remain in the host countries. In some cases, skilled migrants from developing countries “seek an environment with similarly talented peers.” (World Bank, 2010, p. 191). For instance, centres of excellence such as Silicon Valley have drawn many talented people from around the world.

However, there is a substantial body of theoretical literature that stresses the positive effects of brain drain as Sriskandarajah (2005) mentioned that “some of the simplistic assumptions made about brain drain may not actually hold⁸” since brain drain does not always have negative effects. It is assumed, that when skilled migrants in the host countries establish

⁷ see Glennie and Chappel (2010). Retrieved 11.09.2015, from <http://www.migrationpolicy.org/article/show-me-money-and-opportunity-why-skilled-people-leave-home-%E2%80%94-and-why-they-sometimes-return>

⁸ see Sriskandarajah (2005). Retrieved 11.10.2015, from <http://www.migrationpolicy.org/article/reassessing-impacts-brain-drain-developing-countries>

themselves and also reach high position in their careers, they contribute to development in their home countries leading to a situation of brain gain (Candan & Hunger, 2013). Additionally, Sriskandarajah argues, that those who emigrate had no jobs or they were earning low wages in their home country, therefore when they leave, the rate of unemployment decreases in their home countries (Sriskandarajah, 2005). For example, Philippines government supports qualified unemployed workers to find jobs abroad (ibid). In some cases, “the departure of skilled workers is compensated for the arrival of skilled workers from another country”⁹ According to Mountford (1997) when people are offered the possibility to migrate, they are likely to invest in education thereby increasing the level of human capital in a country. Mountford argues that because these people are given the possibility to migrate to developed countries where returns for human capital are higher than in their countries, they will put more effort to pursue higher education. Similarly, Beine et al. (2001) found that because education is valued across the world, (developing) countries will allow people to migrate in order to increase the population of academically qualified persons. This shows that there is a positive link between migration opportunities and the proportion of individuals who decide to invest in education (ibid.). Lindley (2012) argues that “Education and the acquisition of skills have intrinsic benefits, as well as positive effects on wellbeing, health and citizen participation” (p. 1). She assumes that emigrants are a “progressive force politically, shaping public debates, articulating and implementing political reform and innovation” (Lindley, 2012, p. 4). Recent studies on migration have shown that knowledge transmission through highly skilled persons in developed countries, has contributed to the increasing returns in growth in developing countries.

Apart from the human capital factor, highly educated and skilled migrants in developed countries may invest in their home country and most important, they act as “bridges” between sending and receiving countries through “providing access to markets, sources of investments and expertise” (World Bank, 2010, p.193). Kenyan emigrants for instance, help to market Kenyan tourism industry abroad (Kinuthia, 2013). India is a prime example of how skilled emigrants can contribute to development in their home countries of origin (Hunger, 2004). Hunger has argued that, Indian skilled returnees have contributed to remarkable upswing “in the IT-sector providing new jobs in India with potential positive spill-over effects for its overall economy.¹⁰” Moreover, Indian migrants transferred entrepreneurial skills from the United States to India that helped to create an innovative business landscape in India

⁹ see ibid.

¹⁰ See Hunger, 2004, p. 3. Retrieved 09.02.2015, from http://www.berlin-institut.org/fileadmin/user_upload/handbuch_texte/pdf_Hunger_BrainGainIT.pdf

(ibid.). Importantly, migrants contribute in the development in their home countries through remigration. According to Hunger (2002) the elites from developing countries can play a significant role in the development processes if they return to their home country or through creating transnational networks. Hunger therefore argues that the policy makers have the role to initiate and implement incentives to encourage remigration (ibid.). Returnees share the knowledge accumulated in developed country with those people who were left in their home countries thereby increasing the fraction of human capital in their country. Additionally, re-migration of highly skilled persons also contributes to financial capital for investments. This is due to the fact, that highly educated migrants are able to acquire better paying jobs which will enable them to accumulate higher levels of capital than people with a low education level (Hunger, 2002). Emigrants may also provide business connections and expertise for public and private sectors through formal and informal means (O'Neil, 2003). Ghanaian returnees for example, are considered to contribute to the transfer of know-how and technology between Germany and Ghana which has helped to expand the trade relationship between both countries. (Schmelz, 2009)

In addition, migrants in developed countries contribute to poverty reduction in their home countries through sending money (remittances) home to family and friends. The literature of migration and development indicates that the money sent back in the source countries by the migrants helps to support family members (for instance, buying food, paying school fees and medical bills) thereby contributing to better living standards and poverty reduction. Kinuthia (2012) indicated that Kenyan abroad have contributed to activities such as drilling of bore hole so that people in the communities can have water and they support food and disaster management programmes. Remittances also play an important role in providing foreign exchange currency that finance import of goods and services. India for example, is the largest recipient of remittances worldwide with over 70 billion dollars in 2014, followed by China and the Philippines (World Bank, 2015). Migration and development scholars argue that political remittances could be the transfer of democratic values that improve human rights (Dannecker, 2005). Furthermore, migrants could also contribute to the development in home countries through social remittances (“the exchange of ideas and behaviours between places: symbols, values, norms, identities and experience,” Levit & Lamba-Nieves (2011) cited in Velez-Torres & Agergaard 2014, p.118)) and political remittances (the transfer of democratic ideas and practices to countries of origin) Most importantly, highly educated people outside the country contribute more essentially to the development of institutions in their home countries “through contribution to the transformation of the public and private sectors” (World Bank, 2010, p. 193). Also, economic skills and know-how of migrants could contribute to economic development of home countries.

2.1.2 Neo Classical Economics Theory

In neoclassical economics theory, international migration is caused by geographical differences in supply and demand for labour (Massey et al. 1993). This assumes, that labour need to be reallocated from rural and remote areas to urban and industrialized areas (i.e. internally and internationally (de Haas, 2010). Reallocation of labour in the country and beyond the borders is assumed to contribute to a situation of balanced growth and developments (ibid.). The model of neoclassical economics theory, supports that the movement of labour will reduce labour scarcity thereby “coinciding with a higher marginal productivity of labour and increasing wage levels in migrant sending countries” (ibid., p. 231). It is perceived that this form of migration is a “form of optimal allocation of production factors to the benefits of both sending and receiving countries” (ibid., p. 230).

