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**THE IMPACT OF MIGRATION AND BRAIN DRAIN IN  
CAMEROON**

Master's Thesis

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I declare that I have written the master thesis independently.

All works and major viewpoints of the authors, sources of literature and elsewhere used for writing this paper have been referenced.

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## **ABSTRACT**

International migration and consequently brain drain is a natural phenomenon as old as humanity. This pilot research examines the phenomenon of international migration and brain drain in Cameroon. It investigates the causes and consequences of this unprecedented phenomenon, its pattern and dynamics and finally the options to slow it down. The study explores in-depth, the educational and healthcare sectors of Cameroon considering its vital importance in ensuring and maintaining sustainable economic development and growth.

In quest of these goals the author employed a qualitative research method for data collection and analysis. The data for this study were collected through primary and secondary sources. From the primary data perspective, questionnaires were distributed to randomly selected respondents based in the various corners of the globe and some strategic interviews were also adopted in complement. Similarly, the author also made use of published secondary data sources that were of substance to the study in diverse ways including documentary evidence of eye witness reports that were peculiar to this pilot research.

On the theoretical note, the author adopted the Neo Classical economic theory. The empirical data collected were tested alongside this theory to ascertain the actual causes of international migration and brain drain in Cameroon and the options to slow it down. The findings affirms that international migration in Cameroon is caused by the push factors (adverse socio-economic conditions prevailing in the country) and pull factors (favourable socio-economic conditions in the western world). Although this theory seems to have aligned with the empirical data on the causes of international migration and brain drain in Cameroon, the author effectively argues that a deeper understanding of international migration and brain drain requires another theory other than the mainstream theory mentioned above.

**Keywords:** Migration, Brain drain, Cameroon, Education, Health

## INTRODUCTION

Migration is a natural human reflex as old as humanity. Although a natural reflex it can be effectively argued that some factors have accounted for its pervasive nature in contemporary times. However, with the unprecedented rise of globalization in all its facets, international migration and subsequently brain drain (most frequently from the global south to the north) remain one of those consequences of globalization which cannot be undermined.

This pivotal study attempts to explore and investigate the impact of migration and brain drain in Cameroon. In the African experience, brain drain is a phenomenon that started with the force exodus of African strongest and brightest people to America and Europe centuries ago. The Trans -Atlantic slave trade, forced brain drain from Africa as a whole to America has approximately been four- century old problem. The United State has been a nation that has been built and developed with considerable output from slave labor. But presently millions of African as a whole and Cameroon in particular in the Diaspora, some with expertise that could have been tapped to develop the continent is boosting the economics of other nations. In Cameroon, internal migration was witnessed under three stages, firstly under the German, French-British rule, secondly during the struggle of independence and thirdly by social and environmental factors. The 21th century is also experiencing the arrivals and new wave of brain drain at the international level.

The situation and movement of people had always been justified by the economic, social and political crisis. The semi-skilled and skilled movement of people in the past especially around the 1960s had always been an issue when the direction became unbalanced with Western Europe and North America being the destination countries for brilliant Cameroonians. From independence between 1960 and 1979, the economics of Cameroon grew at rates of between three per cent and five per cent per annum real terms. This period was marked by rapid increase in job openings and slow population growth. The emigration from the country to another was minimal. The increase in the economic growth of about 7 per cent a year was due to the rising prices of primary products which Cameroon exported such as cocoa, coffee, banana and petrol. This period extended to 10 years of negative economic growth and worsening living conditions.

The national currency franc CFA was devalued by 50 % reduction in wages of the public sector to 60 %, closure of many industries and the recruitment into the public sector which was the main employer were highly reduced and many cases of retrenchment too. As a result, the World Bank and International Monetary Fund (IMF), came up with the structural adjustment programme (SAP) on Cameroon. The SAP had unfavorable impingement on the whole sectors of the country especially education and health sectors.

Through this process, Cameroon has lost thousands of highly skilled professionals crucial to the development of the nation. Most of these highly skilled workers are young professionals who often abandon their jobs because of unfavorable working conditions, while others are still job hunting. To effectively reduce the magnitude of brain drain requires an in-depth understanding of the problem. However, this study will investigate the benefits and losses of talents (brain drain) emigration from the global south to the global north and will endeavor to ascertain if international migration is an overall gain or drain for Cameroon. It will be comparatively important to know the “push and pull” factors triggering the zeal of young talented Cameroonians to leave for Europe and America. The consequences of brain drain on both higher education and health sector will be examined and the possible options to slow it down.

### **Background of migration and brain drain in Cameroon**

Cameroon is found in Central Africa. It is situated in the Gulf of Guinea extending to the Atlantic Ocean. It is bordered by Nigeria in the west, Chad in the North-east Equatorial Guinea, Gabon, and the Republic of Congo to the south. Cameroon is also called Africa in miniature for its geological and cultural diversity. The country is also rich in natural resources, agriculture, forestry, water and mining (Poverty Reduction Strategy Paper, 2009). According to world population prospect (2004), Cameroon has a population of approximately 16.3 million people. Within six years, the population has rapidly increase to approximately 19,294,149 million inhabitants (CIA,Factbook 2010). The majority of the populations (70 per cent) are employed in agricultural sector (CIA Factbook, 2010). Cameroon is made up of five different ethnic groups. The biggest group is the Cameroon highlands which constitutes 31% of the community. The second major group is the Equatorial Bantu and is made up of 19% of the community. The third is the Kirdi and it constitutes 11% of the community. The fourth and fifth groups are the Fulani made up of 10% and the North-western Bantu with 9 %. Cameroon has ten

regions with its capital in Yaounde (see appendix 2). The official languages are English and French. According to Anchimbe (2005), posits that a complex fundamental of multilingualism was laid over a longer historical period not only due to colonialism and post colonialism. The life expectancy at birth for males is 53.2 years and females are 54.9 year (CIA, Fact book 2010). In order to better understand the background of migration and brain train in Cameroon, it will be comparatively important to examine this under the pre-colonial, post colonial period.

### **Pre-colonial period**

Cameroon has a long history of migration which was either voluntary or by force depending on the circumstances. According to Corvevin (1993), the country name Cameroon displayed that human beings have been existing in the territory since 5000 BC. Between the 17<sup>th</sup> and 19<sup>th</sup> centuries, it witnessed the main settlement of people and this led to the recent geographical distribution of the population. Furthermore, between the 19<sup>th</sup> and 20<sup>th</sup> centuries, internal migration in Cameroon during the colonial period was linked to three main factors. Firstly under the German, French-British rule. There was a flight from colonial persecution and constraint due to forced manual labor for the constructions of roads and railways. This led to the displacement of people for territorial planning especially in roads and constructions and the creation of agro-industrial plantations. Secondly, the struggle for the independence in Cameroon led to the suppression of rebellious people during this period led to several internal migration movements. The various ethnic groups were spread around the country. Thirdly, other factors such as social and environmental caused further displacement of people in search for fertile lands in west Cameroon, (Abomo, Nguema, Begoumenie, Njiemessa, Etoudi, Engama & Wougaing, 2013).

The Bantu-tribes were the first to immigrate from the north of Nigeria and were traditionally agricultural people requiring vast land for farming. The original inhabitants in Cameroon were the Pygmies who were gradually forced to migrate into the forest by the newcomers. The Portuguese expedition led by Fernando Po was the first Europeans to arrive the coast of Cameroon. Also, while at the coast of Douala, they sailed right up to river Wouri and named the river Rio dos Cameroes which means the river of prawns and from there the name Cameroon originated. The European arrival focused on slave trades around the coastal area. The



local chiefs increase their power by finalising agreement with the Portuguese and other European countries such as Germany, Holland France and England. The local chiefs acted as middle men between the native tribes and the Europeans with goods to sell especially in slavery and ivory. As time went on, the Portuguese settlers started the operation of plantations and Trans- Atlantic slave trade (Abomo et al., 2013). To support this fact, Boyo (2013) makes reference to the speech of Nelson Mandela 1996 and I quote:

*“For centuries an ancient continent has bled from many gaping sword wounds. At an earlier time, [ Africans ] lost millions of its most able sons and daughters to the trade in slaves; which defined these Africans as fit for slavery because they were African. To this day, we continue to lose some of the best among ourselves because the light in the developed world shines brighter”*

The past event of migration and brain drain from Africa as a whole and Cameroon in particular, began during the time of slave trade and this is how African best brain migrated from the continent. The earliest black immigrants living in the American colonies were about fifty eight thousands. The majority of them settled in South Carolina, Virginia and Pennsylvania . After the abolition of slave trade, very few Africans came to the US. But before, the period 1891 and 1900, approximately three hundred and fifty Africans came to the US. During the period of colonial rule in Africa, about thirty one thousand people migrated to the US. Irrespective of the time they came, it is obvious that the Africans have contributed immensely to shaping America (Arthur, 1958).

### **Post-colonial period**

Before independence (colonial era) it was a common practice to send the children of elites abroad for studies so that they can take over colonial administration upon return, Thus, moving abroad for studies was considered one of the surest ways of guaranteeing and developing human capital. With the emergence of independence on the African continent including Cameroon, the educational system witnessed a tremendous development. This technically stopped traveling abroad for reasons of studies. With independence and institutionalization of colonized economies, the period between 1970 and 1980 exactly after independence, the African educational system underwent a sensitive development and as such an end to the migration of training purposes (Germain, Edokat, Maurice & Isofa, 2014).

The current migration flows in Cameroon takes both the form of general movement from the countryside to the cities, and from the city, the tendency to emigrate to other countries. Most people from the rural areas migrate to urban areas in search for greener pastures whereas those from the urban areas have bigger dreams of migrating out of the country particularly developed world. Migration is a two way thing. Either people immigrate or emigrate into a country. In the case of Cameroon, because of its relatively political stability and socio economic potentials, the country serves as a destination for migrants. But this state of affair could not last longer as she is losing her attractiveness for reasons that will be subsequently understood as the work progresses. According to Evino (2009) citing United Nations population division (2008), opines that the net migration rate (per 1000 persons) was zero during the 1995-2000 period, 0.1 during the 2000-2005 period, 0.2 for the 2005-1010 period and 0.1 for the 2010-2015. Moreover, immigration into Cameroon between 1970-1980, registered an upward trend in that period (143, 6111 immigrants in 1976 and 257,689 in 1987). Since then it has witnessed a constant decline with the number of estimated immigrants at 228,383 in the year 2000, 211,880 in the year 2005 and 196,570 in 2010 according to United Nations Development Programme (UNDP, 2009). From the statistics given above, it is obvious that Cameroon has lost its attractiveness as the number of immigrants is progressively declining. These migrants are both skilled and unskilled from neighboring countries like Nigeria, Chad, Guinea and Central African Republic.

According to Afro News (2015), Cameroonian emigrants' stream into neighboring Gulf of Guinea countries, United States and Europe, constitute mostly the country's most educated citizens. Many Cameroonian doctors for instance now work abroad than at home. In 2007, the estimated number was 170,363 emigrants that migrated from Cameroon. Also, due to the colonial tides Cameroon shared with its colonial masters, 38,530 migrated to France and it has always been their preferred destination, followed by Gabon (30,216), Nigeria (16,980) and United State (12,835). Although it is often said that the farther the distance the more discouraged people migrate. In the case of Cameroon it is quite different as a huge numbers of Cameroonian migrate to France than Nigeria and Gabon that is just a stone's throw.

Similarly, in regards to the number of Cameroonians emigrants Chouala (2004) opines that the partial data compiled by the African Affairs Directorate of the Ministry of External Relations of Cameroon, estimated that between 250,000 and 300.000 Cameroonians live in the

Gulf of Guinea state in the year 2000 and 2004, reasons being that they belong to the same ethnic groups and geographical area.

In the same vein, a great number of skilled Cameroonians emigrate every year. In 2000 for instance, 17 per cent of Cameroonian population highly educated emigrated (Docquier and Marfouth, 2005). In regards to the health sector, a significant number of Cameroonian doctors and nurses also emigrated. Between 1995-2005, it was estimated that 46 per cent of Cameroonian doctors and 19 per cent of nurses emigrated to various countries (Evino, 2009). Moreover, according to the Cameroonian Medical Association, 4,200 Cameroonian doctors, most especially specialists are working abroad. Also, only 800 that is 1 for 10,000 to 20,000 inhabitants are left in the city while 1 for 40,000 to 50,000 in the rural areas Evino (2009) citing Pigeud (2007). In this vein, according to Afro News (2015), a high number of skilled emigrants that is about 40 per cent are residing in their country of emigration for more than ten years or more and 16 per cent are residing for a period of five to ten years. The motives behind migration of highly skilled or talented workers from Cameroon cannot be understood unless the causes are known.

The unfortunate thing is that the reality is completely different as migration multiplied and the concerned sectors diversified themselves. Trained professionals and university students in Cameroon are constantly on the move (Gaillard, Hassan, & Waast, 2005). In the aide-Memoire of the “Regional Conference on brain drain and capacity Building in Africa”, that was held from the 22nd to 24th February 2000 in Addis Ababa, ( Edokat 2000) points out that roughly 60,000 professionals especially doctors, teachers, and engineers between the period of 1985 and 1996 migrated annually at approximately 20,000. Moreover, according to the United Nations department of Economic and Social Affairs, international movement of people is a global occurrence that is growing in scope, convolution and impact. Migration has always been a strong impiety towards human development. But recently, migration has always been seen as a threat due to its politicization stemming from the fact that some politicians use it as a tool to promote their political ideology. The historical event of migration and brain drain helps to comprehend the roots of Cameroon’s difficulties and traces of historical events continue to affect Cameroonians today.

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### **Scope of study**

This pilot research is limited both geographically and theoretically. On the geographical note, migration and brain drain in Cameroon covers the dynamic of international migration. From the theoretical stance, it seeks to explore the causes and effects of this phenomenon of international migration and consequently brain drain.

### **Research objectives**

Although some scholars have explored some aspects of international migration and brain drain, this pilot research seeks to analyze the ever growing number of professionals leaving Cameroon, to determine the factors that push/pull these skilled workers out of Cameroon, its recent trends and history, the consequences of this phenomenon for Cameroon's economy development, the expectations for future emigration and to make policy recommendation for Cameroon based on the findings of the empirical studies.

