

Master Thesis

A STUDY OF THE NEXUS BETWEEN  
TRADE-RELATED VARIABLES AND  
EMPLOYMENT IN THE NEPALESE  
ECONOMY

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The Graduate School of Hansung University

Major in International Market Analysis

Dept. of International Trade and Economics

Lamichhane Mahendra



Master Thesis

Advisor Professor Yoonkyo Cho

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-네팔 경제에서 무역 관련 변수와 고용 사이의 연관성에 대한 연구-

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# Abstract

## A Study Of The Nexus Between Trade-Related Variables and Employment In The Nepalese Economy

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The primary purpose of this paper is to investigate the effect of trade-related variables and employment using the yearly time series data for the period 2000 to 2020. The evidence of this study suggests that gross fixed capital formation, export, and population size have a significant impact on employment. This indicates that the export starting effect on the total workers is more substantial than wages per worker. This study examined the impact of the Foreign Direct Investment in employment creation in Nepal. It was found that these variables had an insignificant impact on employment, where the results showed a positive impact on the number of total workers due to export and gross capital formation. Hence, the manufacturing sector of Nepal can provide employment with export-quality goods and services. Moreover, it was also revealed that the most significant effect regarding employment among

variables is gross capital formation. Overall, this study found a causal effect of the export entrance on employment. As Hwang et al. (2017) argued that exports have an effect on the employment of both types of workers could be different. Here, further work needs to be carried out to explain the specific channels in which export activity increases employment. It is also necessary to conduct relevant research considering the characteristics of both employers and employees. Moreover, discuss different export areas local investors are interested in.

Keywords: [Gross Fixed Capital Formation, Foreign Direct Investment–Net inflows, Export, Population Size, Employment, open market, Nepal ]

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# CHAPTER I

## INTRODUCTION

### 1.1 General background

Trade refers to the alteration of goods or services. In recent centuries, trade was limited inside of a country due to many obstacles. However, nowadays, trade is taking place outside the countries, which we know as international trade. The development of a country (Economic growth) and employment is highly related to international trade, is becoming popular because of trade liberalization, more specifically for the open market. Trade liberalization means there is moderation on tax, customs, and tariffs, while the open market refers to the trade on which there will be no tariffs or charges like vat, tax, or customs duties. The open market is receiving popularity in developing countries like Nepal and other developed countries too, due to its usefulness for increasing employment opportunities. Nowadays, a range of products such as food, clothes, high-tech merchandise, and many more shared among countries based on export and export has impacted the growth of employment and industry. Especially for developing countries like Nepalese, economies are conditional on the growth of export volumes. In a study, the results of the estimations show a positive and significant effect of Open market-related variables such as FDI, Export and other variables, foreign exchange rate, and population on employment. Indeed, industrialization and investments were found to significantly increase employment in Cameroon. (Ngouhouo & Nchofoung, 2021).

Trade liberalization and globalization have opened up a common area for all countries across the world for trading goods, exports, making foreign investments and transferring technology. After the 1970s, international trade expanded all over the world as most of the developing and transitioning countries achieved liberalization in terms of trade and financial development. As per the World Bank, about 27% of the world GDP was comprised of trade in 1970, which has increased to about 60% in 2019 (World Bank, 2019). Mounir (2014) stated that the technological progress in industry and educational index also explains the growth in any economy via spillover effects on human capital and employment.

In the context of Nepal, the economic liberalization policy was enacted in 1984 B.S. This opened doors for financial institutions, traders, and investors. Economic liberalization was followed by trade liberalization and financial liberalization, which deregulated the role of the government and allowed the market to regulate it. This accelerated the establishment of different types of financial institutions, which in turn facilitated domestic investments in the country and the formation of gross capital. Financial institutions play a vital role in the expansion of the manufacturing and trading sectors of the country by providing loans to those sectors. The gradual effect of liberalization in Nepal can also be seen in 1990, which accelerated international trade. A decrease in import tariffs, liberal trade policies and foreign direct investment policies were formulated, which caused a structural transformation of the country (Shrestha, 2017). Nepal became a member of the World Trade Organization in 2004 A.D which reduced administrative barriers and tariffs. This allowed for the further growth of FDI in finance, health, education, and many more sectors of

the economy, either directly or indirectly.

Similarly, the admittance to worldwide business and international trade sectors can likewise offer a large group of business openings and opportunities for any country, for example, new specialty markets; conceivable outcomes economies of scale, degree, volume and mechanical benefits; effective use of educated people and population the updating of innovative ability; methods of spreading chances; bringing down and sharing expenses, FDI, including R&D costs; and as a rule, bearing the cost of improved admittance to back (OECD, 2016). In The cycle of globalization, the battle for endurance, steady pressing factor and the need to protect and fortify the market position, hence Nepal, as a developing nation, also needs to investigate openings for accomplishing the upper hand and growing business exercises in the home market, taking advantage of the opportunities provided by international trade in terms of FDI, export, investment and gross capital formation so that the country can be able to achieve a higher scale of.

The above discussion shows that the studies dealing with the impact of the Nexus on internal trade, gross capital and business variables, and employment in the Nepalese economy are of greater significance Hence, this study attempts to analyze the relationship between the nexus between international trade variables and business openness variables such as export, FDI, industry, gross capital formation, and employment in the Nepalese economy.

Rizvi and Nishat (2009) in their article indicated that in Asia, India and China received a main amount of foreign direct investment and FDI

flows to Pakistan also enlarged significantly and FDI plays a significant role in generating employment in host countries, this article finds that FDI contributes to the creation of employment opportunities in 1985–2008 in the Asian region based on the sample of three countries i.e. Pakistan, India and China from the same region. However, in the Nepalese context, no such study has taken place.

## **1.2 Statement of the problems**

Many empirical studies can be found on trade expansion and employment growth. Empirical studies conducted by Sachs and Warner (1995) supported the suggestion that Open market and export opportunities induce employment opportunities and economic growth in the country. Ondo and Bah (2020) find that the Open market, FDI, and labor market regulation have a positive and significant impact on youth employment. Detecting the connection between the Open market and employment is the main intention of this research.

Kim et al. (2012) provide evidence that export promotes employment in high-income, low-inflation, and non-agricultural countries but has an adverse impact in countries with the opposite trait. Since Nepal is still an agricultural country, it is necessary to examine whether export is promoted or not. Were (2015) finds that trade exports have a positive and significant effect on employment rates in advanced and emerging countries, but its effect is not noteworthy for the least developed countries, which largely includes African countries? Since Nepal is a developing country, it is necessary to examine the impact of international trade-related activities on employment.

Dorn, Hanson, and Song (2014), an increased Open market has a adverse impact on remunerations and employment, particularly for low-skilled workers. Hasan, Mitra, Ranjan & Ahsan (2012) studied the relationship between unemployment and trade liberalization in India. In this study, they focused on industry-level and state-level analyses using labor force survey data and found a significant, negative relationship. Hence, in the Indian context, the open market and FDI have increased employment. Lee and Choi (2009) used The PSM approach to regulate a selection bias difficult by controlling firms' noticeable features of export-starting firms as well as non-exporters and this study found the causality between export and wages/employment. Similarly, Kim and Choi (2017) used a Korean built-up data set from 1984 to 2015. According to their paper, productive firms participate in the export market, but it is still unclear whether the output of exporters increases due to export. They also found out that exporters presented well presentation in employment, value-added, real wages, and labor efficiency than non-exporters. Though there is the above-mentioned empirical evidence in the context of other countries and in Nepal, no such evidence using more recent data exists in the context of Nepal. Boarnet (2005) provides arguments to justify population size as an important factor to explain employment growth; however, in the Nepalese context, this relationship has not been justified.

### **1.3 Research Question**

This study therefore deals with the following issues in the context of Nepalese employment :



What are major determinants of the nexus between export trade and employment in Nepalese economy?

What is the trend of foreign direct investment net inflows, official exchange rate and investment and population size in Nepalese context.

Do investment, industry and population size impact on employment in Nepalese economy?

Is there any impact of Gross capital formation on employment in Nepalese economy?

What is the relationship between investment, and Gross capital formation and population size as a measure employment in Nepalese economy?