Differences in wage and employment conditions between the countries and migration costs will make people to migrate from low to high wage countries (Massey et al. 1993). The researchers argue that “countries with a large endowment of labour relative to capital have a low equilibrium market wage, while countries with a limited endowment of labour relative to capital are characterized by a high market wage” (ibid., p.433). Therefore, it is expected for workers from the developing economies to migrate from their countries where wages are low to developed economies for higher wages. The same applies to the flow of investment capital. In this case, it is expected that capital-rich countries will invest in capital-poor countries. Furthermore, with regard to human capital, highly skilled workers will move from capital- rich to capital- poor countries “in order to reap high returns on their skills in a human capital scarce environment” (ibid., p. 433). In the neoclassical economics model, it is perceived that, once the wage levels in both source and host countries converge, migration will cease (de Haas, 2010).

Migration in the 1960s was seen as a strategy for achieving development. In early literature of migration and development, it is assumed that leaders in developing countries were encouraging migration since it was assumed that migrants would contribute to nation building through financial resources (remittances), investments and providing new ideas. Therefore remigration of highly educated and skilled people to their home countries in neoclassical economics theory is seen as an important incentive to the developing countries (see for instance, the case of India), since it is supposed to contribute to their development. In addition, it is perceived that migrant contributions could accelerate spatial diffusion of modernization in developing economies. In this case, developing economies, were expected to follow “the

same path of modernization, industrialization and rapid economic growth as many western countries had gone through” in order to achieve development (de Haas, 2010, p. 231).

However, the neoclassic economics model assumes that individuals are rational actors who are interested in income maximizing. It is also assumed that decisions to migrate are made by individuals and, hence, not collective decisions (Massey et al. 1993). These assumptions have raised a variety of critiques of neoclassical economics theory since, in many cases emigration is a collective decision from family members, community or organizations. Also, individuals in many cases emigrate to acquire knowledge that will help them to become active members in their societies and in their countries in general.

2.1.3 New Growth Theory (also known as Endogenous Theory)

Basically, the model of new growth theory is closer to economic theories. However, new growth theory can be applied to provide some background information on the flow of human capital and how the trend of brain drain phenomenon can be reversed to brain gain. The theory is pessimistic about the role of migration in development. It assumes that, when skilled people emigrate from their country, decrease in income level and long-run growth rate is likely to occur. Furthermore, loss of human capital is considered to be detrimental to socio-economic growth in source countries as the majority of those who migrates from developed countries are in some cases, those who have acquired secondary or tertiary education qualifications and are more skilled than those who are left behind (Kim and Hague, 1995). Lack of education opportunities makes students and highly skilled persons to emigrate from their countries for better education opportunities, better working environment and better wages in developed countries.

The model of new growth theory emphasizes that human capital is an essential factor of production and increasing returns to knowledge development. It assumes that the fraction of human capital in a country is a major source of income differences across countries (Romer, 1986, 1987, 1990). The model also perceives that economic growth results from increase in new knowledge and enhanced technology (Cortright, 2001). In new growth theory, technological progress plays important role in economic growth as it is seen as a product of economic activity on the one hand, and on the other hand knowledge and technology are perceived to be characterized by increasing returns that drive the process of growth (Cortright, 2001). This explains why many nations are shifting from a resource based economy to a knowledge based economy as “the economic processes which create and diffuse new knowledge are critical to shape the growth of nations, communities and individual firms” (ibid. p.2). Knowledge in new growth theory is assumed to grow without bounds. Romer

(1987) argues that investing in knowledge creates natural externalities. For instance, if one firm creates new knowledge, it will create positive external effects on the production possibilities of other firms because knowledge cannot be kept secret or patented. For these reasons, developing nations are required to invest in knowledge and technology in order to create education opportunities for economic growth.

2.2 Methodology

Emigration of highly educated people and how this relates to development in Kenya is largely unresearched. This might imply that little has been done to find out how these phenomena relate to each other. Therefore, the methodology applied for this study is based on an exploratory research since the study aim to gain first insights and familiarity (Lynn University¹¹, 2015) with the debate of brain drain and brain gain in Kenya. This means that the study intends to provide only a part or insights into the research subject. Moreover, the study has not the claim to picture a representative study of Kenyan emigrants but to provide “illumination, understanding, and extrapolation” (Golafshani, 2003, p. 600) to the debate of brain drain and brain gain. Furthermore, the method has an element of a qualitative research approach, since the study aims to produce “findings not arrived at by means of statistical procedures or other means of quantification” (Strauss & Corbin, 1990, p. 17 quoted in Golafshani, 2003, p. 600). The importance of this study is that it can mark an indicator and suggestions for following in-depth studies. Therefore, the responses are expected to play a role in enriching brain drain and brain gain debates in general and not to provide generalizable results. Also, the study will contribute to the already existing studies in the aforementioned debates.

Data collection was done during June, 2015. This involved carrying out one face to face interview and using open ended questions for six participants. In total, respondents were seven Kenyan Students in German universities¹². They included six females and one male. Students were considered a productive sample to answer the research question (Marshall, 1996) since, with regard to the research topic, it was important to know how students consider migration and development in Kenya. All respondents were asked the same questions and they were structured in the same order. Like mentioned earlier, these questions were open ended and not multiple choice questions. For the self-administered interviews, questionnaires were sent to the respondents via email. Also, respondents were provided with a short intro-

¹¹ see Lynn University. Retrieved 11.10.2015, from <http://lynn-library.libguides.com/researchmethods/researchmethods8>