### **Research questions**

Considering the dynamics of international migration and consequently brain drain from Cameroon, the author is prompted to ask the following questions for this study: What are the main reasons and consequences of migration and brain drain in Cameroon? What are the options to slow it down?

### **Outline of study**

This pilot research is divided in to three chapters. The introductory part of the study consists of the research objectives, research question, background of the study and its

significance. Chapter one comprises of the concepts and theoretical frame work for this study. Chapter two is composed of the research design and methodology used for this study. A combination of qualitative methods was employed for analytical purposes. Chapter three examines the causes and consequences of migration and brain drain in Higher education and health sector in Cameroon, and the analysis of the data collected coupled with the findings, conclusions and make some policy recommendations.

# 1. CONCEPTS AND THEORIES

## 1.1. Concepts

The aim of this chapter is to establish a platform through which the concept of migration and brain drain will be given an analysis. Hitherto, my interest in this topic has been to ascertain the impact and measures necessary to curb migration and brain drain in Cameroon. Both concepts have stimulated topics of debate in African political forums and when we take a closer look at the rate of migration in Cameroon, we come to the realization that this is not a topic that can be “swept under the carpet”, because the migration –brain drain debate is suitable for economic and political discourse. It is vital to evaluate that both migration and brain drain cannot be treated in isolation and a revisit of both concepts will be examined further in order to have a clearer view and better picture of the subject matter under study.

According to Stark (1984) Migration is a phenomenon where a person leaves their country of birth or origin (sending country) and stay in the host country (receiving) for some given period of time. For him both economic and political factors are accountable for this movement. The term migration per se encompasses varying opinion depending on how and why people are motivated to embark on migration trends. Stark is of the opinion that even though they are several reasons among others that are accountable to these patterns of migration, none if this can be overlooked over others as the circumstances surrounding could be a group of migrants who move to another country with prior objective to establish their permanent residence and in the long run obtain that country’s citizenship.

This notwithstanding, other segment of migrants rather has the intention to stay only for a limited period of time frame. Yet in spite of these specifications both fall under the scope of migration. Stark further considers migration as a process of moving either across an international border or within a state. For him migration encompasses any kind of movement of people whatever its length, composition and causes. This phenomenon includes refugees, displaced persons and economic migrants.



Stark also uses similar concepts such as brain waste and brain export to give a clearer picture relating to the concept of migration. For him brain waste is a situation in which people go abroad to do work that pays better but is less skilled than what they would do at home. He also refers to brain export as a situation which entails educated individuals leaving their home countries but pay for their absence through remittances, technology transfer and boosting their native country work force upon their return ( Stark 1984, 206-222).

The underlying idea is that as multi-national corporations extend their activities overseas, it is an attractive ground for highly skilled workers and the trend is mostly from third world countries to developed countries hence leading to brain drain. Whereas according to Kaba (2011), citing Tocho (2009) posit that *“it was the British royal society that coined the expression “Brain drain” to illustrate the drainage of scientists and technologist from the United Kingdom to USA and Canada”*. According to Johnson (2009), Brain-drain refers to the growth in the movement of highly skilled personnel which the trend of movement is mostly from less developed to developed countries. The basic idea behind migration and brain-drain phenomenon is that, it makes the receiving countries wealthier and developing countries are placed at the detriment of losing highly skilled manpower and human capital. (Johnson 2009, 1-16).

Johnson’s suggestion to brain-drain phenomenon is that of an uneven classification of the merits and demerits of migration. Through this way, developing countries bear most of the disadvantage as the receiving countries. It is base on this reason that he has also re-defined brain- drain as a form of “high skill migration” which is the substitute of highly talented personnel who could have contributed or enrich to the development of their country.

Similarly, Milio defines brain-drain as the abandonment of a country by professionals or people who are highly educated in favor of another country, generally following an offer of better pay package or living conditions as well as improved conditions and chance for conducting one’s professional activities (Milio 2012, 1-47).

## **1.2. Theories**

### **Neo- classical economic theory**

In the previous years, various migration researchers find it difficult to come out with a comprehensive migration theory even though numerous calls and attempts to develop a general migration theory. The reason why it is so difficult to generalize the impact of migration, are the diversity and complicatedness of the phenomenon and the difficulties involved in separating migration from other socio-economic and political processes, coupled with the difficulties to combine macro and micro level of migration. The neoclassical economics are sub divided into two the macro and the micro neoclassical economic theory.

According to Chimanikire (2005), macroeconomic theory is arguable the body which the World Bank staff is most familiar with. Macro theory argues that geographical diversity in the demand and supply of labor in country of origin and receiving country are the main factors driving individual's migration decisions. The assumption of this theory is to the effect that migration will definitely not take place if these differences are vanished. Then, their eradication will determine an end to international migration and that labour markets are the main mechanism including movements. Also, Government policy intervention affects migration by either organising or influencing labour markets in both the origin and destination countries.

Apart from the macroeconomic the, the micro theory focuses on the level of individual realistic actors whose choice to migrate depends upon a cost-benefit circulation that indicates a positive net return to migration. Under this approach, the potential benefit of migration is characterized by human. In essence if the cost of individual, social and technological factors are lower, migration will increase. The differences in earnings and employment rates are the main key variables and also government influence migration through policy that affects these factors. For instance, development policies that raise incomes at point of origin and also decreases the probability of employment at destination or increase cost of migration.

The neo-classical migration theory is instrumental in understanding the research question of this study. According to Haas (2010), neo-classical migration theory originated from the view of allocation of production factors to both the merit and demerit of the country of origin and receiving countries respectively. The underlying literature behind the neo-classical migration theory is that it is a pathway that culminates to “balanced growth”. For Haas, the redistribution of labour from rural - agricultural to the industrial areas is a factor for economic growth.

Against popular opinions, migration per se usually denotes a negative connotation as it is rather imperative that the concept of migration do not in most cases denotes a negative foot print on the sending countries. Proponent of this theory such as Haas are of the opinion that “ *the free movement of labour-in an unconstrained market environment- will eventually lead to higher marginal productivity of labour and increasing wage levels in migrant sending countries*” (Haas 2010,1-30).

Haas is of the opinion that neoclassical migration theory equates the notion that migration does not only benefit the receiving countries but rather a concept which establishes a balance at both ends. Haas perspective ties with the research question because when we take a closer look at the research question, it gives us the impression that migration per se does not only operate to the detriment of Cameroon as a country. But rather, it can be considered like a coin having both sides. Even though at some point we may turn to argue that migration trends in Cameroon culminates to brain -drain in as it leads to the export of skilled labour , this has been a platform which graduates have taken as an avenue to send money back home to their respective families. Base on this it is important to point out that neo-classical theorists lay claims patterning to migration as a factor that culminate to price equalization. Price equalization is a situation where prices of identical factors of production (wage rate, or rent of capital) will be equal across countries as a result of international migration.

Haas further continued with the literature on neo-classical migration theory by stipulating that the flow of migration should not only be viewed from the negative angle. On the contrary, positive “schools of thought” emerge from this platform that does not only bring back money but with the wide spread of migration , there have been the emergence of new concepts knowledge and entrepreneurship all thanks to the framework of international migration ( Ibid.).

In this perspective, the flow of migration should be seen as a spring board through which migrants from Cameroon have been able to place a positive impact in development and also

contributed to the pace of modernization in their country. Base on this view, he further postulate that migration is an avenue for the improvement of migrant sending countries because it is a reality that labor migrants will in the long run re-invest by establishing enterprises upon their return to their home nation. To borrow the words of Haas *“migrant workers represent a hope for the industrial development of their native countries , and because of this, large scale emigration will contribute in uplifting both rapid growth in the country of immigration and vice versa”* (Ibid.).

It is at this juncture relevant to point out that the research question is not limited to the idea that migration is a negative force in Cameroon. Based on the above literature, we should also see migration as a positive trend. In respect to the research question, the impact of migration in Cameroon is a positive tool which has till date been seen as "workshop" by the fresh graduates.

At this point, Haas draws a division here between migration and brain drain the literature mentioned here includes the fact that accepting the trend of migration is perceived to be a pillar in the growth of these countries, and the growing concern about the negative repercussion of such flow such not be laid much emphasis. He establishes that the perception towards the migration of skilled personnel have been accompanied with a negative image. To establish a balance here he further reiterate that even though migration is a tool for nation –growth in Cameroon, it is an agent that deprives this country of the scarce skilled and labor resources which they have longed invested in the educational sector (Ibid).

It is at times difficult to evaluate the extent to which the framework of migration either positively or negatively. Referring back to the research questions, the aftermath or repercussions of migration in Cameroon. The research question takes the form of an approach which embodies both sides of the coin. It is evident that albeit these migration flows impacts Cameroon positively, there is no match to the negative repercussions placed on the country.

Haas further points out that migration depletes this country of their labour force and capital resources which works to the advantage of the core industrial countries. The application of the neo- classical migration theory seeks to provide answers to the research questions as through this knowledge on how sending countries continually act as a market for the supply of labour to the core countries.

This phenomenon therefore keeps Cameroon at the “mercy” of the industrial countries and hence the underdevelopment and dependency of the periphery on the core nations (Ibid.). The assumption is that neoclassical migration theory is vital as it creates a clearer picture of the subject matter. The argument raised forth is that migration culminates to under development in the migrant sending countries via a mechanism which Haas calls “backwash effect”. For a better understanding the “backwash effect” further deepens out migration which in turn acts a cycle of “migrant syndrome”. To use his words , “ migration not only reproduces but also re-enforces the capitalist system based on class and long run migrants may cut off the ties with the countries of origin” ( Ibid.).

Other neo-classical theorists such as Kelo and Wachter point out that the migration syndrome stands for both the pros and cons. They are both of the opinion that we cannot seem to limit this literature on migration flows to mean it only undermine the growth of Cameroon. Rather it is a factor that embodies both brain gain and brain drain. For these authors, the migrant trends constitute a form of capital transfer which is depicted in the forms of knowledge and skills. The main idea here is that education and training which migration flows carry along them are forms of long term investment demonstrated in the form of human capital. The advantage here will be the long term effect which this will create via employment and income earnings (Kelo and Watcher 2004, 1-27).

A question which arises is how the framework of migration undermines the growth of Cameroon. This is visible via the flow of human capital (Knowledge and skills) to the core industrial nations. For them the expected workforces that could have contributed to the economic growth of the sending countries since individuals who migrate to the core nations represent a form of capital. For Kelo and Wachter, it is a loss calculated at the detriment of the sending countries and a gain for the receiving countries. Both authors believe that the core industrial nations benefit from this human capital which is other words can be called “brain gain” (Kelo and Watcher, 2004).

Both Kelo and Watcher share the notion that countries and taking Cameroon as a case study will suffer a “brain drain” and in another perspective, it will be in extreme cases to use these words of “ brain drain”. For them migration is a platform that benefits both the country of origin (sending) and receiving countries. They argue that it is empirical to coin this phenomenon

“brain exchange” as it is a flow which operates for the growth of both sides ( Kelo and Wachter, 2004).

The literature set forth by Kelo and Wachter is relevant to the neo-classical economic theory and also gives us a further perspective to the understanding of the research question as it is common grounds that the core industrial nations use this phenomenon as an advantage to continually enrich themselves through the device of human resource investment and keep countries such as Cameroon to be answerable to the core nations and in the long run harm their pace of economic growth. The framework of migration per se, can be attributed many interpretations, but it is obvious that the “migration syndrome” represent the brain drain which outline the loss of the weaker and brain gain which is a doctrine that perpetuate the brain gain image and stands for the win of the strong and wealthy industrial nations ( Kelo and Watcher 2004, 1-27). Both authors have gone a long way to lay criticisms on the neo-classical economic theory as classifying these migrant sending countries as “agents of gain maximizing”. For them it is necessary to establish a balance here as proponents of this theory rather place much emphasizes on the brain drain and brain gain syndrome but rather these authors re-establish the fact that a large proportion of the population of the sending countries don’t indulge in migration schemes . Rather neo-classical scholars are pre-occupied with pointing out the pros and cons when making an evaluation within the context of migration ( Kelo & Watcher 2004, 28-91).

Moreover, other authors such as Kurekova consider the neoclassical theory as a flow that is premeditated principally by economic considerations. According to Kurekova the neo-classical migration theory has been linked to the changes that erupted as a result of capitalist world system. Kurekova is of the same opinion with other neo-classical theorists by pointing out that the drive towards migration is motivated towards labour markets. For Kurekova , neo-classical theory of migration originated because of wage disparity across countries. For him the literature on neo- classical theory is built on wages and a dichotomy is drawn here between wage differences and migration trends. ( Kurekova 2011, 1-37).

Neoclassical schools of thoughts posit that migration in this context is not always interpreted to mean poor individuals or peripheral countries act as a source of labor market to the core nations. Although all these authors share similar perspective on neo-classical theory, Kurekova’s literature is directed as a criticism to the neo-classical theory.

According to Kurekova (2011), the neoclassical theory stands for a form of human capital theory of migration. The basis of this literature is to pinpoint the notion that human beings always have the rational objectives that always embark on migration trends with the prerogative of reaping benefits. The underlying fact here is that human factors such as skills and labour market are the drive behind individual migration. She further posits by pointing out that human capital theory stands as a phenomenon where migrants are motivated to be highly skilled which in the long run will be a tool for development ( Kurekova 2011, 1-37). Kurekova did not only limit this literature on elaborating the neo-classical migration theory, but rather tend to criticize basically ignore market imperfections which fail to pinpoint the role of politics and policies that contribute to migration. At the same time, she outlined the fact that the neoclassical theory also places much emphasis on the factors contributing to migration while at the same time fail to outline the notion that migration is not constantly a voluntary act with the aim of reaping benefits. She further gives an evaluation of the fact that even though the trend of migration is always to the core nations, immigrants from sending countries are in some cases less skilled compared to an average worker in the receiving countries. The question here is, if this is the case how does this apply to the brain-drain phenomenon? For him, he believes these differences exist as a result of the economic and political conditions in the sending countries (Kurekova 2011, 1-37).