Do investment and population size help to increase the employment in Nepal ?

#### **1.4 Objective of the study**

The major objective of this study is to examine the nexus between trade-related variables and employment in Nepalese economy. Other specific objectives of the study are as follows:

To identify the impact of investment and population size as a measure of employment in Nepalese economy.

To assess the influence of Gross capital formation and foreign investment on employment in Nepalese economy.

To investigate any controls of industries on the employment in Nepal.

To analyze the impact of Exchange rate on employment in Nepalese economy.

### **1.5 Significance of study**

These findings and analysis of this thesis will help foreign traders, policies-makers, industrialists, businesspersons, and public or private sectors as well as public sectors to make comprehensive decisions about trade, export, FDI, and especially the Nepalese government to decide on open markets and restrictions for employment. The open market in developing countries demands “social capabilities” and “absorptive capacity” (Lall, 2004) where technology adoption from more advanced countries effectively acts as a channel for technological upgrading, thus leading to the increase in the relative demand for and wages of skilled workers.

This study is expected to help all Nepalese people who will get the information and improve their living standards by analyzing the impacts of employment in the Nepalese economy. Thus, this paper tries to analyze the dynamic determinants of the nexus between trade variables and employment in the Nepalese economy, where only a few studies have been carried out. This study further helps to generalize the concept of the nexus between trade variables, and employment and acts as a bridge for the literature gap on the subject matter under consideration in developing countries like Nepal. In addition, it shall help Nepalese to decide on creating a pool of skilled workers suitable for fulfilling work requirements generated by the Open market.

## **1.6 Organization of the study**

This study is organized into five broad chapters to determine the nexus between the open market and employment in the Nepalese economy for the effective structure of the study.

Chapter one contains the introduction part of the study, the focus of the study, the statement of the problem, the purpose of the study, the significance of the study, research questions and hypothesis, and operational definitions and assumptions. The second chapter includes a theoretical analysis and a brief review of related literature available. It also includes a discussion of the conceptual framework and a review of major studies. The third chapter includes the research methodology employed that deals with the research plan and design and description of the information collected for the study. Chapter four includes the presentation of data and its results, descriptive analysis, inferential analysis, and discussion. Finally, chapter 5 deals with the summary, findings, conclusion, and recommendation of the study.

## **1.7 Operational definitions**

Industry

This is the manufacturing share of GDP that includes value added in mining, manufacturing, construction, electricity, and gas and is used to proxy for industrialization processes and technological capacity or depth in developing countries. The hypothetical and experimental writing in regards to the transparency of exchange, modern area, and financial development, has various commitments by late improvement market

analysts. According to Ellahi et al. (2011), an open trade regime causes high competition in the world market, which makes firms follow and engage in modern technologies and further augments efficiency, resulting in growth. It is a well-admitted fact that, along with trade variables, industrial value-added works spurs economic growth positively.

## Export

Export is the main variable of attention in this study. It has been used as an independent variable to examine the long-run and short-run dynamics of the impact of Nepal's foreign exports on economic growth. Most previous studies conducted in the context of developed economies make use of data on values of exports as the proxy for the Open market and ignore the role of imports. Nepal is basically an import-oriented economy. According to the Macroeconomic Update of Nepal-2019, Volume 17 published by the Asian Development Bank, Nepal's share of net exports to GDP is about 40 % negative in 2018. Therefore, the share of exports of Nepal's foreign trade is very significant. Hence, this study uses the total value of exports to capture its impact on employment. This variable has been measured per capita real value of exports. In the Indian Context, trade exports have significant positive effects on the demand for unskilled or semi-skilled workers, as well as for male employees (Raju, Chaudhuri & Mishra, 2016). However, this hypothesis needs to be evaluated in the Nepalese context.

## Population Size

Another macroeconomic variable included in the model is the total population size. The inclusion of the population in the model can be

interpreted as a labor force that generates economic value added as with other factors of production. However, literature plays a controversial role with respect to the role of the population in stimulating economic growth. Peterson (2017) articulates that the role of population size in determining economic growth is sensitive to the income level of the country. For example, a lower population growth rate in high-income countries may not be sufficient to make optimum utilization of national resources, which may cause socio-economic problems. On the other hand, a higher rate of population growth in a low-income country may obstruct its economic development process. On the contrary opinion, Simon (1990) argues that higher population growth creates a larger stock of knowledge that contributes to the higher rate of economic growth. This argument is consistent with the notion of an endogenous growth model. So, this study also uses population size denoted as POP as one of the macroeconomic variables in determining the level of Nepal's economic growth.

#### Foreign Direct Investment

Foreign Direct Investment is the proxy for the level of real investment activity in the economy. It has been measured as per capita real value of Gross Capital Formation and denoted as 'INV'. The investment variable has been included in the model as motivated by the trade-induced investment-led growth hypothesis, which postulates that the level of the open market affects economic growth through the channel of investment in the form of FDI. Baldwin (1995) investigates the influence of trade on employment levels after incorporating FDI in the analysis for OECD countries. He concludes that increasing trade, particularly imports, has

become a reason for the rising unemployment levels. Further, he finds that FDI has a positive influence on labor productivity. In the Nepalese context, Foreign investment is critical to enhance the transfer of capital, modern technology, management, and technical skills, and increase culture. This article attempts to explore the growth and trends as well as the condition of FDI. The results show a significant association between the changes in FDI on Employment. The finding of multiple regression analysis between FDI and employment indicates that FDI is a significant predictor of employment (Kharel, 2020)

### Employment

After the work of Adams Smith on the nature and causes of the wealth of nations (1776), many theories have explained the nature of employment in an economy. Classical economists have it that, the capitalist economy attains full employment in the long run and unemployment can only occur in the short-run in the economy (Elijah, 2007). According to the principle of comparative advantage established by David Ricardo, a country should concentrate on producing goods that are relatively cheaper to produce when compared to other countries. This theory is, however, based only on one factor of production and the effect of free trade on income distribution is not clearly defined in this theory (Arbache, 2001).

### Gross Capital Formation

Seghezza and Baldwin (2008) articulate that a higher level of Open market and export reduces the cost of capital. Reductions in the cost of capital in turn induce both increased demand for capital and the return

on investment that ultimately facilitates trade-induced investment growth and an increase in employment opportunities. According to Adhikary (2011), domestic investments create new job opportunities by enlarging the production bases, additional employment provokes higher savings which induces even more investments, and this chain effect positively influences growth. Keynes argued that new and additional investment increases the aggregate demand in the economy (Tobin, 1965). An increase in domestic investment occurs when existing firms make new investments or new domestic investors enter the market, hence creating employment opportunities (Faulkner, Loewald & Makrelov, 2013).

# CHAPTER II

## LITERATURE REVIEW AND THEORETICAL FRAMEWORK

This chapter summarizes the theories and findings from the other different researchers that have done in the same field of study. Many previous studies have indicated the impact of economic growth, Open market, investment, population size, and industry on the employment in the economy.

### 2.1 Theoretical literature

There is a great deal of economic literature concerned with the question of what causes employment and what effect it has. There are different schools of thought as to the causes of employment.