¹² Respondents came from University of Cologne, University of Münster and University of Osnabrück

duction message¹³ to the research subject (about half a page). For the face to face interview, I started the interview by reading the introduction message to the respondent. The introduction message was “to encourage people to take part” (Phellas et al., 2011, p. 192) and to prepare them for the questions. The face to face interview was recorded and later transcribed for the analysis. After receiving the responses from the other participants, they were analyzed using inductive approach. This implied deriving ideas and themes from the interview data (Schulz, 2012). Six coding categories were defined. These include: Drivers of out migration for Kenyan students, The Role of German Universities and Labour Market System, The Role of Education Quality in Kenya, Job Prospects for the Highly Educated in Kenya, Readiness to Re-immigrate to Kenya, and The Role of the GoK in Higher Education and in the Labour Market. Coding categories were more abstract in order to “potentially include all of the relevant examples regardless of the superficial differences” (Gorden, 1992, p. 1). According to Gorden, reliability of coding can be provided by making sure that coding category fit the information gathered and should be clear enough defined to be mutually exclusive¹⁴ and all-inclusive¹⁵” Analysis of the contents followed, thereby identifying the key words, sentences and themes that were related to the questions asked. Also, the relationship between these words and the main responses was explored to find out their commonalities and relevance to the topic. Concrete examples were identified and assigned to the relevant coding category. For instance, high cost of education in Kenya was signed to the coding category: Drivers of Out-Migration for Kenyan Students. A further exploration of the data was carried out, this time identifying new emerging and overarching themes. These were coded as closed codes (Schulz, 2012.).

It was extremely important to ensure that ethical considerations were taken care of throughout the study, as they are extremely important, while carrying out the research and in reporting the collected data in social science and in other disciplines. This is required in order to reduce the potential harm that might occur to the participants during and even after the study. It was therefore important for me to ensure that participation of the students was voluntarily. Also, participants were informed about the purpose of the study as well as its importance and the possible consequences. Also, participants were informed that the collected data was to provide information for the research question of this thesis. Furthermore, to ensure confidentiality, I avoided revealing the participants real identity while reporting the results, and instead, pseudo names were used.

¹³ Introduction message is included in the appendix

¹⁴ Mutually exclusive means that “each category in the set making up the dimension must be defined clearly enough so that concrete example could not fall into two categories at the same time” (Gorden, 1992, p. 1)

¹⁵ All-inclusive means that “the set must include the entire range of the response categories in a particular dimension (ibid.)

Like in many researches, there were challenges and limitations that were encountered during and after the data collection. Some of the challenges included limited time to collect the data as I had one month for data collection. Another challenge was the geographical dispersion among the respondents. It was not possible to meet all my participants personally, and therefore, I had to first talk to them through phone calls in order to ask them if they were willing to assist me in my research, and to inform them about the research topic. Also, it took some participants longer than I was expecting to answer the questions and to send me their responses, which had effects on the time I needed to analyze the responses and to start writing my thesis. Another challenge occurred while analyzing the responses. It was extremely challenging to find out which information was most relevant to offer background information on the research question, since there are no correct answers to the interview questions (Marshall, 1996). Furthermore, the sample size was extremely small to produce any generalizable results.

However, despite the above mentioned limitations, the information gathered created a basis for a more extensive study. Furthermore, this study helps to identify critical points that require consideration for the future research. For instance, it is important to have adequate time to carry out the research, and to study a larger population of interest in order to come up with representative quantitative data. Also, this method of data collection was important in order to identify the most appropriate research design and data collection methods for in-depth studies.

3. Results

In the following section, a description of the obtained findings for this research will take place. This will involve descriptions on how students responded to giving reasons which drive them out their country and local universities to study abroad. Also, the role of German tertiary institutions and labour market system and the way they attract international students. Furthermore, students' perceptions on higher education in Kenya in terms of quality in general and the labour market in general. Furthermore, the suggested means of intervention for the GoK in these fields will be described.

3.1 Drivers of Out-Migration for the Kenyan Students

Firstly, there was the need to find out what is driving Kenyan students out of the local universities and also to find out what is attracting them to study in German universities and labour market. In the first question students were asked: *would you tell me why you decided to*

*study/work*¹⁶ in Germany? For this question, several factors were mentioned. According to the participants' responses, study fees was the most mentioned answer to this question. On the one hand, students mentioned that, costs related to education in Kenya were very high. (For instance, a student in a public university in Kenya is required to pay an average of Kshs. 26,000 annually.¹⁷ In context to the average minimum wages for instance, in urban areas which go up to between Kshs. 13,592 and Kshs. 17,199 and in the agricultural sector (where wages are very low) these range between Kshs. 6,780 for the skilled labourers and Kshs. 5,436 for the unskilled labourers (Business Daily, 2015, Dec. 1) it might be difficult for the students to finance their education, accommodation, and their living, and still carry on with their studies. Apart from tuition fees, respondents mentioned that costs for equipment, transport, and learning materials are high in Kenya. One respondent mentioned that buying equipment for the research in her field of study (natural science) is very expensive, and without the equipment it is hard for her and the other students to carry out the research.

Also, some respondents mentioned that if someone does not achieve the required grade to join a public university, it could be very expensive to join a private university in Kenya. For instance, tuition fee in a private university such as Strathmore University in Kenya was Ksh. 91,870 per year in 2008/2009¹⁸ (this is approximate to € 800). It could be difficult for them to finance their education especially if students do not have jobs. Therefore they opt to look for other means on how and where they can have access to affordable higher education for instance, applying for scholarships or migrating to other countries. For some of the Kenyan students, to migrate to other countries is their alternative. One respondent mentioned that:

“After my high school education, I did not reach the required points to join public university, and, hence, to go to a private university would have cost me a lot” (Respondent 3).

Furthermore, lack of technological advancement in tertiary institutions is also a factor that makes students to leave the country to study abroad. During the first interview, a student explained how important it is, to have equipment in the university especially in the department of natural science, since the availability of technical equipment contributes to better and innovative research that might lead to the development in the country. The respondent mentioned that equipment for the chemistry department is very expensive but it is critical for the re-

¹⁶ During the time of data collection, all the respondents had jobs. Most of them are part-time employed

¹⁷ see Business Daily. (2014, April 13). *University Tuition Fee*. Retrieved 11.2.2015, from <http://www.businessdailyafrica.com/University-tuition-fees-set-for-first-review-since-1995-/-/539546/2278362/-/jrqqajz/-/index.html>

¹⁸ see Strathmore University. Retrieved 11.04.2015, from <http://www.strathmore.edu/pdf/sedc-fees.pdf>

searchers because they support development processes. If there is no equipment in the country, it needs to be imported. Importing equipment from other countries might be a long process that cost time and financial resources, and it could delay the study and research processes. The respondent argued that without the availability of technology in the university, carrying out research is impossible. For this reason, the student wanted to study in a technically advanced country like Germany where equipment was available.