## **2. RESEARCH DESIGN AND METHODOLOGY**

Research Design basically refers to a systematic way of collecting data for a particular phenomenon under study. It explores the question of the study, what data will be relevant, where to collect data and how the results will be analyzed. All these to ensure the analysis or research ties up with the research question. Every research has an absolute or implicit if not specific or explicit, research design. It is the reasonable or logical sequence that bridges the practical data to a study's research question and finally to its conclusion. Summarily, it serves as a guide to the researcher in the process of ascertaining what questions to research, what data will be of substance to the study, collecting, analysing and interpreting data and results. Briefly "a research design is a logical plan for getting from here to there, where here may be defined as the initial set of questions to be answered, and there is some set of conclusions (answers) about these questions, then in between some major steps including collection and analysis of relevant data" (Yin 2014, 28).

### **Qualitative research**

For this study the author adopted a qualitative research method which according to Flick, Kardoff and Steinke (2004, 1) argues that, it puts forth complex issues in a more understandable manner. Basically it seeks to bring to limelight the dynamics of the phenomena under study from the standpoint of those directly involved by highlighting meaning patterns and structural features. Summarily, these authors posit that qualitative research "makes use of the unusual or the deviant and unexpected as a source of insight and a mirror whose reflection makes the unknown perceptible in the known and vice versa. However, it is a more open and involved research method that works well for large studies more than other methods of research. . Qualitative research refers to "any kind of research that produces findings not arrived at by means of statistical procedures or other means of quantification" (Strauss and Corbin 1990, 17).



## 2.1. Case study

For this pilot study, the author adopted a case study approach to completely study the movements of international migration and brain drain in Cameroon. In a comprehensive review of case study as a research method Yin puts forth a twofold definition of the concept.

Firstly, Yin advocates that, a case study is “an empirical inquiry that investigates a contemporary phenomenon (the “case”) in depth and within its real-world context particularly when the boundaries between phenomenon and frameworks may not be clearly evident”. Secondly, he postulates that, case study inquiries “cope with the technically distinctive situation in which there will be many more variables of interest than data points, and as one result relies on multiple sources of evidence, with data needing to converge in a triangulating fashion, and as another result benefits from the prior development of theoretical propositions to guide data collection and analysis” (Yin 2014, 16-17).

Adding more flesh to the definitions of Yin has been Gerring (2004), who defines a case study as an “intensive study of a single unit for the purpose of understanding a larger class of (similar) units”. A unit may consist for instance of a nation state, a conflict process or any social phenomenon, observed at a single point in time or over a specified period of time. It attempts to highlight the general by laying emphasis on the particular and sought to explain in depth the dynamics of a social behavior such as our case of international migration and brain drain. However, the term contemporary phenomenon as Yin puts it does not only embody the present but also explores the recent past where direct observations can be made from people alive whose opinion on the case can be consulted. The author’s choice of this method is to gain more insight, discovery and interpretations of the phenomena under study. Thus, emphasis will be focused on the particular group of people (focus groups) faced by this issue of international migration and brain drain. Taking a complete or holistic method of the situation by attempting to answer the questions of why, how, when and where. The author explores these questions without any preconceptions.

## **2.2. Merits of case study**

The case study approach has been greatly criticized for lacking generalizations in the results. That notwithstanding, it also has its own strength which cannot be undermined. Apparently, according to (Yin 2014, 20-21) generalizations in case study is not so dissimilar from those in sciences (based on a diversified set of experiments which under different conditions has copy or replicated the same phenomenon) but demands a different ideas of the suitable research designs. Although experiments same as case studies are generalisable to theoretical suggestions and not to population or universe, the main suggestion with case study research is to extend and generalize theories (analytical generalizations) rather than assuming possibility (statistical generalizations). Summarily, the *raison d'être* with case study is to make analysis based on generalizing and not particularizing (Yin 2014, 21 citing Lip-set, Trow, & Coleman 1956, 419-420).

Case study knowledge is more realistic, concrete and sensational than abstract because it resonates with our experiences. That is, the knowledge is experience based in context and quite different from those of other mainstream research designs. Case studies explore and describe real-life situations which can rarely be identified through any research or experiment? Briefly, it puts forth complex issues in a more understandable manner. It explores a phenomenon at the surface and in depth levels most especially real life events or situations dwelling on social issues and problems such as our case in point on international migration and brain drain. Data is examined and conducted within the environment in which the phenomenon is occurring hence, ensures authenticity of text.

Since a case study revolves on some factors such as the socio-economic, cultural, political and historical, to better understand scholarly works on the phenomena under investigation, content analysis will be employed to analyze secondary data sources. This enables the author to search certain aspect of a text such as keywords, themes, phrases. These are grouped into different categories according to their similarities and a triangulation technique is employed to cross verify these similarities and how they infer answers to the research question.

## **2.3. Data collection**

Irrespective of the type of research, data collection is an integral part of a study and requires substantial amount of time and efforts. Erroneous data collection can be very detrimental to a study and consequently leads to fallacious results. In collecting data for this study, the author respected all the ethical principles of data collection such as ensuring the confidentiality and anonymity of participants while making great use of any information which were of substance to the study and in answering the research question. Data collection underscores the framework that leads to the final results of the study and in our case in point it composed of some attributes such as:

### **Qualitative interviews**

For this study the author relied on some strategic interview in collecting primary data. This ensures the reliability and validity of the data collected and the clarification of some key concepts. Strategic interviews were also conducted by the author to gain primary data for this study. Interviews will provide an insight into user experience while observation as a complimentary will give the author the opportunity to participate in the group while observing. The value of this according to Burgess (1984, 79) lies in the “opportunity that is available to collect rich detailed data based on observations in natural settings”. In employing these approaches, to quote, Berger and Luckmann (1967, cited in Burgess 1984, 2) “the focus is upon the ways in which participants interpret their experience and construct reality”.

For the interview the author chooses some focus groups. These groups comprise of those individuals in Cameroon (potential emigrants), those that emigrated to the western world as students and later picked up a permanent residence, individuals who emigrated the under various green card schemes as skilled workers and on a general note any Cameroonian that has spent consecutively more than six months abroad. The author used this method because the ways in which participants share their experience and how it constructs reality will be of focus. The interviews were conducted through unstructured questions so that participants will feel they are in a conversation unlike a formal interview which is a more of a question and answer session. All those who will participate in the interview are freely consented and their confidentiality duly

respected. Structured and unstructured interviews were employed in collecting primary data. With this method the author managed to interview some few individuals because most of the Cameroonians in some of these countries visited were skeptical about the raison d'être of this pilot study, others lack the interest to cooperate thinking the author was acting on behalf of the Cameroonian government which they have a strong resentment for. However, the few interviews the author realised were important and a strong indicator of the attitudes, perceptions and aspirations about the whole idea of brain drain as a result of migration. Notwithstanding, the unstructured interviews were strictly followed and the vital aspects noted down in the process. The author further transcript the data gotten from these interviews (decoding them), that is, the key points will be marked with a series of codes and grouped into similar concepts to make more meaning. To make more sense of why the author chooses this method and the chosen focus groups, Jones (2004) citing Glaser in an elaborate interview posits that qualitative method is most preferable in research due to the richness, collection and analysis of the data being cheaper and quicker as it avoids the rigors of statistical analysis. Furthermore, these interviews will serve as a comparison tool to illustrate the strength and weaknesses of the secondary data by using the primary data that collected from my focus groups as a result of the interview.

### **Questionnaire**

Considering the cost and bottlenecks having to travel from country to country or city to city, in order to meet respondents the author employed a questionnaire as a tool for gathering primary data. The questionnaire were divided into two main sections and targeted Cameroonians who are living abroad consecutively for a period exceeding six months. Section one tackles the personal information of the respondent and the second section, questions pertaining to the research. The respondents were informed in advance about the dynamics of the study and their confidentiality and anonymity duly ensured and respected. The questionnaires were distributed through the media. Copy of questionnaire could be found in appendix 1

### **Secondary data**

Secondary data sources were also an integral part of this pilot research. The following sources below served as the sources of secondary data that were used for this study.

### **Reference books**

This serve as an important source of secondary data since it equips the author with facts on a summary of topics relevant to the research topic. These sources include handbooks, manuals, and encyclopedias.

### **Academic journals**

Academic journals usually contents research and work done or experiments written reports by experts in a specific field. As a matter of principle, these articles in journals usually undergo a process of peer review by other experts in the field to ensure its accuracy and relevance.

### **Research institution**

The work of some research institution were also employed by the author which with the others also served as a major source for data collection. These institutions includes the International Organisation for Migration (IOM).

### **Library search engines and libraries.**

An indispensable tool to the author during the data collection phase were the search engines in the libraries such as Jstor, Helka, Nelliportal, EBSCO, Google books, Google scholars and just to name a few. This gave the author unlimited access to recent e-books and articles which were of substance to this pilot research.

### **The world wide web**

Although not a major source of data, this served as a starting point for gathering first hand information peculiar to the study before proceeding from a detailed approach. The websites of some organisations relevant to this study were also consulted which in all also serves as sources for data collection.

### **Official documents**

The author also consulted official documents of some international and regional organisations such as the United Nations and some others which were appropriate to the study.

## 2.4. Data analysis

Data analysis was done systematically, the questionnaires were reviewed and labelled, and those improperly filled were sorted out and kept aside. The rest were accorded serial numbers and those with similar facts matched together. The author further transcript the data gotten from the interviews (decoding them) that is the key points will be marked with a series of codes and grouped into similar concepts to make meaning.

For the secondary data sources the author employed content analysis to analyse the data. Content analysis refers to “a technique for making replicable and valid inferences from text (or other meaningful matter) to the context of their use” (Krippendorff, 2004). Stone, Dunphy, Smith and Ogilvie (1996, 5) cited by Krippendorff further define the concept as “a research technique for making inferences by systematically and objectively identifying specified characteristics with a text”. Content analysis is a scientific tool at the disposal of a researcher to deepen the understanding of particular phenomena under research or informs practical actions. It highlights the issue of reliability, validity and replicability which are primordial for any research. Although not limited to text as perceived it includes works of arts, images, maps, sounds, signs, symbols and even numerical records can be considered as text if there are relevant to the phenomena undergoing research. Krippendorff, (2004, 22-25) postulates some features to the use of content analysis in research which data has to undergo before arriving the point of engaging a coding process or categorizing. Text has no objective which implies it is left at the discretion of the researcher to take the text as an unquestionable base for subsequent analysis and interpretation of the results for others to understand. Content analysis may fail if it does not spell out the criteria for validating results especially when expert analysis of text fails to acknowledge the uses of text.

Content analysis in itself does not invoke meaning; text is analyzed through the lenses of the researcher which is subject to cause behavioral changes. From the text, the analyst could deduce ideas out of the physical nature of the text. The researcher should be able to conceptualize the text and the action it encourages. In content analysis, text is accorded meaning subjectively to the purpose of the research. This implies the text is read and analyzed specifically to align with the purpose of the phenomena under study. Once done the researcher understands

the text relatively to the research question and research objective and explain the context that guides their inference.

In this study, the author analyses the volume of text at his disposal and draw specific inference from it within the chosen context. This enables the author to infer answers to the research question and analyses the text systematically, explicitly and verifiable, way more than what an ordinary reader does with text. The techniques of data analysis for this work embodies the analysis of key words in context, words count which enabled the author to create general patterns and make comparison across text. This based on the assumption that words that frequently appear were of major concern. Endorsing this technique has been Ryan and Bernard (2000, 775) who postulates that a researcher should as a principle look for those attributes of the text that reduces the volume of the data and accords meaning. They advocated for key words in context, words count, and structural analysis. In this pivotal research the author employed a key-words-in-context (KWIC) list which enables the finding of the frequency of a particular word or phrase in the context of some number words appeared so as to produce a concordance. Words count was also employed to discover the pattern of ideas in a text such as themes. The author analyzed the frequency of certain words and how they construct the ideas which can be used for systematic comparison across groups. The author notes each time certain words appeared in a text which creates important construct.

Data sources are matched together, and those with similar ideas are put in the same group and categories. After this process, the author proceeds to reviewing each article in comparison to those from other categories and groups. A triangulation technique is employed which eases the validation of data through cross verification from various sources so as to increase the credibility and validity of the findings or to arrive at an inference (Nachimias. F and Nachimias. D, 1992). There are no pre- perceptions here because no particular source in itself answers the research question, but at least has an element of the truth. So by triangulating most of the perspectives the author gets a dipper depth vision and broad view of the phenomena under study.

## **2.5. Advantages of content analysis**

To an extent, some research problems such as international migration and brain drain is based on social, political and historical facts are likely to depend on the analysis of secondary data. As a result the researcher is left with the choice of exploring a wide range of materials

relating to different aspects of the research. This could result in a greater scope and depth than it could with a primary data research.

Since it is based on work which appears from a series of studies done by other researchers, content analysis gives the opportunity for a research finding to gain more credibility and justifiable inferences.

Cross verification and validation of data from more than one source is facilitated with content analysis then the credibility of research findings gotten from primary data (Nachimias. F and Nachimias. D, 1992).

Analysis of secondary data is complete because it postulates for a comprehensive view of an even unlike interviews where a respondents may consciously or unconsciously leave out certain vital information likely to adversely affect the research findings.

Content analysis eases reliability and replication is easily established and the results are made available for others

### **Disadvantages of content analysis**

In content analysis research results poses the problem of reliability and validity which is hard to verify the interpretation of text and if the criteria the researcher proposes is compatible with the inference from text (Krippendorff). Interpretation and analysis of text could be very time consuming which limits that amount of text a research can handle through standardized methods.

## **2.6. Limitations of the study**

The exact or right figures on the emigration of skilled individuals are not easily measured in studies of this nature. The accuracy, reliability and comparability of the figures are not easy to come by. The amount of work presented by the author entails what could have been done with the limited time allocated for this study. There was limited time and resources to visit and mobilise Cameroonians groups for this study. Similarly, Cameroonians migrants are scattered all over within the world. Thus, it becomes practically impossible for the author within the time frame to visit most of these countries espoused with the lack of funding. The data presented here is based on those countries which the author was able to visit and the responses from questionnaires distributed through the media.