After the work of Adams Smith on the nature and causes of the wealth of nations (1776), many theories have explained the nature of employment in an economy. Classical economists have it that, the capitalist economy attains full employment in the long run and unemployment can only occur in the short-run in the economy (Elijah, 2007). According to the principle of comparative advantage established by David Ricardo, a country should concentrate on producing goods that are relatively cheaper to produce when compared to other countries. This theory is, however, based only on one factor of production and the effect of free trade on income distribution is not clearly defined in this theory (Arbache, 2001). In neoclassical models of the economy, trade and trade policies do not determine the long-run levels of employment and unemployment within an economy. Rather, macroeconomic variables and



labor market-related institutions are responsible. In line with this view, therefore, trade policy reforms should be accompanied by labor and other market reforms for their impact to be felt in the long run (Hoekman & Winters, 2005). Neoclassical theory merely suggests that only long-run phenomena affect trade liberalization. They see the adjustment of general equilibrium as being instantaneous. The Keynesian theory argues that unemployment is the normal state of the economy and that government intervention is required to attain the desired employment levels. Keynes cautioned that the 'laws' of relative benefit applied only after domestic demand was at a level adequate for full employment (Keynes, 1936). Keynesians argue that when the economy is under full employment, the cause of inflation pressure is an unexpected rise in aggregate demand. This surprising increase in aggregate demand creates unanticipated profits for firms. To take advantage of the rise in aggregate demand, firms expand their production, which creates excess demand in the labor market, thus, the full employment situation is destabilized. Empirically, Krugman (1995) through a computable general equilibrium model, argues that when the wages of skilled and unskilled labor are relatively rigid, it increases imports of unskilled labor-intensive goods in developing countries. Baldwin (1995) for his part, argues that the employment effect of changes in exports remains insignificant in OECD countries. Moreover, Milner and Wright (1998) using the Cobb-Douglass model for Mauritius, found that employment declined initially following trade liberalization, but also noticed that the long-run effect on employment was positive. Again, looking at the effect of the 2008-2009 trade contraction in India and South Africa using the social accounting matrices

in the Leontief multiplier model, Kucera et al. (2011) result revealed that these countries experienced a substantial decline in employment following this trade contraction. Gross capital formation is the dependent variable of this study. The theories include the Keynesian, classical theories, Harrod–Domar theory, and the balance theory of capital formation. The classical theory stipulates that any disturbance in an economy will automatically correct itself in the long run (Edwards 1959). If the economy has high unemployment or motionless economic growth, classical economists prove that unemployment will fade without using any policy (Chaudhary 1994; Limosani and Monteforte 2017).

According to the comparative advantage theory, exports cause firms' labor demand to increase. According to the theory, if a country exports a good X, it has a comparative advantage in producing that good, which implies a lower opportunity cost in production. Therefore, that country specializes more in producing that good because specialization will increase the total output of good X. This will bring an increase in the means of production for good X, which results in a higher demand for labor in a related industry (McConnell et al. 2016).

Moreover, in a global market in a knowledge-based economy, the importance of human capital cannot be overlooked. Human capital is the knowledge, skill, and experience of employees, which is considered to be one of the valuable strategic assets (Rehman et al., 2013). Hayton (2005) pointed out that human capital includes professional skill, knowledge, experience, and expertise that may be used to gain a competitive advantage. Ordonez (2003) finds human capital (HC) as one of the key components of raising the efficiency and effectiveness of a given

population for suitable employment opportunism.

## 2.2 Empirical literature reviews

The review of literature has been organized as under:

### Gross Capital Formation

In the case of South Africa, the classical school of thought submits that apartheid policies, drought, and any other stocks will automatically disappear, and the economy will revert to full employment. In spite of the traditional way of thinking is the Keynesian hypothesis which buys into the view that joblessness is brought about by an absence of total interest (Nikensari et al. 2019). In this manner, specialists ought to utilize relevant strategies, for example, expansionary financial or money related arrangements to manage joblessness and an absence of monetary development. The defenders of this hypothesis think that joblessness is a consequence of lost strategies, changing monetary designs, and the absence of training that answers the work market (Wong et al. 2019).

The connection between work, gross capital development, and monetary development can't likewise be isolated from other past examinations (Banda et al. 2016). A review directed in South Africa researched the connection between gross capital development and work somewhere in the range of 1994 and 2012 (Banda et al. 2016). The review utilized a Johansen cointegration and Vector Error Correction model and tracked down a positive connection between gross capital and business. In this way, an expansion in gross capital arrangement and monetary

development likewise increments business. One more concentrate in South Africa by Makaringe and Khobai (2018) found opposite results to Banda et al. (2016), however the creators utilized similar factors and system. The rate of the gross capital formation may be measured in several ways, such as in terms of per capita real GDP growth as in Levine and Zeros (1996) and in terms of capital stock growth and productivity growth as in Levine and Zeros (1998). As discussed before, the data on capital stock is unavailable in the case of Nepal, and productivity growth can be determined only after obtaining capital stock growth. An influential study was conducted by Gundlach (1997) to check the effects of open economic policies concerning international trade on the growth of gross capital formation. To lead the research, he has taken data from developing countries. The results indicate that open economic procedures toward international trade raise gross capital formations. He added that the open economy's growth rate is much higher than the closed economy in the view of developing countries. Domestic investment, or gross fixed capital formation, has, in theory, been recognized as an essential component to facilitate economic growth and employment (Overseas Development Institute (ODI, 2016)). Domestic Investment is the proxy for the level of real investment activity in the economy. It has been measured as per capita real value of Gross Capital Formation and denoted as 'INV'. The investment variable has been included in the model as motivated by the trade-induced investment-led growth hypothesis, which postulates that the level of the open market affects economic growth through the channel of investment. With respect to this hypothesis, Seghezza and Baldwin (2008) articulate that a higher level of Open

market reduces the cost of capital. Reductions in the cost of capital in turn induce both increased demand for capital and return on investment that ultimately facilitates trade-induced investment growth and spills into employment opportunities. According to Adhikary (2011), domestic investments create new job opportunities by enlarging the production bases, additional employment provokes higher savings which induces even more investments, and this chain effect positively influences growth

### Foreign direct Investment

Baldwin (1995) investigates the influence of trade on employment levels after incorporating FDI in the analysis of OECD countries. He concludes that increasing trade, particularly imports, has become a reason for the rising unemployment levels. Further, he finds that FDI has a positive influence on labor productivity. According to Adhikary (2011), foreign investments create new job opportunities by enlarging the production bases, additional employment provokes higher savings which induces even more investments, and this chain effect positively influences growth. FDI is an important source of capital inflow for economic growth and employment generation in developing countries. It also provides a package that includes new technologies and management techniques, and financial and market access for the production and movement of goods and services. However, attracting foreign direct investment has become a major challenge for host countries as they face the challenge of identifying the major factors that motivate and affect the FDI location decision. That's why Nepal is at a point where it can excel for economic goals via FDI. Foreign investment is critical to enhancing the transfer of capital, modern technology, management and technical skills, and

increasing culture. This article attempts to explore the growth and trends as well as the condition of FDI. The results show a significant association between the changes in FDI on Employment. The finding of multiple regression analysis between FDI and employment indicates that FDI is a significant predictor of employment (Kharel, 2020)

### Population Size

Peterson (2017) articulates that the role of population size in determining economic growth is sensitive to the income level of the country. For example, a lower population growth rate in high-income countries may not be sufficient to make optimum utilization of national resources, which may cause socio-economic problems. On the other hand, a higher rate of population growth in a low-income country may obstruct its economic development process. Simon (1990) argues that higher population growth creates a larger stock of knowledge that contributes to a higher rate of economic growth. This argument is consistent with the notion of an endogenous growth model.

### Employment

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theory is, however, based only on one factor of production and the effect of free trade on income distribution is not clearly defined in this theory (Arbache, 2001).

#### Industry

This is the industrial share of GDP that comprises value added in mining, manufacturing, construction, electricity, and gas and is used to proxy for industrialization processes and technological capacity or depth in developing countries. The hypothetical and observational writing with respect to the receptiveness of exchange, modern area, and financial development, has various commitments by late advancement market analysts. According to Ellahi et al. (2011), an open trade regime causes high competition in the world market, which makes firms follow and engage in modern technologies and further augments efficiency, resulting in growth. It is a well admitted fact that, along with trade variables, industrial value-added works a spur economic growth positively.

#### Official exchange rate

The currency exchange rate has an indirect impact on unemployment because it affects the competitiveness of local firms and the cost of imported goods and raw materials. Changes in the currency exchange rate might cause job losses or increase the demand for employees. Burgess and Knetter (1998) assessed the effect of genuine conversion scale developments on work at the business level for the G-7 nations and showed that genuine appreciations were related with decreases in assembling work by and large. Specifically, these creators presume that business development in the US, UK, Canada, and Italy is more delicate

to trade rates than in Germany, Japan, and France Sek et al. (2012) examined the empirical investigation into the relationship between exchange rates and employment regimes in the three developed countries and three emerging Asian economies that have adopted inflation-targeting regimes. This study applied a multivariate model, and the results revealed a significant correlation between exchange rates and employment. Inyama & Ekwe (2014) examined the nature and impact of exchange rate fluctuations on employment pressure and other selected macroeconomic indices in Nigeria by taking data from 1979 to 2010. This study applied the ordinary least squares method to evaluate their relationship and impact. The results revealed that the exchange rate and employment rate are positively related, although the relationship is not very significant. A recent study by Berman et al. (2009) looks at the implications of the new literature on trade to the adjustment of export to exchange rate movements. They concluded that heterogeneity in productivity across implies responses to exchange rate movements and employment. Hence, it has an impact on employment.