“I did not want to do a research in an area where there is no equipment (...) I wanted to go out of Kenya, get out of the country and study somewhere else (...) in the University of Nairobi if you needed a spare part or equipment you would wait for ages” (Respondent 1).

According to the participants’ responses, costs related to education and lack of technology advancement are not the only factors that make students to leave Kenya to study abroad. Other factors such as possibilities to study in Germany and family influence also played a role in this issue. Two respondents mentioned that they had the opportunity to study in Germany and that is how they came to Germany for studies. Another respondent mentioned that she was influenced by relatives and family members who were already in Germany and therefore she decided to join her relatives in Germany and to study in the country. One respondent belongs to a missionary congregation which sent her to Germany for a mission experience. In this case, the respondent did not emigrate due to any factors that are related to higher education in Kenya. However, the respondent decided to study in Germany and still carry out her missionary activities. Earlier before the respondent moved to Germany she completed her secondary school in Kenya and therefore, she is aware of the education system and brain drain situation in Kenya. To the question why she came to Germany, she responded that:

“Belonging to a missionary congregation, I happened to be sent here (...) after which I decided to study here in order to be in a position to learn the language better. Having studied here I find it helpful first to apply the knowledge I gained in this country, before I get a transfer to a different country, be it Kenya or another one” (Respondent 5).

3.2 The Role of the German Universities and Labour Market Systems

The second question was set to find out how students consider German universities and labour market because, apart from studying, all the respondents had jobs during the time of data collection. For this reason, students were asked: *can you tell me about the things you find more important in Germany university/labour market?* Similarly to the earlier question, costs for education seem to play a role for this question as well. Some respondents stated that in some states in Germany such as North Rhine-Westphalia (NRW) there are no tuition fees in the universities and therefore, it is affordable for them to study in this state (six out seven re-

spondents are studying in NRW). The majority of the respondents, i.e. four out of seven, mentioned that, studying in Germany is affordable due to low or no study fee in the universities. Also, because of the availability of free internet, free studying materials, semester tickets¹⁹ and medical insurance. The policy in Germany to make the study fee in some states to be affordable, attract not only Kenyan students but students from all over the world to study in a very successful country. Furthermore, one respondent mentioned that students from different socioeconomic backgrounds have been provided with equal opportunity to have access to higher education in Germany because the government has subsidized or has abolished study fee. The respondent stated that:

“Subsidized or no tuition fees in most universities create equal study opportunities to students of different backgrounds whose financial constraints differ” (Respondent 7).

To some respondents, the availability of free learning materials such as variety of literature and free internet are important tools for their studies that enable them to study effectively and easy. Respondent 3 mentioned that:

“In German universities it is really easy to get access to learning materials for example in Libraries or in internet, where most Universities have their own websites, eg Integriertes Lern-, Informations- und Arbeitskooperationssystem (ILIAS). In ILIAS one can get access to a lot of learning materials. Another important factor is the availability of free internet in most German Universities, this makes learning easy”

In addition, students mentioned that the possibility for them to travel from one place to another within a region is cheap in Germany. This is due to the availability of the ‘semester tickets’ which they get from the universities. The tickets are important as they cut down the costs of transport enabling students to travel to different places flexibly and cheap. For instance, students can travel freely by bus and regional train to the universities and back to their residential areas. According to one respondent who is a mechanical engineering, availability of the semester ticket is one of the factors that contribute to making studies in Germany to be affordable to students. He mentioned that it is cheap for him to travel with that ticket to university and back to where he is residing. Affordable medical insurance in Germany is also an essential factor that attracts international students to study in Germany. For many students, it is a privilege to live and study in a country where they can afford to have a medical insurance. In Kenya most students and households rely on ‘out-of-pocket’ spending (to pay for the received healthcare services at the point they receive them) since many Kenyan do not have health in-

¹⁹ Semester tickets are tickets provided to students by the universities (for instance in NRW) so that they can be able to travel within the state of NRW in Germany and even across the border to Netherlands (especially for the students who are studying double diploma programmes in WWU-Münster and University of Twente) without paying transport costs.

surance (Kiplagat et al., 2013). Furthermore, the affordability of health insurance depends on someone's economic background.

Systems management at work and in the universities also plays an important role for the students as respondents mentioned that they like the way the learning and working systems are well organized in both university and at work. Also, some respondents mentioned that time management is important in order to plan for their activities and studies. Furthermore, technical advancement in Germany is another important factor that attracts students from Kenya. Respondents consider Germany as a country that is very well technically organized and full of resources, and, hence, it attracts many international students to study and work in the country. Additionally, students mentioned that the availability of student rights and the way they are protected by the law is important for the students. For this reason, students see this as an important factor for studying in Germany. Moreover, students mentioned that exchange programmes for the students (Erasmus), is an important factor. The programme creates opportunities for the students to study in other countries where they can learn different languages and cultures. Furthermore, international conferences that are carried out in German universities and in the labour market play a role for the international students as they may enable students to create networks and also acquire practical know-how.

3.3 The Role of Education Quality in Kenya

It was important to find out if the quality of (higher) education contributes to brain drain in Kenya. Therefore, students were asked to mention their views regarding to the quality of education in Kenya. Respondents had different opinions, as far as the quality of education is concerned. One respondent mentioned that the quality of education depends on the school attended. In this case, the quality of education was very good because she had an opportunity to attend a good school (this might refer to a school where learning materials were available, enough teaching staffs and the classes are not overcrowded). Another respondent indicated that the quality of education is determined by the subjects offered in school and the way they are taught. According to her, history is very poor while practical subjects such as art and craft are good and, languages are very good. The respondent added that besides the predominant European centered history in schools, there is also a need to teach African history in learning institutions in Kenya. This could explain why she considers history subject in Kenya as poor. The majority of the respondents i.e. four out seven students supports that the quality of Kenyan education in general is good.