## **2.7. Reliability**

According to Krippendorff (2004, 211-219), reliability brings to limelight the idea that data generated for analysis are void of pollutants and should have a similar meaning to everyone who uses them. Briefly, it assures that the procedures of this particular study can be trusted. Thus, the sources used for this pilot research gave an account of international migration and brain drain in Cameroon. Implying the reliability is measured by similarities and how their account of events

coincides. In this vein, two sources that give account of the same dynamic of the phenomenon under study were more reliable than a single source arguing to the contrary. This does not imply discrediting single sources that were used for the study. Notwithstanding, the author made more use of data that can be gotten from more than one source.

### **Validity**

Validity is an instrument used for measuring the quality of any research results that leads it to be accepted as true about the phenomena under research. According to Krippendorff (2004, 313) a research becomes valid when the inferences drawn from the text available can withstand the test of independently available evidence. Part of this data is based on secondary data sources which implies the measurement of the facts are based on the interpretations of the different authors. This is possible to affect the validity of this work because the author cannot to some extent guarantee that these authors interpretations might not have consciously or unconsciously focused on some particular aspects of international migration and brain drain in Cameroon while excluding others. These are potential sources of bias for this pilot research which can only be minimized but not eradicated in research. Therefore, the validity of this study is based on the data for measurement extracted from the various sources of data elaborated above which were at the disposal of the author within the time frame for this study.

### **3. THE CAUSES AND CONSEQUENCES OF MIGRATION AND BRAIN DRAIN OF HIGHER EDUCATION TEACHERS AND HEALTHCARE PROFESSIONALS IN CAMEROON**

This chapter explores the overview or background of the higher education (HE) and the healthcare sector, examines the general causes of migration and brain drain in Cameroon. Also, both sectors will be examined differently in order to portray in depth the impact of migration and brain drain. Moreover, the pros and cons of brain drain will be equally discussed. Finally, the data collected will be analysed and make some policy recommendation.

#### **3.1. Background of health services in Cameroon**

According to Nsagha, Kamga, Assob and Njunda (n.d), Cameroon had only one medical school the faculty of medicine and Biomedical science of the University of Yaoundé 1, which was opened in 1969. The University Centre for Health Science (UCHS), otherwise referred to in French as Centre Universitaire de Science de la santé (CUSS) was the first medical university in Cameroon. It became operational in 1969 were the first batch of students enrolled. The student must be a holder of advanced level certificate with priority given to chemistry and biology (Njinji, 2012). Also, for students to obtain first degree from the medical school, it takes them six to seven years, and for specialization, they are also compelled to take special courses that takes another 2-4 years. The training programme was aimed at producing scientifically qualified, multifunctional or flexible doctors who would be fully operational in the villages or rural areas with minimal equipment and supplies (Monekosso, 1993).The graduate were obliged to readily adapt to new situations why not improvise whenever necessarily, thus appealing for a high degree of ability and inventiveness. The fortunate thing about the training strategies adopted by the UCHS in 1969 was that the requirements were later established to be in close agreement with

the terms of the World Conference on Medical Education held in Edinburgh in 1988, the Edinburgh declaration.

Furthermore, professional schools in Cameroon also train nurses and most of them are state owned universities. Nurses need four years of professional training and they also have specialist courses too and the choice to move to masters and PhD programmes. Also professional nurses required one year training at the professional school and they have the equivalent of practical nurses in USA. The irony here is that assistance practical nurses in Cameroon are doing nurses work because the need is so great (Njinji, 2012).

Before 2006, only one state university offered medical degrees. But at the moment, at least five universities and the professional intake have been scale up. But presently some private schools were approved to train nurses. Another major problem is that upon graduation very few employment opportunities are available (Njinji, 2012). According to the university world news 2013, reporting in the bilingual Cameroon Tribune, stated that “*the national commission for training in medicine, pharmacy and dentistry, which was set up in 2012, had finally decided that all but two hundreds of private medical institutions were unfit to operate in those fields because they are lacking technical and financial capacity laboratories and human resources*”.

Although the private medical institution was not given the right to operate in the above fields, they were allowed to still train students until the end of the academic year, and would award them biomedical and medico-sanitary degrees. But these certificates were not qualifying them as medical doctors. The commission also gave the chance that students registered in the unauthorized schools could extend their studies in six newly authorized biomedical faculties after passing through higher education ministry selection.

The tribune further reported that a single competitive examination for training in the fields of medicine, pharmacy and dentistry was introduced by the ministry of education. Moreover, 800 students were admitted, 500 places for medical doctors, 150 for pharmacists and 150 for dental surgeons. The outstanding candidates were to be distributed among the six authorized medical institutions in Cameroon (UN, 2012). Although they have been an improvement in the number of intake of medical doctors per year, and other medical field, the health sector is experiencing shortage of doctors and nurses as many of them are migrating every year.

The government also called for the closure of those institutions that did not respect the required standards of medical studies. The six newly authorized medical schools consist of four public and two private institutions. The University of Yaounde I, that is the faculty of medicine and biomedical science which is 43 years old created for the training of medical doctors, and this faculty had 130 students in medicine, 30 in pharmacy and 100 in dentistry. The faculty was made up of 166 constant lecturers, more than 100 temporary staff and a many more visiting foreign lecturers. It offers studies in general medicine, oral health medicine, pharmaceutical science, biomedical and medico-sanitary studies and specialist options (university world news 2013).

The University of Douala was established in 2006 with the faculty of medicine and pharmaceutical science. The first medical doctors granted degree in July 2013. Also 100 students were to be trained in the 2013-2014 academic year and 60 in pharmacy, with 86 specialized lecturers. Similarly, the University of Bamenda which is still very new, (2 years) with the faculty of health science will cater for 60 medical students in the new academic year. They have 10 permanent lecturers with extra-part timers while awaiting the medicine, nursing and medical laboratory technology to be put in place.

Furthermore, in the University of Buea, the faculty of health science graduated 53 medical doctors in December 2012 and under the new system, 80 medical students will be trained. The faculty of health science will extend to train medical doctors, medico-laboratory, nurses and technicians. Efforts are made to increase the workforce and three other institutions are in use as teaching hospitals while the building of new teaching hospitals is under plans and students on campus residence. Furthermore, another private higher institute of health science was the University of the Montagnes Bangante. It offers training in human medicine, Pharmacy, dental surgery and medico sanitary sciences. It consists of three campuses namely: Laboratories, a teaching hospital and a library and 80 students in medicine, 60 in pharmacy and 50 in dentistry. Similarly, another private university is the higher institute of medical technology, Nkoloudom. This is situated at the outskirts of Yaoundé and will cater for 50 medical students in the next academic year (university world news 2013).

According to the report from the ministry of health, about 5000 Cameroonian medical doctors have migrated abroad. Among these numbers, about 500-600 in the US (ministry of health). Again in an interview with the Cameroon tribune, Dr Tetanye Ekoe, the vice president of the national doctors in Cameroon reveals that about 4200 medical doctors reside in Cameroon.

Statistic shows that only half of those numbers are actually practicing. Approximately 1000 are on secondment to the ministry of health with various tasks to be performed including purely administrative ones. The remaining are either with the faculty of medicine and biomedical science in the university of Yaounde I with NGOs or with the private sector. In the private sector, there are 1500 medical doctors handling less than 10-15 per cent of patients (Tande 2006).

Moreover, Pr Ekoe further points out that the limited numbers of practicing medical doctors in the country makes the national doctor patient ratio of 1 doctor per 10,000 inhabitants largely meaningless. Furthermore, the real ratio is closer to 1 doctor per 40,000 inhabitants and in remote areas such as the far north and eastern provinces, the ratio is almost 1 doctor per 50,000 inhabitants. According to Tande (2006) argues that the country's lone faculty of medicine is unable to meet internal demand because only about 100 medical doctors are produced annually.

The international Monetary Fund and World Bank further worsen the situation by imposing hiring quotas that limits the number of medical doctor who can be integrated into the public services each year. The impact is that some foreign trained medical doctor's return home to pick up jobs and to their greatest amaze cannot be employed, thus are left with no choice than to migrate in search of greener pastures in the western world as compared to western trained doctors, majority are employed in their countries.

World Health report in 2006, throws more light on the medical brain drain occurrence in sub-Saharan Africa, data from 30 member states were used and it was set up that one quarter (25 %) of doctors prepared in sub-Saharan Africa are working in the OECD countries ranging from as small as 3% in Cameroon to as great as 37 % in South Africa. Also 5% of nurse and midwives qualified in sub-Saharan Africa are functioning in OECD countries (Tande, 2006) Furthermore, according to the report, a great number of doctors trained in Cameroon are presently working in OECD countries. World health organization states that:

*“When numbers of doctors and nurses leave, the country that financed their education lose their return on their investment and ends up unwillingly providing the wealthy countries to which their health personnel have migrated with a kind of “perverse subsidy” financial lost is not the most damaging outcome, however, when a country has a fragile health system, the loss of its workforce can bring the*

*whole system close to collapse and the consequences can be measured in lives lost. In these circumstances the calculus of international migration shifts from brain drain to gain to “fatal flows”.*”

The above facts can be compared with the situation in Cameroon as many doctors and nurses who study abroad either through government scholarship programmes or privately failed to return home to serve their citizens but will rather prefer to stay abroad and work. They lack the spirit of patriotism. Nevertheless, it will be unjust to criticize without knowing the main cause of them migrating abroad. Therefore, it will be relatively important to examine the main causes why Cameroon doctors and nurses are leaving their own country as the work progresses.

According to (WHO) World Health Organization (2006), the leading causes of death in Cameroon are Malaria, HIV/AIDS, lower respiratory infections, prenatal conditions, and diarrhea disease just to name a few. The non-transmissible diseases such as traumatism are on the recrudescence in the nation due to the changes in the life styles especially changing patterns of food in the city (WHO, 2009). The public and private institutions consists of the Cameroonian national health system, and organization that provides health services are under the supervision and regulations of Ministry of Public Health (MoPH, 2010). The main sponsor of public health sector in Cameroon is the state or public sector although the private sector still operates, it can be effectively argued that it is for profits making solely. There is also the presence of traditional and Chinese medicine all over the country.

Since 2006, Cameroon is in cooperation with the Sector Wide Approach (SWAP) countries. SWAP is a new initiative that is intended to facilitate donor harmonization and coordination to fund health. Their aims are to update the health sector strategy for 2010, and even extending it to 2015 in accordance to the Millennium Development Goals (MDGs).

The Cameroon health system is pyramid and is made up of three levels. The central (strategy), intermediary, (technical) and the peripheral (operational). The country also has 2043 public medical structures which are highly concentrated in urban zone

### **3.2. Background of higher education in Cameroon**

The current university of Yaounde I which is the mother university of all the universities in Cameroon, can be traced back from the transformation of the National institute for studies to the federal university of Cameroon which was opened in 1962 with an initial student population of 213 people (Edokat, 2000). After independence in 1960, most Cameroonians pursued Higher Education (HE) abroad especially to their ex-colonies such as Germany, France and Britain during the colonial era and based on the bilateral frameworks they established. Other frameworks existed within colonial, ex-colonial, socio-linguistic and cultural networks which facilitated Cameroonians to receive HE in other African countries within the same framework (Doh, 2011). Structural wise, the Cameroon HE system has undergone through a drastic and dramatic structural changes. The 1993 reforms accounts for the changes and form a combination of an earlier dual and stratified (elitist) system to (massify) open access system. This structural adjustment was quite different from the colonial conception of the system in Cameroon. Before, only one multi-faculty and comprehensive university in the liberal arts, science and social science called the federal university which was renamed the University of Yaoundé (Doh, 2011). The University of Yaoundé consists of three faculties and specialized school which trained graduates for the job market (Edokat, 2000). The lone university of Yaoundé had a serious capacity problem. By 1992, the university had reached a congestion level where there were over 40,000 students for a campus designed for 5000. The government responded to this with the 1993 reforms among which was the creation of the five full fledged universities such as Buea, Douala, Dschang, Ngaoundere and Yaoundé II.

The higher education in Cameroon had 210,000 students in 2010. This account for 20 per cent of annual average increase in student numbers. For instance in 2002-2003 academic year the student number stood at 74,105. In 2006-2007 this figure rose to approximately 130,000 and in 2010 to 210,000. The increase is huge and placed policy makers in a difficult situation in terms of funding, planning and infrastructure with implication quality (Doh, 2011). The official language of instruction is English and French with exceptions to the Bamenda and Buea University conceived in the Anglo-Saxon tradition and are English speaking monolingual University conceived in a respective tradition. The official bilingual university is the mother institution the University of Yaoundé I. The remaining four universities are with a dominant

francophone orientation. The language of instruction is based on the lecturer's first official language for instance English or French. Although Cameroon is a bilingual country, since 2007 irrespective of the language, the degree structures in Cameroon are based on the Bologna harmonized structure and are implemented in the whole of CEMAC zone. It has a structure of three that is, Bachelor, Master and PhD (Doh, 2011).

Since the 1993 reforms, higher education in Cameroon has been predominantly financed by the state (70%) and addition to a token registration fee of 50.000FCFA (Doh, 2011). In essence, the financing of higher education in Cameroon has always been in the hands of the government. Government contribution to the university account for 94 and 96 % .The other remaining 4 and 6 % has been from independent sources and from friendly countries like France, Britain and Belgium (Edokat, 2000). The orientation of the university budget is directed towards teaching whereas research in general and postgraduate remain unfunded. Also, research funding in Cameroon is mostly from international donor and research agencies and most often are applied for by the individual researcher or groups.

### **3.3. General causes of brain drain on Cameroon's health and educational sectors**

Most often, talented or highly skilled Cameroonians that emigrated to developed countries have been justified by social, political and economic reasons. These reasons still account for such international movements today. Before the 1960s, migration of skilled workers did not attract lots of attention as of today where most of Cameroonians who studied abroad return home and had a good job. But after the period (1960), the direction became unbalance with western Europe and North America being the main destination countries for skilled professionals from the less developed countries especially Cameroon (Edokat, 2000).