## Export

Dutt et. al., (2009) examine the Export and employment nexus for a panel. After investigating the dynamic panel estimates, they conclude a positive influence of exports on the employment level. Therefore, they conclude that exports are helping to reduce unemployment levels in the selected sample countries. Kien and Heo (2009) explore this topic for Vietnam by using industry-specific data for the time period 1999–to 2004. They found that rising exports are helping to generate employment and hence unemployment decreases. Further, exports remain an



insignificant contributor to rising employment levels in all sectors of the economy. Kim (2010) investigates this issue in the twenty OECD economies by using a period from 1961 to 2008. They explored this relationship by controlling the quality of institutions in the analysis. They found that exports are accelerating unemployment in rigid institutions and they have a pleasant effect on employment levels in the elastic atmosphere.

Hasan et. al., (2012) examine the influence of export, by using state-level data, on unemployment in India. Export has reduced unemployment levels in the spring atmosphere. In particular, exports are found to help to reduce unemployment levels. Further, tariffs and other measures in India have also helped to reduce the unemployment level.

Ranjan (2012) explores the linkages between export and employment. In the trade sector, import-rivals increase employment, and export rivals reduce employment opportunities. Chinembiri (2010) conducted the analysis for South Africa to inspect the influence of exports on sector-specific employment. Their estimates show that rising imports have a negative influence on primary and manufacturing sector employment. Further, exports remain an insignificant contributor to rising employment levels in all sectors of the economy. On the other hand, the rising wage rate is becoming a reason for unemployment. Further, exports remain an insignificant contributor to the rising employment level in all sectors of the economy.

Besides, Gries et al. (2009) reported that the Open market mainly exports affects economic growth through the channel of financial deepening. As

such, countries with higher levels of financial deepening are more able to speed up the rate of economic growth by opening their economies to international trade. In this study using the case of a panel of 16 developing countries, Huang and Chang (2014) report that the effect of exports on growth depends on the level of a country's stock market development. The study shows that a country with a high level of stock market development achieves a higher impact of the open market on growth.

### Conceptual framework

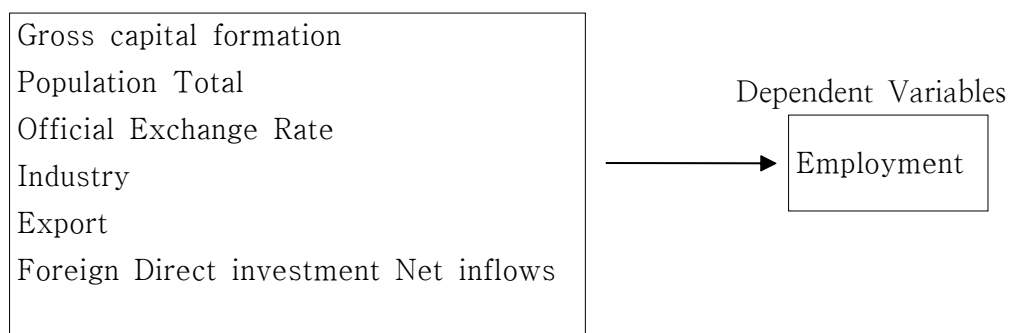
Employment is an agreement between an individual and another entity that stipulates the responsibilities, payment terms and arrangements, and rules of the workplace, and is recognized by the government. The empirical debates on the trade–growth nexus mainly center on the trade–led growth hypothesis, which advocates that a country with a higher level of Open market achieves a speedy rate of economic growth. Rivera–Batiz and Romer (1991), and Barro and Sala–I–Martin (1997) postulate that a higher level of Open market in an economy promotes people's access to products and services, and increases efficiency in resource allocation, diffuses technology, and disseminates knowledge. Such advancement in the economy ultimately improves total factor productivity, leading to a faster pace of economic growth. Much empirical evidence at the cross–country level, as well as the country–specific level, establish a positive linkage between the level of Open market and economic growth, supporting the hypothesis that the level of Open market in an economy

positively and significantly influences the rate of economic growth.

For example, some of the earlier studies, such as Sengupta and Espana (1994), McCarville and Nnadozie (1995), and Bodman (1996), among others, confirm that the Open market level positively impacts growth. In an investigation into the trade-growth nexus across a panel of 150 countries, Rassekh (2007) finds that countries with a lower level of income are benefited more from the Open market to accelerate growth than their higher income counterparts. In contrast, using the instrumental variable estimation method to investigate the nexus between trade and growth, Kim, Lin, and Suen (2011) report a positive effect of the Open market on growth in the case of high-income countries, while a negative effect in the case of low-income countries.

Baldwin (1995) for his part, argues that the employment effect of changes in imports and exports remains insignificant in OECD countries. Moreover, Milner and Wright (1998) using the Cobb-Douglass model for Mauritius, found that employment declined initially following trade liberalization, but also noticed that the long-run effect on employment was positive.

#### Independent Variables



## Gross Capital Formation

Gross Capital Formation (GCF), likewise called "Investment", is characterized as the obtaining of created resources (counting acquisition of recycled resources), including the development of such resources by makers for their own utilization, less removal. The significant resources connect with resources that are planned for use in the creation of different labor and products for a time of over a year. The expression "produced assets" implies that the main resources that appear because of a creation cycle are incorporated. It accordingly does exclude, for instance, the acquisition of land and normal assets. This pointer is accessible in various measures: GFCF at current costs and current PPPs in US dollars, yearly development paces of GFCF at steady costs, and quarterly information for rate change over the past period and rate change over the same period last year. All OECD nations incorporate their information as indicated by the 2008 System of National Accounts (SNA). The marker at current costs and current PPPs is less appropriate for examinations over the long haul, as advancements are brought about by genuine development, yet in addition to changes in costs and PPPs. It has been measured as per capita real value of Gross Capital Formation and denoted as 'INV'. Rivera- Gross domestic product is a basic determinant of a country's economic performance and is the market value of all final goods and services made within the borders of a nation in a year. Domestic investment, or gross fixed capital formation, has, in theory, been recognized as an essential component to facilitate economic growth and employment (Overseas Development Institute (ODI, 2016)).

Keynes argued that new and additional investment increases the aggregate

demand in the economy (Tobin, 1965). An increase in domestic investment occurs when existing firms make new investments or new domestic investors enter the market, hence creating employment opportunities (Faulkner, Loewald & Makrelov, 2013). Based on this, this study developed the following hypothesis:

H1: Gross fixed capital formation has significant effect on employment.

#### Foreign Direct Investment

Investment is a proxy for the level of real investment activity in the economy. The investment variable has been included in the model as motivated by the trade-induced investment-led growth hypothesis, which postulates that the level of the open market affects economic growth through the channel of investment. With respect to this hypothesis. According to Adhikary (2011), foreign investments create new job opportunities by enlarging production bases, and additional employment provokes higher savings, which induces even more investments; and this chain effect positively influences growth. Based on this, this study developed the following hypothesis. In an article, on China, the results indicate that outward FDI from China had a positive impact on the home-country employment growth, especially in the tertiary industry. These results also imply that the logic of the outward investments from low-cost transitional and developing economies differs from that of high-income countries (Liu & Lu, 2011),

H2: Foreign direct Investment has no significant effect on employment.

### Population Size

Another macroeconomic variable included in the model is the total population size. The inclusion of the population in the model can be interpreted as a labor force that generates economic value added as with other factors of production. However, literature plays a controversial role with respect to the role of the population in stimulating economic growth.

Peterson (2017) articulates that the role of population size in determining economic growth is sensitive to the income level of the country. For example, a lower population growth rate in high-income countries may not be sufficient to make optimum utilization of national resources, which may cause socio-economic problems. On the other hand, a higher rate of population growth in a low-income country may obstruct its economic development process. On the contrary opinion, Simon (1990) argues that higher population growth creates a larger stock of knowledge that contributes to a higher rate of economic growth and employment. Based on this, this study developed the following hypothesis.