3.4 Job Prospects for the Highly Educated in Kenya

The fourth question aimed at finding out if the outflow of Kenyan students to Germany is related to job prospects. The question reads as follows: *Can you tell me how you see job prospects in Kenya especially for highly educated persons?* Respondents mentioned that on the one hand, jobs are available in Kenya but if job seekers do not qualify enough to suit in particular jobs they apply for, they might not get a job. For this reason employment possibilities in the labour market in Kenya may depend on people's qualification. For instance, one respondent mentioned that it is important for the job seekers to get the job that meet their qualification. This will make them to be satisfied with their jobs. He stated that:

“In general getting a job in Kenya is not easy not unless one is qualified enough for a certain job. For highly educated people it's not hard to get a job, but the question is, if the person will be happy with the job that he/she has” (Respondent 3).

On the other hand, students argued that, qualification is not a guarantee for a job in Kenya even for those who are highly educated. High qualification in education might not necessarily imply that a person will be employed. In addition, some respondents argued that jobs are available but there are challenges that are facing labour market in Kenya. These challenges include: corruption, tribalism and nepotism. Students mentioned that, they see little or no prospects in Kenya due to corruption, because corruption makes it difficult to acquire jobs in Kenya. Also, respondents mentioned that low payments make students and highly educated people to be pessimistic about labour market in Kenya. This contributes to Kenyans to migrate to other countries where they can acquire better payments. Three out of seven respondents stated that payments are poor in Kenya. Some respondents mentioned that in Germany students and highly qualified people are well paid. One respondent mentioned that:

“I could be wrong but I think job prospects are very good if you are educated. Obviously, you cannot compare it with here because if you talk about salaries, the salary differences for the same job are very big even talking about the ratio of the salary you put to the life expenditure. Its okay in Kenya you can live on it but you cannot compare it with here. Here you can live well on your salary but in Kenya I am not sure” (Respondent 1).

Another respondent mentioned that the GoK is not able to nurture and “promote local talent”. This seems to create a lack of prospects in the country thereby making students to migrate to countries where they can develop their talents and career.

3.5 Readiness to Re-immigrate to Kenya

The aim of question five was to find out if students were willing to return to Kenya after completing their studies in Germany. Therefore, students were asked: *Do you intend to go back to Kenya to live and work there?* Three out of seven respondents mentioned that they do

not know if they will go back to Kenya after completing their studies, one respondent said she will stay in Germany and two respondents mentioned that they are willing go back.

Question 5b was meant to find out about the participants' preferences to stay in Germany. One respondent explained that it is not practicable for her to go back because of her family that is living in Germany. However, the respondent mentioned that she has maintained contacts to her relatives and friends in Kenya. Furthermore, she mentioned that she would like to establish networks with institutions such as universities or companies in Kenya where she can share the knowledge acquired in Germany with fellow Kenyans. She explained that:

“I have my family here but my wish will be actually to be able to have some knowledge transfer and cooperation with Kenyans. I would love that, if I could be able to establish some kind of working together like university and media working here or some companies I would like that (...) offer training and courses in Kenya but I will have to do that from here. I have my family and children here” (Respondent 1).

For the case of one respondent, she cannot make sole decision of going back, as she is in Germany for the church missionary purposes. However, she mentioned that if she had an opportunity to go back, she will “embrace the chance”. The respondent also added that she spends her vacations in Kenya where she works with the local community to give the services that she can offer. Other factors such as insecurity, unemployment and corruption were mentioned as reasons that can make students not re-immigrate to Kenya.

For the question 5c, for those respondents who would like to go back to Kenya, they were required to explain their job plans in Kenya. The respondents stated that they would like to contribute to the development in Kenya in different ways through the knowledge acquired in Germany. According to one respondent, she would like to establish a company in Kenya and the other respondent would contribute to improve the infrastructure and technology in Kenya. The respondent mentioned that:

“I study mechanical Engineering and my plan is to make sure that I have played a role in development of Kenya, in terms of infrastructure and technology” (Respondent 3).

3.6 The Role of GoK in Higher Education and Labour Market System

Question six was meant to find out if policy makers should intervene in higher education and labour market. For this reason, respondents were asked: *Do you think the government of Kenya should do something concerning higher education/ labour market?* All respondents mentioned that, the government should intervene in these fields. Furthermore, students mentioned that there is a lot to be done in these fields. For instance, most of the respondents (four out of seven) suggested that it is important for the government to increase salaries so that highly

educated can get payments that are equivalent to their qualifications. This can enable highly educated people to concentrate on their career and to develop them. Also, to make sure that people do not end up doing many jobs to cover for their life expectancies. Moreover, some respondents suggested that there is the need to enhance technology in tertiary institutions to enable effective research. Therefore, respondents argued that the government needs to invest in efficient systems and infrastructure in most universities. According to the responses, the government should try to make sure that Kenyan universities are on the same level with the higher institutions across the globe in terms of technology advancement, innovation, research and development and professionals. Furthermore, accessibility to tertiary education should be made possible to all students especially through cost reduction as high study fees in Kenya has often been mentioned as a major problem that limits the possibility of students to have access to higher education. For this reason, some respondents argued that there is a need for the government to subsidize higher education. Some respondents also mentioned that the government should fight corruption in the labour market and also ban fake exams. In addition, respondents mentioned that corruption is affecting higher education and labour market negatively. Furthermore, the government should make sure that the quality of education offered enables students to bring out their best performance. Moreover, some respondents suggested that the government should support local talents in different fields. In addition, the government should protect students' rights. Most respondent have mentioned that the government should create more jobs so that graduates will be able to have (better paid) jobs after completing their studies. This will also help to retain the graduates in the country and even attract people from other countries to work in Kenya. Respondent 7 mentioned that:

“The government has to ensure that the ministry of the labour comes up with authentic and efficient systems that connect graduates and qualified personnel to relevant job markets”

Creation of jobs should also help to avoid crime in the country. According to some respondents, the government should support remigration so that the foreign-trained Kenyans can share the knowledge acquired abroad with other Kenyans. This has been the case in countries such as India and China. Two respondents indicated that the government should focus on training and retaining Kenyans in the country so that students may not opt to study abroad or seek better job opportunities elsewhere. The government should:

“Welcome back Kenyan experts working outside the country to share ideas and help develop the local community. This would help widen the perspectives of young people stranded in the local communities (...) they can learn from their own people” (Respondent 5).