According to Edokat (2000), they do exist many forms of brain drain and the first form of brain drain within the country (internal) refers to those professionally trained or skilled intellectuals, professionals who apply their skills, energies, knowledge and ability in their relevant fields but who for lack of suitable inducement and motivation, instead apply their skills and ability outside their areas of training and professions. The second form is primary the external brain drain which occurs when human capital leave the home country go and work



overseas especially in industrialized nations such as Europe, North America and Australia. The last but not the least form of brain drain is when human resources or capital take a job elsewhere within the same region say for instance Nigeria, Gabon, Congo and Chad. It is more like in the same region or continent. For the purpose of this work, the author decides to limit or focus the study on primary and secondary brain drain only.

There is absolutely no way to slow down brain drain in Cameroon in particular without necessarily understanding the factors that impels people to move in and out of their country of origin. Many different reasons accounts for the migration of professionals. These movements are generally classified into two types specifically the push and pull factors. In explaining the causes of migration in Cameroon, the author decides to use some theories of migration, coupled with the pull and push factors of migration. Those factors that attract skilled labor from developing countries can be termed the pull factors and includes the use of selective immigration policies designed to attract high skilled workers. Other pull factors include globalization, higher wages, job opportunities, relative good working conditions and freedom from political instability or oppression. Also, still in this vein, factors such as the lack of life chances, low living standards, political and social instability or oppression, lack of opportunity to utilize skills and unemployment are relevant in this work.

Moreover, of great importance in understand the origin and impact of brain drain in Cameroon, theories such as the Neo classical economic theory which has already been discussed above, will be of great importance to this section. That notwithstanding, some of the push and pull factors will be analysed to give a vivid understanding of the causes and consequences of migration and brain drain in Cameroon in both the higher education and healthcare sectors.

### **Push factors of migration**

The push factors are generally associated to the negative factors that push people to leave their country of origin. The impact on the sending country is always very detrimental as it the skilled workers that often migrate. (Dolvo and Martineau 2004). In essence, Cameroonians migrate to nations that can improve their lifestyles and better working conditions. These factors include the lack of suitable good governance, the absence of peace and stability, absence of future education and career development hopes, declining economic conditions in developing countries, lack of job satisfaction by workers and low pay package. Similarly, in analysis the

causes of brain drain, World Health Organization states that “*classically this is provoked by a (growing) discontent or dissatisfaction with existing working /living conditions so called push factors, as well as by awareness of the existence of (and desire to find) better jobs elsewhere-so called pull factors*”. The push factors are the causes of HE teachers, doctors and nurses out of Cameroon especially when they become dissatisfied with their current job in their home country. WHO further states that

*“A recent study from sub Saharan Africa points to both push and pull factors being significant ,workers concern about lack of promotion, prospects, poor management, heavy workload ,lack of facilities, a declining health services, inadequate living conditions and high levels of violence and crime are among the push factors for migration. Prospects for better remuneration, upgrading qualifications, gaining experience, a safer environment and family matters are among the pull factors”* Therefore with all these in mind it will be comparatively important to examine in detailed the main causes of migration and brain drain in both the health and HE sectors in Cameroon.

The economics and financial factors accounts for the major reason why skilled professionals from Cameroon migrate to developed countries. The gap between the incomes earners in developed and developing country is really wide. In the case of Cameroon, when the university of Yaoundé was established in 1960, the information of the university salary alongside those of the public service was established which was the biggest mistake. As a result of this, there was no particular motivation to be a university lecturer whereas one could smoothly fit in the public service and get delegated to prestigious post. Also still in this light, between 1970 and 1975, many university lecturers were either departing from their jobs or move to other countries with higher wages (Edokat, 2000). Furthermore, before the government reacted to the situation, between 1976 by instituting two allowances that is the technical allowances and the higher education allowances to the different grade of university lecturers many of them had left and many are still willing to leave especially when they compare their salaries with lecturers outside the country. Nevertheless, many Cameroonians abroad return home to teach in the university because wages were improved upon. The two allowances instituted in 1976 were not maintained for a long and by 1993, these fixed allowances since their creation was not only reduced but the salaries of civil servant including the health sector and education (university lecturers) were cut down extremely. The 1993 salaries cut did not affect the armed forces for selfish reasons like

fear of military coup d'état to overthrow the government. Also it can be seen that from the salary cut of 1993, it caused a greater ambition for teachers and healthcare workers to migrate. As a result of this, many teachers especially in the science faculties and economic department and some healthcare workers left the country. Still in the same vein, some of the most brilliant and well renowned law teachers of the nation migrated to other countries. The impact of this was greatly on the country as it witness internal brain drain as those who are left behind, diverted their talent in doing other things which is not even related to their profession in order to make a living (Edokat, 2000).

Furthermore, in regards to the extremely low salaries and benefits in Cameroon, greatly accounts for the reasons why medical doctors and higher education are living the country. According to Abangma (2006) stating that: *"Nobody is saying we need exact working conditions as in Europe and America or we needs salaries to the amount payable as in the USA, but what I am saying is MY TAKE HOME PAY MUST BE TO TAKE ME HOME, anything short then forget it"*. It is practically impossible after investing in education, or studies that at the end of the day, you cannot even boast of a reasonable salary that will give you every reason to happily wake up early to go to work. Low salaries are really discouraging and with the nature of African society with extended families always demanding makes it worse because if one cannot have enough for themselves, talk less of other and these has encouraged skilled workers to migrate in order to satisfy their families. In Cameroon, approximate 25-30% of experts trained in the country migrates and are functioning abroad while 70-80% of Cameroonians trained abroad do not return after their education (Tande, 2006). From all these factors, there is no doubt that medical profession in Cameroon has lost its noble position and glory and part of the efforts to discourage migration, must include making it attractive again in terms of salary, social mobility and career growth .In Cameroon it is heart breaking to see a policeman with high school diploma earning as much or even more than a medical officer. If these not check out well, brain drain will continue (Tande, 2006).

Moreover, unemployment plays a great role in the migration of doctors. Many trained medical doctors from other universities especially from Nigeria, although Cameroonians who are not graduates from CUSS are the most affected. Even though some of them manage to secure jobs in the private medical hospitals, the extremely low salaries discourages them to work thus have no choice than to migrate. Also coupled with the fact that as a young doctors who needs

more experience and specialization, getting admission into the lone teaching university hospital (CUSS) is very difficult.

Although qualified, corruption, bribery and the “god father” syndrome is the order of the day (Abangma, 2006). As a result doctors and nurses from abroad although Cameroonians are not most often integrated into the public health sector, consequently, Cameroonian young doctors are pushed to the wall and are left with no choice rather than to migrate to countries where their skills will be recognized, improved upon and where specialized programmes are possible. This is how brain drain takes place in Cameroon. Similarly, this issue of bribery, corruption and the popularly known “god father” syndrome is not peculiar only to the health sector. The higher education sector is also affected by these phenomena. To gain access into some higher education training institutions one must be directly related or knows somebody who knows the “god father”. This has totally paralysed the efforts of those highly qualified yet “not connected” Cameroonians to lose access to these institutions. As a result these individuals are left with the options of migrating abroad at least for those who have the means or resort to the private sectors with the mean wages.

Another reason why Cameroonian doctors are leaving is because of lack of better working conditions. In Cameroon many hospitals lack the basic utility and basic instruments. Many patient die because of lack of these basic needs. According to (Abangma, 2006), argues that 3 out of every 5 death in Cameroon could be prevented by basic instruments but they are lacking in most hospitals. Again, he proceeds by saying that a delegate of health comes to the same hospital or health centre with luxurious car for inspection, and yet basic needs are lacking in the hospital. In Cameroon, when the president, ministers, governors are sick, they are flown to Europe and America for treatment. What is wrong with the medical hospitals in Cameroon? Just wondering. There is no extra-ordinary treatment administered to them that cannot be done in Cameroon if the hospitals are well equipped. Most of the best brain out of the country are Africans and Cameroonians are amongst these best brains and the same to attend to the president and members of his government. It is really ironical that the same doctors that were pushed out, denied integration into the public sectors are the same doctors that will treat them out of the country. Likewise, in the higher education sector the essential teaching infrastructure are absent, no good libraries, not to mention of computers. The absence of such basic needs could even prevent those in developed countries (DCs) from returning because they find work frustrating

without these basic needs. Still in this vein, Lewis (2011), in a speech made by Ire Magloire Kengne a researcher who studies wastewater treatment said: “*we don't have electricity; we have a generator that is broken and rusting. Sometimes you go two days without electricity*”. This is so frustrating and I wonder what type of research that can be carried out without electricity. The absent of basic needs is not encouraging at all to researcher and accounts greatly for the reasons that stems brain drain from the university. The well-equipped laboratories, libraries and good teaching infrastructure in developed countries attracts brain drain of university lecturers from Cameroon. The funding of higher education in Cameroon has really created an atmosphere of discontent and consequent urge to migrate.

Notwithstanding, political factors have contributed enormously to the migration and brain drain of higher education teachers and the healthcare workers in Cameroon. Cameroon in the 1990s was characterized by a period of political crisis such as the establishment and launching of political parties and elections. There was the absence of political freedom and speech. Also, during this period, some university lecturers' likewise healthcare workers took part in this political event while others even established and led political parties. Some of them belonged to the ruling party, the Cameroon People's Democratic Movement (CPDM) perhaps for purely selfish reasons. While others who belonged to the main opposition party Social Democratic Front (SDF). Many of those that belonged to the ruling party were heavily compensated in terms of advancement, appointments to political positions with the attendant social prestige. In fact it was advantageous to belong to the ruling and winning party. But some of those in opposition treated badly in terms of promotion, victimization and promotion. Many in the opposition left the country for fear of further victimization (Edokat, 2000). This clearly shows that although it is often said that Cameroon is a democratic country, following the circumstances in which oppositions are being treated, the validity of such statement is questionable. Conceding this fact has been FreedomHouse International (2014) listings which declared Cameroonians as not free; hence, democracy exists on papers but practically absent. Furthermore, as earlier discussed above, the growth of university budget had for a long time not favored teaching and research programme.

## **Pull factors**

The pull factors of migration are those elements that attract skilled workers from the home country (sending) to another (receiving) country. In essence, the pull factors of migration are the positive factors and this will help better understand the reasons why talented workers migrate. After World War II, the growth of the modern economies of the United States and Western Europe had led to the migration of many Africans and Cameroonians in particular. Globalization has played a vital role in the migration processes as it has made available a massive transfer of resources like capital, technology and labour. This has become available for huge scale resources transfer. Even though approximately half of the recent international migration flows from developing nations to developed countries have grown to unprecedented levels (Donald & Chimankire 2005). Statistics show that developed countries are central of attraction for the world's migration. For example in 1960, half of the world's migration exclusively those naturalized would expand even more than the number in industrialized nations, were in developed countries. Again, about 15-20 million were in Western Europe, 15-20 million were in North America and, 2-3 million are in the modern nation of Asia especially Japan and Taiwan (Donald & Chimankire 2005).

Globalization in all its facets is attributed as one of the pull factors of migration and is also considered one of the attractive causes of migration and brain drain in Cameroon. According to Philip (2003), globalization began 400 years ago with the trans-Atlantic slave trade that brought the ancestors of 200 million Africans now living in the Americas. Cameroonians were not left out as many were transported by their colonial masters to work in their plantations. But the movement of Cameroonians during the trans-Atlantic slave trade was involuntarily as against now that the movement is voluntary due to the economic situation of the country. Again as one of the pull factors of migration, globalization accelerates communication and technology. Internet and cell phones enable communication instantaneously with any person on the globe as information can be easily spread in less than no time. Moreover, in support of the view, Emeagwali, (2013), argues that: “*Globalization is a force that is denationalizing the wealth of developing nation*”. Some economists have confirmed that the rich nations are getting richer while the poor ones are getting poorer. Globalization accounts for the mobility of highly skilled workers from Cameroon. The attractive force of migration can be seen through globalization especially when international principles are made available to certain applications. For instance

with the British Commonwealth countries, a common curriculum for medical practitioners are automatic register. (Rasool, Botha and Bisschuff 2012, citing Iredale 2001, 10). Furthermore, developing nations such as New Zealand, the United States, Australia, Great Britain and Canada offered inducement to expert Africans with high level of education and advanced occupational skills (Rasool et al. 2012, citing Van Rooyen 2000, 62-68)

Many developed countries use of selective immigration policies designed to attract high skilled workers, while others seen as less economically beneficial to receiving countries. Factors that attracts skilled migrants especially higher education teachers and health workers (doctors and nurses) from Cameroon includes globalization, higher wages, job opportunities, relatively good working conditions and freedom from political instability or oppression, and most importantly is the internationalization of higher education. Selective immigration policies designed to attract skilled migrants from sub-Saharan Africa and Cameroon can be explained as follows:

Approaches to economic growth all over the world are increasingly mould by the zeal to increase human capital. These involve highly skilled workers from abroad including education and training interventions. The European Union for instance needs to enhance skilled labor was emphasized at the European Union conference in the Hague at the end of 2004, especially research staff into the EU from abroad. Also, measures such as Marie Curie initiative aim at strengthening the EU researchers working abroad back to the EU (European commission, 2002). Also, other nations in Europe such as the Britain has recently announced dimensions to safeguard that only those who are of interest to Britain can come for a job or stay, to reinforce the UK's border, to crack down on abuse and illegally immigration ,and increase removals (Home Office, 2005). Therefore, applications for immigrants were placed in four categories namely highly skilled, skilled, low skilled and students/specialist. As if this is not enough, an independent labor market advisory group was created to make recommendations on the existence of skill gaps, to ensure that immigration policies serve the needs of the UK. Endorsing these facts has been the British Premier Tony Blair, who advocates that

*“Our vital public services depend upon skilled staff from overseas. Far from being a burden on these services our expanding NHs for example would have difficulty meeting*

*the needs of patients without foreign-born nurses and doctors. The expertise of It and finance professionals from India, the US and EU help maintain London as the financial center of the world managed migration is not good for this country. It is essentially for our continued prosperity”.* Tony Blair, February 2004 (Home Office, 2005).