H3: Population size has adversely significant effect on employment.

### Foreign exchange rate

Changes in exchange rates have a great impact on the economy as a whole. Exchange rate fluctuations strongly influence the level of prices through aggregate demand and aggregate supply in the system of floating exchange rates. The weakening of the exchange rate will cause the price

of inputs to become more expensive, thus contributing to a higher cost of production. Manufacturers will certainly increase the cost of the price of goods that will be paid by consumers. As a result, the aggregate price level in the country increases, or if it continues it will cause inflation. Adetiloye (2010) adopted the technique of correlation and found a significant relationship between the consumer price indexes and the exchange rate in Nigeria. Khattak & Tariq (2012) revealed that real exchange rate depreciation raised inflation in Pakistan. Kamas (1995) saw that trade rates didn't assume a significant part in making sense of the variety in expansion in Colombia and that expansion gave off an impression of being essentially inertial regarding the swapping scale still up in the air by request shocks.

H4: Official Exchange rate has no significant effect on employment.

## Export

Export is the main variable of interest in this study. It has been used as an independent variable to examine the long-run and short-run dynamics of the impact of Nepal's foreign trade on employment growth. Most previous studies conducted in the context of developed economies make use of data on values of exports as the proxy for the Open market and ignore the role of exports. Nepal is basically an import-oriented economy. According to Macroeconomic Update of Nepal-2019, Volume 17 published by the Asian Development Bank, Nepal's share of net exports on GDP is about 40 percent negative in the year 2018. Lall (2004) concluded that exports can create jobs and increase the technology transition process. However, hence, this study uses the total value of

exports to capture the Open market. In the Indian Context, Trade liberalization, especially export, has had significant positive effects on the demand for unskilled or semi-skilled workers, as well as for male employees (Raju, Chaudhuri & Mishra, 2016). Some studies provide conflicting results on the effect of exports on employment. Conte & Vivarelli (2007) found that skill-enhancing technological imports affect demand for white-collar workers positively, but blue-collars negatively. Konings & Vandenbussche (1995), and Bernard & Wagner (1997) found no impact of trade on employment. Based on this, this study developed the following hypothesis:

H5: Export has significant effect on employment.

#### Industry

This is the industrial share of GDP that comprises value added in mining, manufacturing, construction, electricity, and gas and is used to proxy for industrialization processes and technological capacity or depth in developing countries. The hypothetical and observational writing with respect to the receptiveness of exchange, modern area, and financial development, has various commitments by late advancement market analysts. According to Ellahi et al. (2011), an open trade regime causes high competition in the world market, which makes firms follow and engage in modern technologies and further augments efficiency, resulting in growth. It is a well admitted fact that, along with trade variables, industrial value-added works a spur economic growth positively. Based on this, this study developed the following hypothesis.

H6: Industry has no significant effect on employment.



## Concluding remarks

The review of the available literature has contributed to enhancing the fundamental understanding and knowledge, which is required to make the study meaningful and purposeful. These studies have attempted to examine the determinants of the nexus between open markets and employment in the Nepalese economy. This is one of the important macroeconomic variables because if employment is not maintained properly, then the whole economy will be damaged. Classical economists have it that, the capitalist economy attains full employment in the long run and unemployment can only occur in the short-run in the economy (Elijah, 2007).

Terms of employment refer to the responsibilities and benefits associated with a job as agreed upon by the employer and employee at the time of hiring. Baldwin (1995) for his part, argues that the employment effect of changes in imports and exports remains insignificant in OECD countries. Moreover, Milner and Wright (1998) using the Cobb–Douglass model for Mauritius, found that employment declined initially following trade liberalization, but also noticed that the long-run effect on employment was positive. Again, looking at the effect of the 2008–2009 trade contraction in India and South Africa using the social accounting matrices in the Leontief multiplier model, Kucera et al. (2011) result revealed that these countries experienced a substantial decline in employment following this trade contraction.

There are many national and international studies in the field of the nexus between the Open market and employment in the Nepalese

economy. These studies have attempted to determine the factors that influence the employment of the economy. The reviewed literature shows that there is no uniformity in the findings. Studying performed in foreign countries taking some variables may not be valid in Nepal due to the different general environment, economic and political contexts. Thus, the empirical results found in other countries cannot be generalized in the context of Nepal.

In Nepal, a separate study is required considering only those variables that seem to be relevant according to the environmental context. However, in the context of Nepal, only a few efforts have been made to examine the issues related to factors that affect employment. Many graduate students are showing interest in this topic. Specifically, the study is primarily designed to fill the gap between similar studies in the Nepalese context. This study has attempted to carry out it distinctly from other previous studies in terms of sample size and the research methodology used. Thus, it is believed that this study is different from earlier studies of the Nepalese context. The importance of this study may be viewed from its contribution to filling the gap between previous studies and the finding of this study can add value to the existing body of literature.

# CHAPTER III

## RESEARCH METHODOLOGY

Research methodology refers to the various methods of practices applied throughout the study. This helps to solve the research problem in a systematic way. The clear and well-described research methodology ensures the valid analysis and interpretation of the data under study. This chapter has focused on the research design, population, sample of the study, nature, and sources of secondary data. It also discusses the sampling technique and the data collection method and procedures along with the time frame. Further, this chapter specifies the major statistical tools and models used to examine the relationship between the variables of interest. The methods employed for data analysis techniques and details of the overall analysis plan have also been dealt with.

### 3.1 Research design

This study employed descriptive and causal-comparative research designs to deal with the fundamental issues associated with determinants of employment. The descriptive research design has been adopted for fact-finding and searching for adequate information about factors affecting employment.

This study is also based on casual comparatives of different independent variables and dependent variables. This has ascertained and understood the magnitudes and directions of the observed relationship between the Open market and employment in the Nepalese economy and the corresponding variables.

### 3.2 Description of sample

The data is collected from multiple sources of secondary data to determine the variables that affect the employment of the Nepalese economy. This study collected the economic data for the analysis from the World Bank, Economic Bulletin published by Nepal Rastra Bank (NRB), economic and financial websites, International Monetary Fund (IMF), Central Bureau of Statistics Nepal, Asian Development Bank (ADB) and other Nepalese journals of economics and Business that we have taken for the sample. All the secondary data is compiled, processed, and tabulated in the time series as per the need to fulfill the objectives.

### 3.3 Variables definition and measurement

Variables definition	Symbol	Measurement
<i>Dependent Variables</i>		
• Employment	EM	Percentage
<i>Independent Variables</i>		
• Gross capital formation	INV	Percentage of GDP
• Official exchange rate	EXR	LCU per US\$
• Population, total	PT	Number
• Industry	IND	Percentage
• Export	EXP	Current US\$
• Foreign direct investment (net inflows)	FDI	Percentage of GDP

Data set covers the time of 20 years

### 3.4 Method of analysis

The main purpose of data analysis in this study is to analyze the magnitude and direction of relationships between economic growth, Open market, investment, population size, and Industry as a measure of employment in the economy. Therefore, this section deals with statistical methods used for the analysis of secondary data. The methods of the data analysis used in the study have been divided into two subsections. The first section deals with the methods of secondary data analysis. This includes descriptive statistics, correlation analysis, and least square regression analysis. The second section describes different statistical tests of significance for validation of the model, such as t-test, p-value, F-test, and R<sup>2</sup>.

This review has utilized the t-measurement to play out an importance trial of relapse coefficients. In the language of an importance test, a relapse coefficient is supposed to be genuinely huge if the basic p-worth of the test measurement is not exactly the degree of importance determined. In other words, the statistical significance of the coefficients validates the explanatory power of the associated independent variables. The level of significance specified in this study is one and five percent.

Besides the statistical test of the significance of individual regression coefficients, it is necessary to test the joint hypothesis that all regression coefficients are simultaneously significant. This is called the test of the overall significance of the model. This can be done by using the coefficient of determination (R<sup>2</sup>) and F-statistics. The adjusted coefficient of determination has been used to identify the percentage of the total

variation in the dependent variable that has been explained jointly by all explanatory variables. The statistical significance test of this joint explanatory power was conducted using F-statistic. The p-value of the F-test was examined to confirm whether the regression models were significant at one and five percent levels.