“The government has to find ways to attract, train and retain educated and qualified Kenyans who may otherwise opt to study abroad or seek better job opportunity elsewhere” (Respondent 7)

Furthermore, some respondents suggested that the government should improve security in the universities so that a peaceful learning atmosphere for the students can be created. Students might feel insecure in the universities especially because these institutions have become targets of terrorist groups such as Al-Shabaab²⁰. For this reason respondents want the government to improve security standards in the universities. One respondent has suggested that there should be social systems that support unemployed people in the country since there is high level of unemployment²¹ in the country even for the highly educated. According some respondents, the government should encourage knowledge transfer initiatives between companies and universities. Also, it should organize conferences where graduates can exchange ideas and share information. Furthermore, one respondent suggested that politicians should avoid inferring with education systems. She suggested that professionals in tertiary institutions should not be in politics as they tend to ‘mix’ education with politics.

4. Discussion and Conclusion

Brain drain can on the one hand lead to a decrease in the level of human capital and economic growth especially in a developing country and on the other hand, it can result to developments especially when a situation of brain circulation (the movement of skilled migrants to and from source and host countries. The phenomenon is assumed to entail benefits for both countries) takes place (World Bank, 2010). This section will discuss the relationship between the findings and the theories discussed earlier in section 2 of this paper.

In the context of the brain drain, the outflow of human capital from one country to another is determined by a variety of socioeconomics and political factors. Nganga for instance, has listed some factors that make students and highly educated Kenyans to study and work abroad. These include: over-flowing classes, strained facilities, high fees and shortage of lecturers (Nganga, 2015). Additionally, Glennie and Chappell (2010) identified five factors that make skilled migrants to leave the country which include: wages, employment, professional development, networks, and socioeconomic and political conditions. To some extent, student responses correspond to these factors, as majority of the respondents have mentioned that

²⁰ Al-Shabaab is a islamist militant terror group based in Somalia (www.bbc.com, 2015, April 3), retrieved on 11.10.2015

²¹ Unemployment rate in Kenya was 9.2 per cent of the labour force in 2013 whereas youth unemployment was 17.1 from 2011 to 2015 (World Bank 2015)

costs for higher education are high in Kenya, since in many cases, students are also required to finance for their accommodation and study materials such as text books. Therefore, it can be argued that education costs are a significant push factor that determines why students and highly educated emigrate from Kenya. Moreover, respondents mentioned that, there is a lack of equipment in the universities which is assumed to constrain research processes thereby contributing to a loss of human capital to developed nations. A participant mentioned that it is difficult to carry out the research without having the required equipment. In addition this equipment is in some cases not available in the country and therefore it needs to be imported. This might be a long and an expensive process that might require financial support from the government and other education actors such as donors and the societies. Remittances could also be used to purchase the equipment and learning materials but, as mentioned earlier, in many cases remittances are used to finance basic consumption and health. Further, emigration for the students was not only economically driven but also socially which involved family reunion and religious factors as there was a participant who decided to leave Kenya in order to join her family members in Germany while another participant left Kenya for religious reasons.

To the role of the German universities, the responses show that some participants preferred to study in Germany because of the low costs of higher education. It was mentioned that study costs in the same are affordable as the education in some of the states is subsidized by the government. According to Polgreen and Ionescu (2008) funding higher education is very essential for a country. Their study of brain drain and public funding in U.S., indicates that states that invest more in higher education are likely to attract more students than those states that do not invest more in higher education (see also Romer, 2000). Moreover Stiglitz (2015) pointed out that state intervention, for instance, through funding education “has the power to deliver on both prosperity and fairness (and) it can help to provide opportunity that had not been possible previously”²² He argues that the ability of the politicians to nurture the human talent is the most important thing that an economy possesses (Stiglitz, 2015). These assumptions are very relevant to this thesis, since German policy to subsidize education has not only attracted Kenyan students in the country but also international students from different countries in the globe to a very successful country.

²²See Stiglitz, (2015, April 30). Retrieved 11.04.2015, from <https://www.timeshighereducation.com/books/the-great-divide-by-joseph-stiglitz/2019874.article>.

The labour market system in Germany acts as a pull factor that attracts students to the country. Respondents associate the labour market in the country with better wages, availability of jobs and good management in work places. These factors correspond to some of the reasons that are assumed to cause international migration in neoclassical economics theory. The theory holds that workers migrate from low to high wage economies in order to earn better wages than in their home countries (de Haas, 2010). In addition, highly educated people prefer to work in a country where they can reap high returns on their skills (Massey et al., 1993). Some of the respondents have mentioned that they are in Germany due to availability of employment. In Kenya, in some cases, students are supposed to finance their education, and without employment, it might be difficult for them to do so. Therefore, respondents prefer to study in Germany. Additionally, according to the responses, it might not be possible for people in Kenya to live on their salaries and therefore, people might need to have several jobs to earn a better living in Kenya. For this reason, skilled people might not be able to develop their career and they can opt to leave the country. Therefore, it is critical for the government to address the problems such as youth unemployment and wage differences that lead to brain drain. Glennie and Laura (2010) have indicated that professional development can be among the reasons that make skilled migrants to leave their home countries.