Many countries are adopting similar policies with hostile hiring from the rest of the world. In Cameroon quite a good number of skilled workers migrate to United Kingdom and other country to pick up a good job. Also, Canada for instance in response to brain drain of its highly skilled workers to the United State introduced its own green card scheme to attract highly skilled workers all over the globe (Nunn, 2005). The American and Canadian green card scheme has attracted a lot of skilled migrants from Cameroon. According to Afro News (2015), 12,835 migrants migrated to United States.

Similarly, countries like New Zealand also adopted a “talent initiative” to encouraged skilled immigration and alterations to the existing policies to facilitate this (Sally, 2004). In many developing countries especially desperate unemployed Cameroonians easy fall prey to such attractive immigration policies. Many doctors and nurses from Cameroon migrate to these rich nations in search of jobs, higher salaries and better life.

Furthermore, another reason why highly educated skilled workers from Cameroon migrate is to benefit quality research opportunities abroad. According to Mugimu (2010), citing Frubel (1995) argues that professional research opportunities abroad are the primary reasons for the migration of talented workers. In the case of Cameroon, a poor funding atmosphere is one of the major factors behind the Cameroonian intellectual migration (Mugimu, 2010 citing Edokat, 1997). Similarly, Mugimu (2010) citing Tapsoba (2000), during a conference address on brain drain capacity building in Africa stipulates that: *“We are spending less and less on our higher education and our research laboratories are in a state of decay. Equipment’s and documentation materials are not regularly renewed. How can we keep the best of our minds if we continue to pay less our researchers and skilled (workers) than the youngest unskilled military personnel and our security guards?* This sounds ironical for a military personnel with little or no academic background to earn more than a researcher. This explains vividly the state of affairs in Cameroon espoused with the ruling government’s favouritism for military personnel aimed at discouraging any eventual military coup d’état. Tapsoba, 2000 citing the conference keynote further argues that, *“When war are not making living conditions impossible for (our diverse) populations, we*



*are doing everything to keep the best minds out of Africa. Even today, it is not surprising to see policy makers select foreign experts over well qualified Africans: brain drain is expensive for Africa and we cannot afford it”.*

In the same vein, in Cameroon, the expansion of university budget for instance has always not favoured teaching and researchers. The infrastructure and basic teaching are absent. The laboratories are not equipped, no good libraries and computers. The basic absent of these equipment can play a great rule on the development and economy of a country and also discourages those already in developed countries from returning home because it is really frustrating to work without the provision of basic needs. During the economic crisis that stroke sub-Saharan states in the late 80s to the early 90s, the salaries of all the civil servant were drastically reduced except that of the military. Due to all these elements, the financing of higher education in Cameroon has created avenues for dissatisfaction and longing to migrate. The western countries with all these facilities attracts skilled Cameroonians to pick up good jobs abroad (Edokat, 2000).

Another major reason that accounts for the brain drain of talented worker from Cameroon to other parts of the globe, is the profitable salary package. Irrespective of the differences in expenditure and living standards, the obvious truth is that the wide gap between income earners of both developed and less developed nations cannot not be compared. These accounts for the reasons why many people migrate to take advantage of the good salary package and better living conditions. In Cameroon low salaries or wages accounted for the migration of many civil servants especially those in the health sector and education after the drastic salary reduction in 1993 (Edokat, 2004). Developed countries such as United states, Australia, Canada and Europe knows and recognizes the value of skilled personnel and they are doing their best to maintain and even import from the rest of the globe with impressive salaries. Ironically in Africa as a whole and Cameroon in particular, their own home highly skilled workers are discriminated upon with foreign skilled workers. Also, even today in Africa, policy makers select foreign experts over welled qualified African and obviously with a good pay package. Higher wages accounts for the reason why young and talented Cameroon migrate to developed world (Mugimu, 2010 citing Tapsoba, 2000).

The presence of interpersonal migrant networks in the receiving country plays an important pull factors that attracts migrants as they already have sharing kinship or friendship

from the same origin. Family ties attracts skilled workers from Cameroon to migrate to Countries such as France, Canada, US, Germany, and United Kingdom, just to name a few have large numbers of Cameroonians. Most often than not, relatives and friends that migrated earlier act as informant and connections to jobs opportunities for those at home. (Rasool et al., 2012).

The absence of development and political instability, economic globalization, industrial nations attractive immigration policies, language and historical ties are contributing factors that accounts for developing countries to migrate (Donald & Chimanikire, 2005). These elements helps to understand better the migrations of Cameroonians to other parts of the universe. African labor in general was often recruited by the former colonial European powers as competition for more expensive European labor was the order of the day. For instance, France favoured its former African colonies and formed agreement with such African states. By 1960, approximately 20,000 sub-Saharan Africans were in France and by the 80s about 120,000 (Donald and Chimanikire, 2005). That was the genesis of migration flows during the post war era, mostly to ex-colonial nations. Cameroon and other central and West Africans migrated to France especially French speaking Cameroonians while the English speaking Cameroonians migrated to the English speaking United Kingdom. That said, the above factors will help to understand the massive exodus of Cameroonians to other parts of the world. It will be comparatively important to start with an overview of the Cameroon health system in order to better understand the causes of the brain drain.

### **3.4. The consequences of brain drain on higher education in Cameroon**

In understanding the consequences of brain drain in the Cameroonian society, it will be comparatively important to know the initial state of the country. Many countries in the world today that have become blooming fall under two grades. The first grade falls under those nations that consumed or possessed natural assets. In other words those country that have been prosperous enough to find themselves on large reserve of oil, gold, fertile soils, have an obvious advantage over those that are not successfully enriched. The second grade (majority) is composed of countries that have educated their citizen into prosperity (Buchanan, 2012).

Almost all countries that have long been comfortable in the world, have maintain that status by having a great number of educated people at least universal pre-college education. In this case of

Cameroon, it falls under the first grade enriched with natural assets but still a poor nation. Even with the numerous schools and universities around the country, unfavorable conditions have pushed so many great skilled personnel out. Education has not been encourage to a greater extent thus, hindrance to the country's success and expansion of the country. Also even the most poor resource nations of the northern and western Europe for instance have enjoyed much better and higher living standards than many rich resource country that do not bother themselves to educate their citizen. Again, just as some people were born great while others achieve greatness, it is the same with countries that were created on natural resources while other were not fortunate enough but do acquire theirs through good quality education. The countries that want to become prosperous have learned that economic dominance is anticipated upon the creation of high quality education. Japan for instance consumed only few natural resources and a dense population and as if it is not enough, the Second World War destroyed its industrial base. But even with the calamities that befall the Japanese, they were still committed in building a first class educational system. The outcome was great and Japan became the world's second largest economy but only recently that was surpassed by China (Buchanan, 2012). The brain drain of higher education teachers in Cameroon has a negative impingement on the economy as a whole. The intellectuals of any country are the most expensive resources because of their training and in terms of material cost and time. When a country like Cameroon is reap off its education then the country is deprived of economic growth because it is the fundamental pillar of the existence of any state. The migration of highly skilled personnel is a complete lost to the nation's concern. In Cameroon, the contribution to the development and growth of the university educational system has been totally lost to other country. Also their roles as imaginable leaders of tomorrow to the nation have been reduced and shattered (Edokat, 2000).

Furthermore, another impact of brain drain on higher Education Cameroon is the acute lack of teachers. The six universities are facing a severe shortage of teachers. This accounts for the lecturer crisis across the university to teach on part time bases. All the universities experience the acute lack of teachers as a whole. Also, some departments for instance the economic department has not got a single PhD holder. This affects the level and quality of teaching (Edokat, 2000). Also, the workload on teachers is too much coupled overcrowded classrooms.

Notwithstanding, the impingement can be felt on an intense shortage of teachers in the universities today. With the impact of brain drain in Cameroon, the following tables present the numbers of abandoned lecturers from the various universities between the period of 2004-2013.

Table 1. Abandonments of lecturers of the University of Buea

| Faculties or Training Colleges           | Numbers of departures per grades |                 |                     |           |
|--|----------------------------------|-----------------|---------------------|-----------|
|  | Assistant Lecturer               | Senior Lecturer | Associate Professor | Professor |
| Faculty of Art                           | 04                               |                 |                     |           |
| Faculty of Education                     | 02                               |                 |                     |           |
| Faculty of science                       | 18                               | 07              |                     |           |
| Faculty of social and management Science | 07                               | 03              |                     |           |
| Faculty of health science                | 01                               |                 |                     |           |
| General total                            | 32                               | 10              |                     |           |

Source: Department of Academic affairs of the University of Buea

From the table above, it can be seen 32 assistance lecturers and 10 senior lecturers migrated from the University of Buea between the period 2004 -2013. It is unbelievable that within this period, the university lose 42 lecturers from almost all the departments. Surprisingly, the faculty of science had highest numbers of assistance lecturer (18) and seven senior lecturer who abandoned their jobs. A country's strength on development and technology depends on this department and they are to highest number to leave. The outcome is obviously bad for the development of the nation. Again a good number of lecturers in the faculty of social and management science also left, making a total of 10 that is seven assistance lecturers and 3 senior lecturers. This is then followed by the Faculty of Art with four lecturers, Faculty of education with two and finally Faculty.

Table 2. Abandonments of lecturers of the University of Douala

| Faculties or Training Colleges                       | Numbers of departures per grades |                 |                     |
|--|----------------------------------|-----------------|---------------------|
|  | Assistant Lecturer               | Senior Lecturer | Associate Professor |
| Faculty of letters                                   | 09                               | 01              |                     |
| Faculty of law and political science                 | 05                               |                 |                     |
| Faculty of Science                                   | 06                               | 02              |                     |
| Ecole normale superieure de L'enseignement technique | 04                               | 03              |                     |
| Advanced school of economics and                     | 03                               | 01              |                     |

|   |    |    |  |
|---|----|----|--|
| Commerce                                    |    |    |  |
| University institute of Technology          | 05 | 01 |  |
| Faculty of Economics and Applied Management | 04 | 02 |  |
| General Total                               | 36 | 10 |  |

Source: Department of Academic affairs of the University of Douala

According to the table above a total of 46 lecturers deserted from the University of Douala within this period, comprising of 36 assistant lecturers and 10 senior lecturers. The faculty of letters had the highest number of deserted lecturers composed of 9 assistant lecturers and 1 senior lecturer. It was directly followed by the faculty of Science with 6 assistant lecturers and 2 senior lecturers. The lecturers in the faculty of law and political science with the institute of technology are also the least of lecturers abandoning their post of responsibility. Contrarily, associate professors and professors from this university did not desert their post of responsibility

Table 3. Abandonments of lecturers of the University of Dschang

| Faculties or Training Colleges               | Numbers of departures per grades |                 |                     |
|--|----------------------------------|-----------------|---------------------|
|  | Assistant Lecturer               | Senior Lecturer | Associate Professor |
| Faculty of Letters                           |                                  | 03              |                     |
| Faculty of Economic and Management           | 03                               |                 |                     |
| Faculty of Science                           | 05                               | 08              |                     |
| Faculty of Agronomy and Agricultural Science | 02                               |                 |                     |
| FOTSO Victor Institute of Technology         | 03                               |                 |                     |
| Faculty of law and political Science         | 03                               | 01              |                     |
| General Total                                | 16                               | 12              |                     |

Source: Department of Academic affairs of the University of Dschang

Here, desertion is made up of assistant lecturers and senior lecturers. On the contrary, associate professors and professors have not deserted over the period of study. In a whole 29 lecturers with 16 assistant lecturers, 12 senior lecturers and 1 professors deserted from the university of Dschang. The faculty of science topped the table with 5 deserted assistant lecturers and 8 senior lecturers. It was followed by the faculty of letters and institute of technology. Surprisingly, associate professors and senior professors are less willing to desert their duties.

Table 4. Abandonments of lecturers of the University of Yaoundé I

| Faculties or Training Colleges             | Numbers of departures per grades |                 |                     |           |
|--|----------------------------------|-----------------|---------------------|-----------|
|  | Assistant Lecturer               | Senior Lecturer | Associate Professor | Professor |
| Faculty of Science                         | 04                               | 06              |                     |           |
| Faculty of Art, Letters and Social Science | 03                               | 04              | 01                  | -         |
| Higher Teacher Training College            | 02                               | 03              | 01                  |           |
| Faculty of Medicine and Biomedical Science | 01                               | 02              |                     | 01        |
| Advanced School of Polytechnique           | 02                               | 01              |                     |           |
| General Total                              | 12                               | 16              | 01                  | 01        |

Source: Department of Academic affairs of the University of Yaoundé

The table above indicates that a total of 31 lecturers deserted from the University of Yaoundé I. In this university senior lecturers are more on the move with a number 16 compared to the number of 12 assistant lecturers. The faculty of science composed of the highest number of deserted assistant lecturers and senior lecturers with 4 and 6 respectively. Followed by the faculty of Arts, letters and social science with a total of 3 assistant lecturer, 4 senior lecturers and one associate professor. The other faculties followed with a lesser rate of deserted lecturers.

All lecturers are convoluted in the departure process over the time of study. The breakdown consists in classifying for each Faculty the number of abandoned lectures according to the different grades. This figure is made up from Assistance lecturers, senior lecturers, associate professors and professors. With the aim of clearly defining the impingement of this phenomenon, the total number of abandoned lecturer from the 4 universities sum up to 84.

From the above figure, it is noted that assistance lecturers are more bothered with brain drain. Upon recruitment in the various universities, some lecturers decided to spread their chances by applying in different countries and thereby abandoning their previous post as soon as they are recruited abroad. As earlier mentioned above, low salaries package constitute the major factor of these abandonments. According to Edokat (2000) argues that the circumstances of work at the university is not conclusive as 60% of lecturers do not have personal cars, 80 % do not have personal houses whereas 70 per cent do not have offices. He further argues that assistance

lecturers who are young do not master the reality of the professional world often fly high and have the ability of resignation.