Furthermore, Exploratory Data Analysis (EDA) of data was performed to analyze the dependency, homogeneity, and data distribution. Meanwhile, the original data was transformed to normalize the data and check homoscedasticity and linearity. Secondary data was analyzed using R STUDIO software in order to derive meaningful relationships among the dependent and independent variables.

### **3.5 Analysis plan**

This section discusses how analysis has been carried out in chapter IV. It is necessary to follow certain steps and procedures in analyzing data in order to understand the results and generalize the findings. The analysis of secondary data intends to study the relationship and cause and effect between the variables. The analysis starts with the analysis of secondary data. This section is divided into various subsections, the first of which deals with the descriptive statistics of the sample observations, including the mean, median, standard deviation, minimum and maximum values of observations. Correlation analysis has been carried out in the second section followed by step-wise regression analysis. Test of significance, multicollinearity, and autocorrelation has also been tested to make the results more valid. All observed relationships and findings have been

interpreted to derive meaningful conclusions regarding variables with employment.

# CHAPTER IV

## 4.1 RESULTS AND DISCUSSIONS

### 4.1.1 Descriptive Statistics

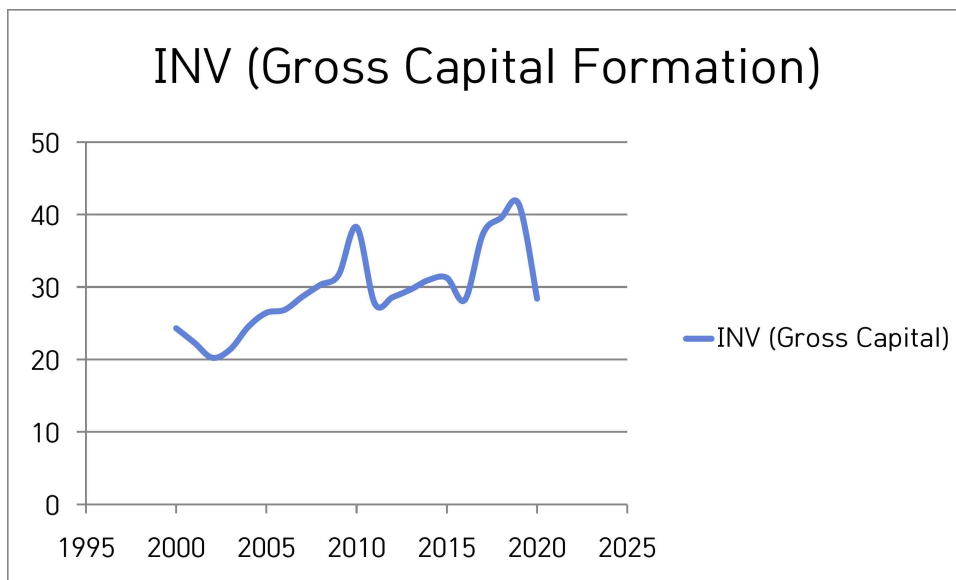
Table 1 shows descriptive statistics—mean, standard deviation, minimum and maximum values of economic variables with observations from the period 2000 to 2020.

Descriptive Statistics					
	O b s.	Minimum	Maximum	Mean	S t d . Deviation
E M P	21	73.7020034790 039	83.9990005 493164	81.6272386 82338170	2.1554675 85100424
PT	21	23941099	29136808	26565556.3 3	1333807.7 34
INV	21	20.2462111730 94377	41.3787409 10975330	29.4418294 93848550	5.7813313 83427007
FDI	21	-.0983748686 51090	.677439877 804838	.243269554 867293	.22461397 1040519
IND	21	11.7974421272 61520	20.7355700 31199930	14.9195878 82599140	2.1117811 51276359
EXR	21	66.4150275000 000	118.345187 2759860	86.1400456 24014290	16.742207 93202874 4
EXP	21	6.76009609107 4990	23.2840037 10262250	12.1975238 38866683	4.7954177 14373357



### 4.1.2 Structure and pattern of Gross Capital Formation

The observed values of gross capital formation



Source: Nepal Rastra Bank

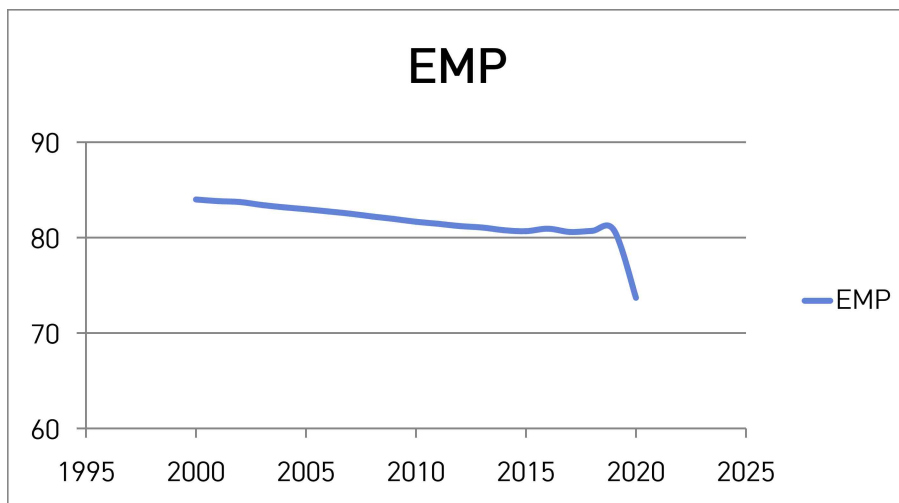
Figure 1 shows that gross capital formation in the country has declined after 2016, it may be due to massive earthquake that took at 2015, after the damages of this calamities, people have been reluctant to invest in industrial sector in Nepal.

### 4.1.3 Structure and pattern of Employment

The observed values of employment rate in Nepalese economy are presented.

Figure 2 shows the structure of unemployment rate (in percent) from 2000 to 2020

Source: Central Bureau of Statistics, Nepal (In percentage)

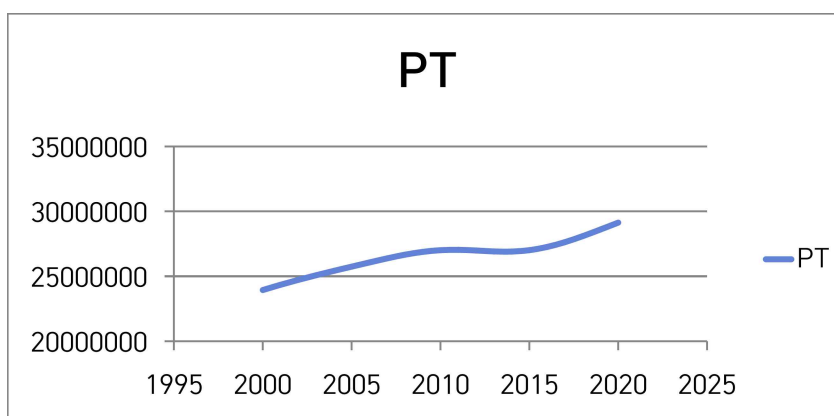


#### 4.1.4 Structure and pattern of Population

The observed values of population of Nepalese economy are presented.

Figure 3 shows the structure of population from 2000 to 2020.