With regards to how students consider job prospects for the highly educated, respondents have argued that, on the one hand job seekers need to be highly educated in order to get a job while on the other hand it can be difficult even for highly qualified people to get a job in Kenya. They mentioned that jobs might be available, but corruption and tribalism can make it difficult to get a job in the labour market. For these reasons, respondents see little or no prospects in the labour market in Kenya. This requires the government to ensure that Kenyans enjoy equal rights and these rights are not violated.

Further, it was very crucial, to know how students perceive return migration, as this was a central concern for this study. Responses differed among the students, as some mentioned that they are willing to go back, whereas some do not know if they will go back and some will stay in Germany. Importantly, all respondents have mentioned that they would like to take part in development processes in Kenya even when they are still in Germany. According to brain drain and gain literature, (see for instance Candan & Hunger 2013, and Lindley, 2012) it is not necessarily for migrants to return in their source country in order to contribute to the development in these countries. Emigrants can also contribute to development while they are still abroad. Candan and Hunger argue that, once immigrants have established them in the host countries they contribute to their home countries (2013). Therefore, foreign-trained

Kenyans can take part in knowledge transfer initiatives while still in the host countries. For instance, it has been indicated that (Republic of Kenya 2014), Kenyan abroad have sent remarkable remittances to Kenya, thereby contributing to the economic growth. The Central Bank of Kenya (CBK) reported that in 2015 the amount of remittances amounted to USD 128.4 million.²³ Furthermore, migrants can invite their family members for further studies abroad, thereby giving them the possibility to acquire higher education (for instance, Respondent 4 mentioned that, she had family members in Germany who helped her to study in Germany).

Respondents would like the GoK to intervene in the labour market and higher education. For instance, they suggested that the government should create more jobs and it should come up with framework that perpetuates fair payments (for instance, minimum wage policy). This could ensure that highly educated people are getting well-paid jobs after completing their studies and they may therefore opt to remain in the country. Wages that are commensurate to the qualification is important across the countries as neoclassical economics theory assume that, once wage differences between source and host country converge, migration will cease. This might be a challenge for Kenya considering the salary differences, for example between Kenya and Germany (for instance the salary of a primary school teacher in a public school in Kenya ranges from about Kshs. 16,000 to 142,000²⁴ which is equivalent to € 140 to € 1,244 whereas the same ranges from about € 3,174,34 to 4,119,90 for a teacher in a public primary school in NRW-Germany²⁵). This suggests the need for the GoK to increase salaries in the labour market.

Additionally, students argued that it is important for the GoK to invest in education and technology so that Kenya can be on a par with other countries (especially the developed economies). They mentioned that the government needs to reduce the study fee for higher education so that high school leavers can have access to tertiary education and also to provide equal opportunities for the students from different backgrounds to have access to education regardless their socioeconomic backgrounds. Availability of affordable education could increase the proportion of human capital in the country. New growth theory assumes that investing in knowledge and technology induces socioeconomic growth in a country (Romer, 1986) since knowledge and technology have characteristics of increasing returns that stimu-

²³ See Central Bank of Kenya (2015). Retrieved 11.06.2015, from <https://www.centralbank.go.ke/index.php/diaspora-remittances>

²⁴ See Reuters, (2013). Retrieved 11.22.2015, from <http://www.reuters.com/article/2013/06/24/us-kenya-strike-idUSBRE95N0UX20130624>.

²⁵ See *Besoldungstabelle für Bund und Länder*, (2015). Retrieved 10.22.2015, from <http://www.beamtenbesoldung.org/besoldungstabellen.html>

late the process of growth. Moreover, knowledge is assumed to have natural positive externalities that stimulate this process (Romer, 1986, 1987). Therefore, it could be of great importance for the GoK to invest in knowledge generation in order to increase the level of human capital in the country and also to increase income level. Furthermore, this might increase the possibility of foreign-trained citizens to participate in knowledge transfer initiatives, to invest in their home country and to even think of remigration since “highly skilled people work and live best when surrounded with similar people” (O’Neil, 2003).²⁶ Stiglitz (2015) has also argued that for the countries to be competitive they need to have a labour force that is highly educated and that possesses college and advanced degrees.

According to participants’ responses, the GoK could invest in research and development, provide studying materials and increase facilities. Also, it should ensure that good quality education is offered in tertiary institutions. This explains the need for qualified professionals in tertiary institutions. Lindberg et al. (2014) have argued that internationalization of higher education and research is assumed to increase competition of talents on a global level. Additionally, students would like the GoK to enable collaborations between and among institutions of the government, academic and companies. This kind of cooperation among these institutions could induce economic growth and development in the country. Etzkowitz (2003) refers to this kind of cooperation as triple helix model, where academic institutions such as universities and research and development institutions are being funded by the state and these institutions work together with industries and firms to provide knowledge and technical know-how that is needed, for instance, to develop innovative products. Industries on the other hand support academic institutions financially to carry out research. Kenyan emigrants can collaborate with institutions and industries in Kenya, in order to provide the knowledge and technical know-how. This process might induce innovative development and socioeconomic growth that will open new markets in the regions and globally.

Apart from economic and political issues, respondents have raised moral and ethical issues related to the labour market and education in Kenya, arguing that corruption, tribalism and nepotism are challenges that are facing labour market and education in the country. Therefore, they suggest that the government could fight corruption in the country as this could make it difficult for Kenyans to get a job despite their qualifications. According to responses, the government should for instance ban fake examinations so that student’s performance can be genuine. Furthermore, political instability in Kenya is assumed to create tensions in the

²⁶ See O’Neil, (2003) Retrieved 11.12.2015, from <http://www.migrationpolicy.org/article/brain-drain-and-gain-case-taiwan>

universities. Therefore, according to the responses, the GoK could increase security standard in the universities in order to create a good learning atmosphere. IOM studies on migration and development in Kenya have also indicated that corruption, lack of employment and insecurity are among the factors that make Kenyan migrants to prefer staying in host countries (IOM, 2010). This suggests the need for the government to improve security standard not only in the universities but also in the whole country to ensure safeness of Kenyans.