Although the impact of brain drain on both the HE (Higher Education) and the health sector is really disadvantageous, it will be relative important to examine if there is actually any gain left for the country Cameroon.

### **3.5. Impact of migration and brain drain on Cameroon's health sector**

The impact of migration and brain drain especially in the medical field is not gloomy. The Cameroon's medical sector is really in crisis because of the severe shortage of medical doctors as a result of huge migration to developed countries. According to the WHO, Cameroon has an acute shortage of human resources and also lacks the economic resources. They do not only lack human resources, but also lacks the economic resources to supports the mass recruitment of new health workers. Between 1990 and 2009 in Cameroon, only 27 per cent of individuals who completed their training at nursing schools were actually recruited by the ministry of public health (World Health Organization 2013). In 2011 for instance, Cameroon witness severe shortage of staff in the field of mental, ophthalmology and anesthesia resuscitation were known to exist. Most often, the training students in health school have different ambitions to work as state registered nurses or laboratory, nursing in other fields of medicine. The public sector employed about 66 per cent of health workers but more workers are needed in both the public and private sectors.

The migration of expert functionary from Cameroon has negatively changed the quality of health care offered by the health institutions. In Cameroon the disinterested and insolent attitudes towards patients can be largely attributed to low morale resulting from excessive workload coupled with the stress of dealing with so many dying patients. At the district levels, the workload on physicians cannot be compromised. Normally, health information staff are accountable for data collection, reporting analyses, but it is not the case as such tasks are often given to the overburden physician who sees the tasks as unwelcome additional work that detracts from their ordinary role (Okalla & Vigouroux, 2009). The obvious effect is clear. Insufficiency at work can be disastrous. Most of the doctors often complain of sleeping at work due to too much work and no time to have enough rest. Cameroonian physicians consult about 50 patients a day

and earn about 450 US dollars per month. This has a negative impact on the equity of access for the poorest. Many patients are being turned away from busy public clinics so as to deal on with their private hospitals. The migration of skilled health worker or professionals in the public sector has resulted in significant changes in the quality of care provided. The major problem lies in the understaffing of the health institution. According to Chikanda (2004) 28 per cent of patients have to wait longer before medical attention which has resulted to unnecessary death and some patients die from disease that can be cured. In Cameroon just like in many African countries, patient dies without having the chance or opportunity to see a doctor. The ratio for is too wide 1:50,000 inhabitants. Too many patients fewer, doctors accounts for all these disasters. The experienced personnel have migrated, the quality of care has dropped and the health system of the country has essentially crippled. The impact of this is greatly felt in the rural areas. In many rural areas in Cameroon many patients cover long distances only to consult a doctor and coupled with the long queue end up without consulting a doctor or ends up in the hands of unqualified nurses who attend to patients. The fact is that the quality of care rendered has subsequently been compromised. In Cameroon, even though the country is facing shortages of health workers, the unemployment is still high. According to Ngufor (1999) opines that structural adjustment policies and related fiscal limits on government, is to the effect that new health are not employed even when the demand is high or do exist, rather retrenchment from the public sector is still the order of the day. Highly skilled personnel are forced to migrate. The brain drain in Cameroon also leads to the cause of ghost workers. In essence, a ghost worker is a person who fills the payrolls but do not actually exist at workplaces (Dovlo, 2005).The government losses enormous sums of money paying salaries to people who actually do not work.

The Cameroon health sector also faces the problem of indirect wastage. This has been supported by Dovlo (2005) who opines that the concept of indirect wastage as contrasted to direct wastage refers to losses that arise for inadequate productivity or use of health workers. This arises as a result of the inadequate use of staff already employed and providing services. In this case, two forms of indirect waste occur, the inappropriate use of skills and ghosts epidemic payrolls while restricting the chance to employ new workers. Brain drain entails considerably losses for those left behind and increases global inequality as many greatly skilled professional from Cameroon migrate to developed nations.



In Cameroon another great challenges of brain drain of high skilled emigrant is that they do not pay taxes in their home country Cameroon once they migrate. The education they receive in Cameroon is highly, partly, or totally subsidized by the government emigrants leave without repaying their debt to the state. Payment of taxes is very important for the growth and development of a country. This is the means by which the government pays and provides for all things the society governs and needs. In Cameroon, it is important to the society than to the government. For instance of running of public services especially schools has been highly subsidized by the state .The receiving country benefits greatly as taxes are being paid to them. The shortage of manpower in key activities, as when health professionals emigrate in extremely large figures undermines the country's ability to adopt new technologies or deal with the crisis. Furthermore, an increase in technological gap is certain between the industrialized nations and developing nations because human capital has been concentrated in advanced economies contributed to their technological progress. Many skilled Cameroonians are booming the economy of other advanced nations like France, Britain and United States.

The emigration of Cameroonian doctors and nurses has led to the numbers of patients who visit the traditional doctors. The role of traditional healers in the society has declined with the introduction of modern dominant medicine. Due to the collapse of health care system in recent years, traditional healers are trying to fill the gap by playing an important role in the health care system (Dovlo, 2005). In Cameroon, long queues could be observed at the residence of the traditional healers in both urban and rural areas. Some of these traditional healers do claim they can cure all diseases including HIV/AIDS. The poor are finding themselves without formal health care services with affordable prices. Some of them die for taking the wrong treatment due to the fact that they do not have the equipment to diagnose the right illness but rather act on quest work.

### **3.6. Brain gain in Cameroon**

A brain drain may be more than compensated for by the brain gain in the opportunities for skilled workers to emigrate to rich nations create an incentive for more people to become educated in poor countries. According to Docquier (2014), the impingement of brain drain on the country of origins welfare can be beneficial or harmful. Apparently, there are many losers than winner among the developing country. The gain or loses all depends on the country specific

factors, level and design of migration, level of advancement and other characteristics such as language, population size and geographical location. The role of the policy maker in guarding the cost and prosperity of the brain drain in order to design appropriate policy responses. Brain drain can be seen as a stimulant of education includes; remittance flows, reduce international agreement cost and why not generates prosperity in source countries from both returns and the Diaspora abroad. Those within the Diaspora often take different perspective from the traditional view that brain drain is predominantly seen as a loss. According to Mugimu (2010), the Diaspora can be possible gain to the country of origin. The highly skilled personnel are seen as a pool of future useful human resources for the country of origin.

The global impact of brain drain on development and income for those who are left behind depends on the remittances from those in Diaspora. Remittances by high skilled migrants to family can fill up the stock of human capital that may be exhausted in the home country by the brain drain. According to Docquier (2010) argue that although the proof is still unclear on the relative tendency of high skilled and low skilled migrants to remit.

According to world Factbook 2011 on remittances, it was established that approximately 325 million US dollars are recorded remittances received by developing countries. According to CIA Factbook (2011) migrants remittances are defined as the as the sum of worker remittances, earnings of employees and migrant transfer. Workers' remittances according to IMF in the balance of payment manual 6th edition ( IMF 2010a) as current private transfers from migrant workers who are considered residents in the host country to recipients in the worker's country of residence. Here a distinction is made as to the time the migrant lives out. In the case where the migrant lived in the host country for less than one year, their entire earnings in the host country is considered as bonus of employees. Moreover, if the migrants lived in the host country for a period of one year or more, they are considered as residence irrespective of their immigration statute. The last but not the least is the migrant's transfer which is the net wealth of migrants' assets that are relocated from one country to another and usually, the period should be at least one year. Although the rule and layout on remittances is clear, it is most often not followed for various reasons because many nations assemble data based on the citizenship at the migrant worker rather than on the residency status.

To effectively understand brain gain in Cameroon, two schools of thoughts continue to debate whether remittance by Diaspora to their home country is an improvement or disadvantage

of the brain drain. The first school of thought opines that remittance by adoptive citizen to their country of origin is an advantage of brain drain. According to Tessama, research by IMF has explains that remittance by immigrants plays a vital role in the development of living conditions of the people in home country. Research has outlined that remittances of earning by employees from developing countries exceeded official development aid and incomes from the export of goods and services in several developing countries. With this image in mind, it obvious that to an extent, remittances are strongly assign to the developing world economies. In fact remittances are helping out many household in developing countries in sub-Saharan Africa and Cameroon in particular. This point has been supported by Docquier who accepted the fact that migrants remittances is an important channel through which the brain drain may create positive indirect effect on the countries of origin. In this vein, one cannot deny the importance of remittances as funds sent by migrant to families back home, plays an important role in the development of local economy. A great numbers of young Cameroonians are unemployed thus remittances contribute to the development and relieving the unemployment and also increase the supply of foreign exchange in the country.

Cameroon also benefits from high- skilled immigration in relation to flows of income, investment and expertise from migrants back to the sending country. In an article congress 2013, it was established that Cameroonian Diaspora, with an estimated population of about 390,000 continues to rapidly expand and its annual contribution to the country's economy has be valued at more than one per cent of Cameroon's Gross Domestic Product (GDP) . That is approximately 218 million US dollars as of 2010.

Apart from the positive side of brain drain, the second school of thought thinks otherwise. The second school of thought is of the opinion that remittances by immigrants to their home country does little aid to the economic development of the sending country that has lost its citizens through brain drain. Tessama warned people that they should not be moved by the findings of the IMF that remittances aids in the development of living conditions. This is to the effect that remittances do not show income transfer have had a positive impact on the development of the home country. To support this fact in relation to Cameroon, if the statement and facts from the IMF is true, then Cameroon could not be swimming in poverty and could have been economically developed from remittances from abroad. Docquier is of the opinion that gains from remittance are too small to even out losses of brain drain .In regards to Cameroon; the

impact of brain drain cannot be put on equal scale with benefits from remittances. Moreover, remittances decline as the period of time migrants spend abroad increases. The second school of thought argues that skill migrants often come from wealthier families and therefore less need to remit. In examining to fact to Cameroon, most top members of government have send almost all their children abroad and basically needs little or nothing from them as their positions already guarantees a good living standard and any remittance from abroad is just a luxury and not a necessity. Also most educated migrants tend to leave with their families thus income from remittances is being reduced.

### **3.7. Analysis of results**

This section of the study will present the analysis of the data collected from the field by the author. For the sake of effectiveness and efficiency of the study, the author embarked on a random selection of respondents (Cameroonians) based in the various continents of the world. The idea behind this was to gain a mastery or at least a cross analysis of the pattern of migration and eventually brain drain in respects to those region and their impact on Cameroon.

In this light questionnaires were sent out to randomly selected respondents based in the different continents and the author also scheduled some strategic interviews with those respondents that had time and were willing to comply. The author's wish was to balance the gender of the respondents but considering the dynamics and patterns of international migration it was unlikely that the gender could be balanced because males were more prone to emigrate than the females. As already mentioned in the limitations of this study the author supposes that the figures presented are an underestimation of the number of Cameroonians in these parts of the world.

A total of 250 questionnaires were sent out to respondents in Europe, Asia and North America and a total response of 200 was received. The number does not equate the number of Cameroonians because there was a large number that the author could not get in contact with. It will be imperative to outline the major objectives of this study which serves as a guide for the analysis of the results. This pilot research sets out to:

- To analyze the ever growing number of Cameroonians emigrating to western industrialized nations
- To ascertain the push factors that triggers this emigration and pull factor that entices these individuals.

- To determine the consequences of this phenomenon on Cameroon economic development for the future
- If this phenomenon of international migration and consequently brain drain can be reversed?

The data in this section is divided into two parts. The first section consists of the personal details of the respondents while section two consists of questions posed directly related to the study. The information for the sake of clarity will be presented in a tabular manner.

Table 5. Gender of respondents

| Age Groups |         |       |
|------------|---------|-------|
|            | Females | Males |
| 25- 35     | 20      | 35    |
| 35-45      | 30      | 50    |
| 45- 55     | 10      | 23    |
| 55- Above  | 11      | 21    |
|            |         |       |

Source: Compiled by author on the basis of data provided in Appendix 1

It can be deduced from table 5 above that 80 out of the 200 respondents comprises of individuals between the ages of 35-45 which makes the greatest percentage of Cameroonians as per this study. They represent the age group that relatively possesses a higher tendency to emigrate. Implying people within this age group, must have completed their studies and belong normally to an active working age are more likely to leave the country, hence constituting the lost of talented individuals. Similarly, the age group 25-35 also represents the second on the list with the tendency to emigrate. However, males to the chart with the highest number of respondents. This goes to complement the facts discussed under the patterns and dynamics of international migration.

The Study all explored the educational level of the respondents so as to ascertain some of those factors that influenced to a greater degree their reason to emigrate and eventually likely to influence their return

The table 6 and 7 below shows the educational qualifications of the respondents and their intention to return home.

Table 6. Educational qualification of respondents

| Qualification                    | Number |
|----------------------------------|--------|
| Illiterate                       | 5      |
| First School leaving certificate | 15     |
| Ordinary Levels                  | 25     |
| Advanced level                   | 35     |
| Bachelors                        | 50     |
| Master's                         | 60     |
| Ph.Ds                            | 10     |

Source: Compiled by author on the basis of data provided in Appendix 1

Table 7. Intention to return home

|                | Ordinary Levels | Advanced Level | Bachelor's | Master's | Ph.D |
|----------------|-----------------|----------------|------------|----------|------|
| Within 2 years | -               | 15%            | 10%        | 10%      | -    |
| 3 to 5 years   | 30%             | 20%            | 25%        | 15%      | -    |
| After 5 years  | 30%             | 30%            | 9%         | 48%      | 70%  |
| Not sure when  | 60%             | 35%            | 56%        | 27%      | 30%  |

Source: Compiled by author on the basis of data provided in Appendix 1

Figure 6 and 7 above indicates that there are more Cameroonians with Master's degree living in the Diaspora than any other educational level, followed by those with bachelor's degree holders The raison d'être behind this is mainly because a majority of those in this category left the country as students and are still in their process of studies ( from Bachelor's to Master's) Figure 7 on the other hand indicates that a majority of Cameroonians ranging from those with

ordinary levels to those with Master’s degree were not sure of when to go back home. Most Ph.D holders were more likely to go back home in the next five years same with a 48% of Master’s degree holders.