(In Number)



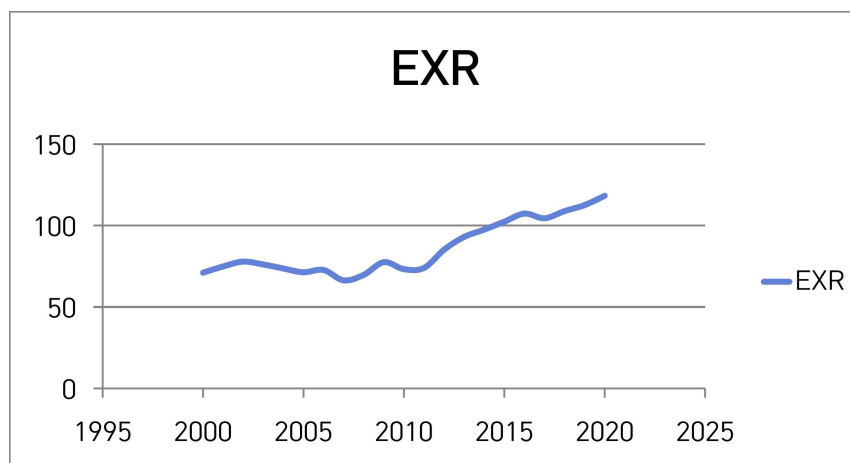
Source: CBS Central Beuro of Statistics

Figure 3 shows that population of Nepal is in increasing trend since 2000–2020. However the rate of growth has remained stable.

#### 4.1.5 Structure and pattern of official exchange rate

The observed values of foreign exchange rate are presented in figure

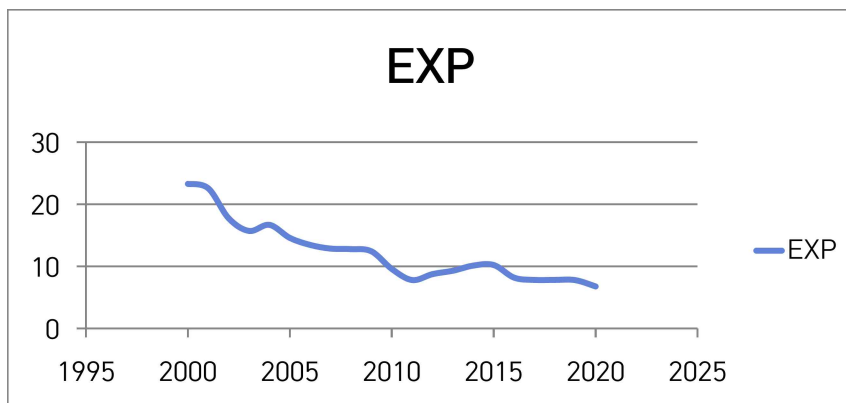
Figure 4 shows the structure of foreign exchange rate from 2000 to 2020. The foreign exchange rate is taken as exchange rate of Nepalese currency with US dollar. These rates are the buying rates of US dollar during average of time periods.



Source: NRB, Quarterly Bulletin, 2021

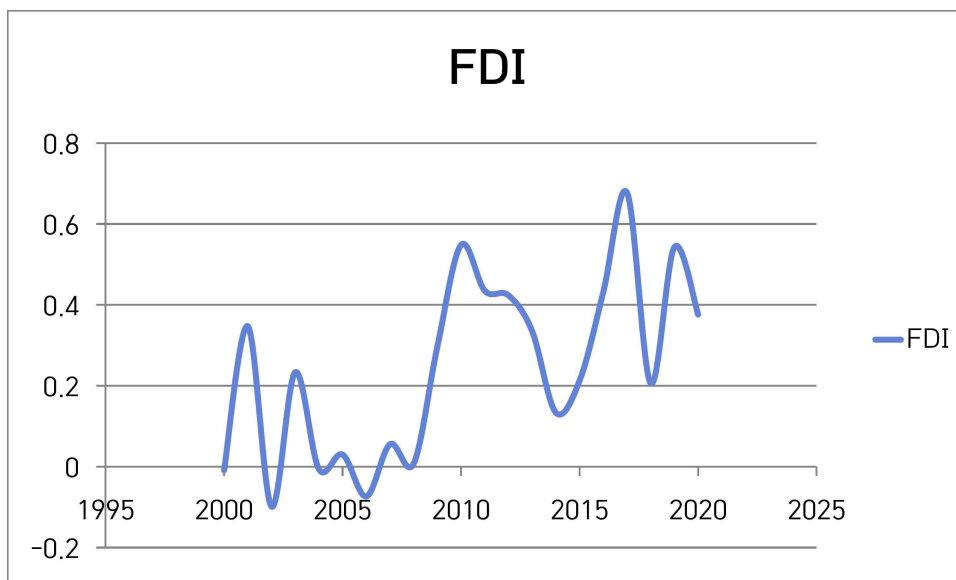
Figure 4 shows the exchange rate of Nepalese currency with US dollar from the year 2000 to 2020. The exchange rate is highest in the year 2020 (118.3 rupees) and this shows the value of US dollar for Nepalese currency is on the increasing trend after 2000.

#### 4.1.6 Structure and pattern of Export



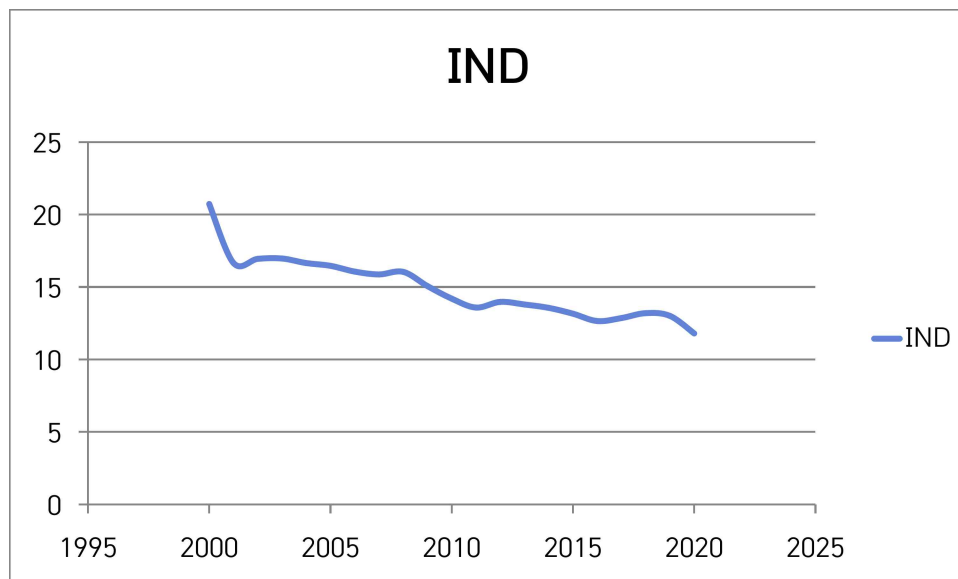
As indicated in the table export of Nepal has declined from 2000 with slight increase in 2015

#### 4.1.7 Structure and pattern of Foreign Direct Investment



FDI in Nepal has remained highly inconsistent as indicated in the above figure

#### 4.1.8 Structure and pattern of Industry



As shown in the figure industry growth has also declined in Nepal since 2000, Nepal is dominated by service sector and dealership business.

#### 4.2 Regression Analysis

$$(EM)_{it} = \alpha_0 + \alpha_1 (INV)_{it} + \alpha_2 (FDI)_{it} + \alpha_3 (PT)_{it} + \alpha_4 (EXR)_{it} + \alpha_5 (EXP)_{it} + \alpha_6 (IND)_{it} + \epsilon$$

Here,  $i$  for the period of  $t$ .  $\alpha_0$  is the intercept of the equation and vectors of the equation are  $\alpha_1$ ,  $\alpha_2$ ,  $\alpha_3$ ,  $\alpha_4$ ,  $\alpha_5$ , and  $\alpha_6$  respectively.