Finally, respondents suggested that, the government should encourage remigration, so that returnees can share the knowledge acquired abroad with those who were left in Kenya. Returnees may contribute to the development through investments, and they may bring money home for their family members that will finance education and basic consumptions and help to establish micro enterprises. India and Taiwan are prime examples of brain gain through remigration (Hunger, 2004, O'Neil 2003). Indian highly skilled returnees have contributed significantly to the IT sector which led to job creation and economic growth (Candan & Hunger, 2013) in India. According to O'Neil, Taiwan has many skilled emigrants who return home to "boost the country's economic development" (2003).

This study has looked at the situation of brain drain in Kenya through the eyes of Kenyan students in German universities. Students were involved in this study in order to understand their perceptions of this phenomenon in Kenya. Also, to find out what their opinions are, on reversing the brain drain into brain gain. The willingness of the students to re-immigrate differs among them. However, they are all willing to take part in development processes in Kenya. Therefore, they would like the government to intervene in higher education and in the labour market as this could induce remigration and development. Availability of (well-paid) jobs in Kenya could enable to retain and attract foreign-trained Kenyans in the country, while fighting corruption could enable equal education and job opportunities.

Since the flow of highly educated people have implications for both source and host countries, Lindley (2012) argues that the best way to address the problem of brain drain is to tackle the underlying structural and developmental problem that make people to leave the country. Furthermore, it is important not to limit migration of the highly educated since "it can end up doing more harm than good" (Sriskandarajah, 2005). For this reason, it is important to focus on a specific sector in a specific country (ibid.). For instance, the Malawian government focuses most on the health sector by trying to retain health workers in the country through incentives such as allowances for medical professionals, and it also provide housing and transport for health care workers (Vidal, 2015). In Kenya, the government has enabled emigrants to have dual citizenship so that they can benefit from the legal systems and also to ena-

ble them to invest in their home country. O'Neil, (2003) argues that active networks between the governments and emigrants could stimulate remigration. Kenyan Community Abroad (KCA) and Kenya Development Associates- Germany (KDA)²⁷ are among many networks of Kenyan emigrants that provide forums where Kenyans abroad can discuss socioeconomic for instance education, culture, trade and development and political issues such as democratization processes with fellow Kenyans and policy makers. These networks might be important in improving socioeconomic and political situations in Kenya (for instance, KCA contributed to achievement of dual citizenship for Kenyan emigrants and they are negotiating for voting rights²⁸) that might stimulate return migration.

To conclude, I argue, that there is a possibility to reverse the trend of brain drain to brain gain, assuming that the GoK can implement the measures mentioned by the students. Also, if the Gok could effectively implement the diaspora policy that was developed in 2014, in order to tap into diaspora's talents, since its aim is to "mainstream and empower Kenyans abroad to effectively make a significant contribution to the development of the country" (Republic of Kenya, 2014). So far, there are remarkable steps such as attainment of Free Primary Education (FPE) and the introduction of Free Day Secondary Education (FDSE) that mark important milestone towards 'achieving' development in Kenya. Through FPE, enrollment rate of pupils in public primary schools has increased enormously, i.e. from 5.9 million pupils in 2003 to 9.4 million in 2010, while, in FDSE, this has increased from 1.3 million students in 2008 to 1.8 million in 2011 (Republic of Kenya, Ministry of Education (MoE), 2012). At the university level, the number of public universities has increased remarkably from six in 2003 to 22 in 2013 (Soft Kenya, 2015, Dec. 05), contributing to an increase in the percentage of tertiary students by 28 per cent between 2013 and 2014 (ibid.). The efforts of the GoK to offer education possibilities in Kenya is of great importance especially in the recent debate of brain drain and brain gain, since, education increase the level of human capital in the country, also, it might attract and retain emigrants to live and work in Kenya. Furthermore, the recent development in Information and Communication Technology (ICT) in Kenya has enabled Kenya to be among the leading countries in using mobile phone payment system, commonly known as M-Pesa. Approximated 70 per cent of Kenyans use this system (Kinuthia, 2013). M-pesa enables Kenyans within the country and within a diaspora to send money at a minimal cost (ibid.).

²⁷ See www.kda-germany.de. Retrieved 09.20.2015

²⁸ See <http://www.kenyansabroad.org/>, Retrieved 09.12.2015

This paper has only provided an insight to the general debate of brain drain and brain gain. Therefore, further studies are recommended in order to come up with representative quantitative data to this topic.

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Appendix 1: Interview questionnaire

Introduction Message

Kenya and many other countries in sub-Saharan Africa have continued to experience the loss of the most highly skilled professionals to the developed countries. These people could be needed to deliver key public services, drive economic growth, and articulate calls for greater democracy and development in Kenya. Additionally, the number of Kenyan students who are studying overseas has been increasing leading to questions like: what are the reasons that are driving Kenyan students out of local universities? Or why do they prefer studying overseas? However, studying overseas where the level of research and development is very high as well as the availability of resources and facilities, increases the knowledge and technical know-how that is needed to develop Kenya socially, politically and economically but, the question remains: how big is the percentage of Kenyans who actually return home after completing their studies to work in Kenya? Is there anything that should be done so that Kenya can benefit from brain drain? By this I mean, how should brain drain be reversed to brain gain (highly skilled professionals return to Kenya to share their knowledge with the local people). This clearly shows that, there is the need to research on issues that are leading to the loss of highly qualified persons (brain drain) to the developed nations. I shall be very grateful for every person who will take his/her time to share with me his /her views to this research topic.

Gender:

1. Would you tell me why you decided to study/work in Germany?
2. Can you tell me about the things you find important in German universities/ labour market?
3. How would you rate the quality of education in Kenya? (poor; good; or very good)
4. Can you tell me how you see jobs prospects in Kenya especially for highly educated persons?
5. Do you intend to go back to Kenya to live and work there? a) yes; b) No ; c) I don't know
b) If no, what are the reasons which will stop you from going back?
c) If yes what are your job plans in Kenya?
6. Do you think the government of Kenya should do something concerning higher education/ labour market?
b) If yes, would you please tell me what the government should do?
c) If no, would do you please tell me what you see as success in higher education /labour market in Kenya?