According to statistics from UNICEF and World Bank, 2013 statistics, Cameron’s literacy rate stood at approximately 78% for males and 65% for females which indicates a relatively high rate of literacy level. This accounts for the reason why figure 6 above demonstrates a lower level of illiterates on the table.

It was also imperative for this study to analyze the reason why the respondents moved abroad or emigrated. This has been illustrated below in a tabular form as per the different age groups.

Table 8. Main reason for moving abroad

| Age Group | Work Related | Studies | Family Reunion | Political Factors | Others |
|-----------|--------------|---------|----------------|-------------------|--------|
| 25-35     | 15%          | 70%     | 10%            | 5%                | -      |
| 35-45     | 50%          | 25%     | 10%            | 10%               | 5%     |
| 45-55     | 45%          | 20%     | 15%            | 15%               | 5%     |
| 55-Above  | 20%          | 5%      | 50%            | 15%               | 10%    |
|           |              |         |                |                   |        |

Source: Compiled by author on the basis of data provided in Appendix 1

From the entries in figure 8 above it could be deduced that those respondents who fall in the age group 25-35 years (70%) emigrated with studies as their main reason as opposed to those in the age group 35-55 years whose main reason for emigrating was for work related purposes with a 50% and 45 % of the respondents adhering to these facts. Those in the age group 55 and above emigrated through family reunion to join their families and relatives abroad. This reminds me of a respondent in North America who admitted filing for citizenship for his mother to join him. Mr. X I quote “I will apply for my mother to join me here so that it spares me the expenses of having to travel home frequently”.

**Financed of trip**

From the data collected most of those respondents who emigrated in the age group 25-35 years who emigrated as student had their travel expenses incurred by their parents or immediate

family relatives. Scholarships such as Erasmus Mundus on the other hand benefited only a few of them. Those in the age group 35-55 years and above had their travel expenses incurred by themselves considering the fact that almost all of them were in active work life before emigrating.

The legal status of the respondents ranges from temporary residence to naturalized citizens. Most of those who emigrated as students had temporal residence permit while those who emigrated on work related factors had permanent residence which could be transformed into naturalized citizenship as time unfolds.

### **Length of time living abroad**

According to the data those respondents in the age group 35-55 years represents the highest number of individuals living abroad for 10 years and above. Those in the age group 25-35 accounted for 0.6-5years (30%) and the lowest those in the age group 55 and above with 10%. However, those in the age group 35-55 years explained having achieved enormous investment back home. Most of the respondents boast of sending money back home on regular bases to support their family.

### **Conditions of work abroad**

In regards to opinion about forms and conditions of work abroad, from the statistics deduction could be made most Cameroonians emigrated as students composed of 70% of the total respondents with studies were their prime reason for emigrating. Considering the policy shift in most of European countries whereby students from developing countries did not return home after completing their studies to develop the human capital of their nations. With this policy shift most students are given the opportunity to have their students status changed after submitting a job contract (any form of job) to the immigration services. Most students are left with the choice to pick up odd jobs even after graduating with a Master's degree just to secure a residence permit. Conversely, a majority of the students enumerated a series of constraints in finding jobs in their field of studies. This highlights the words of respondent X a master's degree holder in International Business "I have no choice but to work as a night post delivery man". On a general note, this was so common with the respondents in Europe who were compelled technically to do odd jobs after pursuing a degree due to the fact that they do not consider returning home as an option. The author remembers a respondent who said "*what I earn here doing odd jobs, even upon my return home I will not earn such a salary even with my master's*



*degree*". Respondents from North America expressed enormous satisfaction with their jobs but most expressed the lack of satisfaction for not working in the positions that their level of education warranted. This also raises the issue of brain waste whereby talent is unemployed or underemployed.

Most of the respondents in the age group 35-55 could give a clear explanation of what is brain drain with the use of themselves as common examples as opposed to the relatively younger counterparts. Respondents working in the health profession confessed the work conditions and salaries in Cameroon were so unpalatable, "imagine I earn as salary approximately an equivalent of 300USD as a medical practitioner in Cameroon and I consult approximately 50.000 patients a year". Others complained also about the lack of good work equipment especially in the laboratory and surgical rooms to facilitate their work.

A majority of the respondents in all the age groups irrespective of their legal status, academic and professional status strongly affirm to their identity as Cameroonians. They sounded patriotic as they claim to have never lost ties with their motherland as they call it. Others explained their sense of patriotism can only be reinstated when the present regime which has been in power for more than three decades characterized by pervasive corruption finally changes. They claim the regime accounts for the social, economic and political crisis prevailing in the country which was the same reason that accounted for their emigration.

## CONCLUSION

To sum up, international migration and brain drain has been a problem in advancing nations in total and will remain so if critical dimensions are not taken to check the phenomenon. The impact of migration and brain drain in Cameroon comprised the migration and brain drain of highly talented individuals to advanced countries. In this study, the author has attempted to identify the main reasons and consequences of both higher education and health sectors (doctors and nurses). Moreover, from both the qualitative and quantitative research carried out on the impact of migration and brain drain in Cameroon, it was established that the economic and financial aspect are the prime push factors responsible for the migration and brain drain of skilled workers from Cameroon especially in higher education and the health sectors while other social political causes follows the migration of skilled workers. From the findings, it is clear that low salary package coupled with other factors are the main reasons why skilled professionals migrate out of the country. In essence, the causes of migration and brain drain can be summarized into two complicated and interrelated categories, the push and the pull factors. In Cameroon, the push factors responsible for the migration of talented professionals includes; the lack of suitable good governance, the absence of peace and stability, absence of future education and career development hopes, declining economic conditions, lack of job satisfaction by workers, unemployment and most especially low salaries. On the other hand, pull factors also accounts for the migration and brain drain of healthcare workers and higher education teachers from Cameroon and includes: higher wages, globalisation, good working conditions, attractive green card schemes and employment. Although brain drain has a negative impact on Cameroon, the positive side of brain drain cannot be undermined such as: remittances of incomes by immigrants, relocation of knowledge and technological investments of the country of origin. The adverse aspect of brain drain is quite huge and acts as hindrance to the development of Cameroon's economy. They include; brain disuse or waste, drop down of investment and consumption spending, drop down in taxes collected and the slowdown of development in Cameroon. Moreover, that notwithstanding the impact of migration and brain drain in Cameroon, all hopes are not gone and the only options to slow down migration and brain drain can boost the economy if the government together with the citizens implements these policies. These includes; the government should guarantee employment upon graduation, improve on the pay package or

competitive salaries and allowances should be improved, make the working environment enabling for workers, improve on infrastructures, well equipped schools and hospitals, and make available the latest technology to the country especially in schools and hospitals as these are the back bone of the country's development. Furthermore, the government should improve on the quality of education offered especially in the science field, financial assistance should be given to young talented scientists to help them carry out research, promotion should be on merits and qualifications and not on personal connections, discrimination should be eradicated, education should be tailor towards industries thereby training technicians and skilled labor that will help the running of the industries, reduces taxes to encourage private investors to operate private schools, industries and hospitals which will enable young Cameroonians to be trained and jobs guaranteed, sensitization and orientation of young Cameroonians will tremendously help to slow down migration and brain drain in Cameroon. So far, the causes of brain drain are the diversity among countries or nations in economic and professional favourable circumstances, are the compelling reasons for the movement of people from place to place to improve the social and economic status, and access to training and employment opportunities abroad. The brain drain in Cameroon has both the factual and the unfavourable consequences and the bitter truth is that the negative aspects of brain drain out-number the positive aspect of it and thus needs to be redressed. From slave trade to brain drain undergone by Cameroonians has slowed down the socio- economic and political development of the country.

### **Options to slow down international migration and brain drain in Cameroon**

Although it is obviously not possible to stop people from moving to advanced nations for better opportunities in the era of globalization, the negative impingement of such movements on economic advancement merits urgent attention. The best ways to prevent the high figure of highly talented labour migration lies in addressing the economic essential issues of sub-Saharan African nations as a whole and Cameroon in particular, will ultimately modify the living standards. In policy terms, there is the need for government particularly Cameroon to address the economic problems that are compelling people to go out of the country and include:

The quality of education has to be improved upon to the world-wide standards so as to retain skilled workers. The truth is most people will like to work in the country where they are born, and when the future of their children are guaranteed through good education, they will stay back home. In essence, knowledge is power and there is no place better than home and when the

standard of education offered to children is ascertained this will encourage skilled workers to remain.

In regards to the higher education in Cameroon, there is the great need to increase the budgetary allocations. The provision of basic structured will not only be insured but will thus increase the capacity of research. Also within the higher education sector, there is a demand for a national reallocation of the university budgets to give teaching a preference. If the government place universities at the forefront of development policy, the factual result will serve socio-economic development as well in the health sector.

Although Cameroon is trying to reverse brain drain by boosting the salaries of university academicians after two major foreign debts were cancelled, Cameroon decided to put the "windfall" to use in the health, engineering and educational sectors. More still has to be done. The increase in salaries for higher education and health sector will tremendously led to more productivity thus fewer exodus of Cameroonians. The provision of competitive salaries and good condition of service cannot be under look, In other words, the government needs to amend the situation of university teaching staff in relations and social prestige. Also the universities should be given the chance to initiate and use their own budget to meet their current expenses.

Another way to slow down migration and brain drain in Cameroon, if for the government to improve on the working conditions like that of the developed world. Both the health sector and higher education sectors needs to be revitalized especially dilapidated facilities, has to be replaced. In essence, the government has to make the environment enabling. Also make provisions for research equipment and well-furnished hospitals, will change the minds of so many Cameroonians who intend to travel abroad. The young talented fresh graduate from school should be given the chance to put in practice their acquired knowledge. Also the government should subsidize taxes especially to private investors who wish to open schools, industries and hospitals. This will go a long way to divert the minds of young Cameroonians who which to acquire more knowledge as it is often said that knowledge is power, and why not be self-employed and secure a job in the industries and hospitals.

The extension of financial support to young Cameroonians to pursue post graduate universities in African and other developing nations is also very important as this will make most of them to came back home because they have almost the same living standards and nothing striking will moved them or attract them to stay. On the other hand, the danger

involves in sending people to developed countries is that many will be carried away with technology and good living standard will not want to return. The government should also guarantee jobs to young Cameroonians, talented young scientists to help promote their research productivity as this will slow down their ambition to travel abroad.

Again, good promotion policies should be implemented not depending on the political groups or affiliation to ascend the professional rank, it should be by merit irrespective from which political party you belong or from which region you came from. Many English speaking Cameroonians often complain of high level discrimination even when they are highly qualified and as a result, many of them migrate to different countries to work. Cameroonians needs to be treated like one people irrespective of where one comes from.

Moreover, organization of seminars and sensitization campaign programmes should parade both public and private radio, television and newspapers to sensitize Cameroonians about the reality of the western or developed world. Many leave their noble jobs to pick up odd jobs abroad thereby leading to brain waste. Also the government should take upon them as a task to bring in any latest technology into the country that will improved on the economic advancement of the country. Again, make available the latest technology particularly to schools and hospitals. The service industry should be improved, affordable and make available online teaching even through Skype to facilitate distance education within the country and international as this will give the opportunity to researchers, or academicians to study without necessarily travelling abroad. The national television should improve on their programs that can educate the youth especially training programs and career orientation.

Furthermore, at the governmental flush, there are demands to fix some trust and assurance in the future of the country in relation to political flexibility and good governance. This will go a long way to encourage some of the instructors who were hanging in thread to return to Cameroon. Also, the university organization both the public and private need to be amended taking into application national and social objectives. Moreover, education should be tailored towards industries as they need skilled labor, and technicians to run the industries unlike always importing foreign experts. The curriculum need to be modified and adopted to the need of time in order that those who hope to return from abroad can infuse themselves within the university organization do not find themselves floating or engrossed.

Cameroon has decreased behind other African countries such as Senegal, Rwanda, Kenya, and Ghana in taking concrete steps to integrate its Diasporas into national policy making which can go a long way to encourage them to come back home if given the chance to express their minds. If these options to slow down migration and brain drain in Cameroon are respected or put in practice, there is no hesitation that the phenomenon of brain drain gradually and surely will change to brain gain.

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## APPENDICES

### Appendix 1. Questionnaire

I, Afu Immaculate Ache, Master's student from Tallinn University of Technology (TTU) Tallinn, Estonia. I am conducting a research on the effects of international migration and brain drain in Cameroon. The work is purely for academic purpose and your confidentiality and anonymity will be duly respected in regards to any personal information provided here.

#### PartOne : Personal Information

1. **Name** : \_\_\_\_\_

2. **Age** : \_\_\_\_\_

3. **Sex** :

a) Male

b) Female

#### 4.MaritalStatus:

a) Married

b) Single

#### 5.EducationalQualifications :

a) Illiterate  b) Primary School

c) High School  d) Graduate

e) Post-graduate  f) Any Other

#### 6. Source of earning:

\_\_\_\_\_

**7.Nature of Job :**

- a) Temporary  b) Permanent

**Part Two : Questions**

**8. Reasons for leaving Cameroon?**

- a) Studies  b) Skilled Work   
c) Others

Explain: \_\_\_\_\_

**9.Means of Finance of Trip?**

- a) Family  b) Personal Savings   
c) Scholarship  c) Others

Explain: \_\_\_\_\_

**10.What is your legal status abroad?**

- a) Temporal Residence  b) Permanent Residence   
c) Naturalised

**11.Length of time living abroad?**

- a) 0.6-5years  b) 5-10years   
c) 10-Above

**12.Any plans of Returning to Cameroon?**

- a) Within 2 years  b) 3-5 years

c) After 5 years

d) Not sure when

**13. What are your personal developments since living abroad?**

Explain: \_\_\_\_\_

**14. What are your opinion(s) about forms and conditions of work abroad?**

Explain: \_\_\_\_\_

**15. What do you understand by brain drain?**

Explain: \_\_\_\_\_

**16. Is patriotism essential to you?**

## Appendix 2. Map of Cameroon