In this equation, the dependent variable is Employment,  $EM$  denotes the Percentage of employment opportunity in the economy and independent variables are specified as:

$\alpha_0$  = Constant

$\alpha_1$ ,  $\alpha_2$ ,  $\alpha_3$ , and  $\alpha_4$  (vectors of respective variables)

EM= Employment rate (in Percentage)

INV= Gross capital formation (Percentage of GDP)

FDI= Foreign direct investment net inflows (Percentage of GDP)

PT=Population, total(Numbers)

EXR=Official Exchange Rate (LCU per US\$)

EXP=Export (Current US\$)

IND= Industry (in Percentage)

$\epsilon$ =Error term

```
> summary(lm(EMP ~ (INV) + (FDI) + (PT) + (EXR) + (EXP) + (IND),  
data=Thesisdata))
```

Call:

```
lm(formula = EMP ~ (INV) + (FDI) + (PT) + (EXR) + (EXP) +  
(IND), data = Thesisdata)
```

Residuals:

Min	1Q	Median	3Q	Max
-1.5097	-0.3783	0.1721	0.2814	1.6481

Coefficients:

Estimate	Std. Error	t value	Pr(>  t )
----------	------------	---------	-----------

```

(Intercept)  1.567e+02  1.608e+01   9.741 1.29e-07 ***
INV           2.366e-01  5.796e-02   4.082 0.001120 ***
FDI          -1.032e+00  1.270e+00  -0.813 0.429694
PT           -2.815e-06  5.604e-07  -5.023 0.000187 ***
EXR          -2.289e-02  2.110e-02  -1.085 0.296361
EXP           3.471e-03  1.261e-09   0.275 0.0078720 **
IND          -1.352e-01  3.318e-01  -0.407 0.689860

```

---

Signif. codes: 0 '\*\*\*' 0.001 '\*\*' 0.01 '\*' 0.05 '.' 0.1 ' ' 1

Residual standard error: 0.8701 on 14 degrees of freedom

Multiple R-squared: 0.8859, Adjusted R-squared: 0.8532

F-statistic: 18.12 on 6 and 14 DF, p-value: 5.32e-04

Min	1Q	Median	3Q	Max
-1.5097	-0.3783	0.1721	0.2814	1.6481

Coefficients:					
	Estimate	Std. Error	t value	Pr(> t )	Remark
(Intercept)	1.567e+02	1.608e+01	9.741	1.29e-07 ***	
(INV)	2.366e-01	5.796e-02	4.082	0.001120 ***	Significant
(FDI)	-1.032e+00	1.270e+00	-0.813	0.429694	
(PT)	-2.815e-06	5.604e-07	-5.023	0.000187 ***	Significant
(EXR)	2.289e-02	2.110e-02	-1.085	0.296361	
(EXP)	3.471e-03	1.261e-09	0.275	0.0078720 **	Significant
(IND)	-1.352e-01	3.318e-01	-0.407	0.689860	

Signif. codes: 0 '\*\*\*' 0.001 '\*\*' 0.01 '\*' 0.05 '.' 0.1 ' ' 1

Residual standard error: 0.8701 on 14 degrees of freedom

Multiple R-squared: 0.8859, Adjusted R-squared: 0.8532

F-statistic: 18.12 on 6 and 14 DF, p-value: 5.32e-04



The above table shows the result of regression analysis of dependent, independent and control variable which are Employment, Gross capital formation, Foreign direct investment net inflows, Total population, Official exchange rate, Export and Industry of Nepal. The adjusted R-Squared value is 0.8532, it specifies that 85.32 Percentage of the variation in the output variables are explained by the input variables. The result indicates that this is appropriate model with P value is 0.000532 If the P-value is less than the significance level (0.05), the decision is to reject the null- hypothesis.

According to the result of regression analysis, Gross capital formation has significantly positive effect on Employment with Pr-value 0.001120 \*\*\*, it shows that employment increased by 0.2366 Percentage while Gross capital formation goes up by 1 percentage. Similarly, Official exchange rate has insignificant relationship with Employment as 0.02289 Percentage increase in employment make exchange rate increase by 1 dollar. Total Population and employment have adversely significant relation with Pr-value 0.000187 \*\*\* which means 0.000002815 Percentage decrease in employment rate while 1 person increase in population. Also, Industry has insignificant relation with employment, as 0.1352 Percentage decrease in employment rate cause 1 Percentage increase in industry. Export and employment have significant relation with Pr-value 0.0078720\*\*, which means 0.003471 Percentage increase in employment rate rise export by 1 Percentage. Foreign Direct investment net inflows and Employment has insignificant relationship with pr-value 0.429694. It means employment decrease by 1.032 Percentage cause Foreign direct investment net inflows increase 1 Percentage.

How Does Foreign Direct Investment Promote Economic Growth? Exploring the Effects of Financial Markets on Linkages by Chanda & Sayek (2008) finds positive productivity externalities have been generated in the host country by foreign multinational companies. The paper puts its emphasis on the role of local financial markets in generating foreign direct investment (FDI). Likewise, this paper describes a context within a small open economy where final goods production is carried out by foreign and domestic firms and they compete for skilled labor, unskilled labor, and also for intermediate products. The model used in the article emphasizes the role of local financial markets that enables FDI in its role in promoting economic growth. Finally, the paper argues that the host country will benefit from the nexus between foreign and domestic firms along with positive spillovers in the economy. However, this study shows that Nepal has not benefited from FDI in employment. In the article, International Trade and its Effects on Economic Growth in China In by Sun and Heshmati (2010) begin their article with an argument that international trade is a major factor of openness and it has made an increasingly significant contribution to economic growth. For the econometric approach, this paper used the stochastic frontier production function to estimate specific determinants of inefficiency in international trade. The study demonstrates that increasing participation in global trade helps China achieve dynamic economic benefits, stimulating rapid national economic growth. This study also shows that Nepal has benefited from exports.

# CHAPTER V

## CONCLUSION AND SUMMARY

This chapter provides a brief summary of the entire study and highlights the major findings of the study. In addition, the major conclusions from the findings are discussed in a separate section of this chapter which is followed by some implications and recommendations regarding intellectual capital and measures of corporate performance. Finally, the chapter ends with a short paragraph on the scope of future research on the same topic.

### 5.1. Summary of findings

The primary purpose of this paper is to investigate the effect of trade-related variables and employment using the yearly panel data for the period 2001 to 2020. The evidence of this study suggests that gross fixed capital formation, export, and population size have a significant impact on employment. This indicates that the export starting effect on the total workers is more substantial than wages per worker. Hence, the manufacturing sector of Nepal can provide employment with export-quality goods and services. Moreover, it was also revealed that the most significant effect regarding employment among variables is gross capital formation.

Overall, this study found a causal effect of the export entrance on employment.. As Hwang et al. (2017) argued that exports have an effect on the employment of both types of workers could be different. Here, Further work needs to be carried out to explain the specific channels in

which export activity increases employment. It is also necessary to conduct relevant research considering the characteristics of both employers and employees. And also discuss different export areas where local investors are interested. Similarly, for emplacement Intellectual capital has become the key resource of value creation. This is especially true in a knowledge-driven economy, and the value added by corporations, organizations, and individuals is directly related to their knowledge and export (Bontis et al., 2000).

Economic theorists' assets, land, labor, and money are three significant resources that contributed to the success of corporate enterprises (Sullivan, 2000). However, the last two decades have witnessed a transition as the emphasis has shifted from the traditional economic system to a knowledge-intensive system (Komnenic and Pokrajcic, 2012). This change in emphasis has created hype for service industries all over the world. The dominance of service industries in terms of swiping the major share of the value creation process has led the world to recognize intellectual capital as another decisive actor of a knowledge-based economy, as it plays a pivotal role in the firm's overall growth (Meditinos et al., 2011).

## **5.2 Conclusion**

Harrison (2011) and Lederman (2012) have pointed to new avenues that might be explored. Another strand of research worth pursuing is the relation of trade to FDI and skill-biased technological change as a collective determinant of income inequality (Pavcnik, 2011). As indicated in the thesis, Nepal needs to improve government investment for better

utilization of resources. Moreover, as noted in Hoekman and Porto (2010) there could be fairly mind boggling intra-family impacts of exchange progression and FDI relying upon relative open doors looked by changed individuals from a similar family following exchange opening and a few bits of knowledge could be acquired there too, specifically in regard to interest for work.

Furthermore, high-quality education and training are one of the most consistently highlighted prerequisites for reaping the benefits of trade and employment. A high level of education permits adaptation to new technologies and thus is necessary for technological absorption and innovation (OECD et al., 2010). A well-educated workforce is also more able to move from job to job, as skilled workers tend to be more mobile and adapt to changes more quickly (Hoekman and Javorcik, 2004). Also, investment in skills of a broad base of a population is likely to reduce the skill premium, thus, allowing a more equitable distribution of the gains from trade (Jansen, et al., 2011). Finally, skills and education have been found to be important in allowing export diversification at an extensive margin following trade liberalization (Cadot et al., 2011) and better-educated populations are more likely to get the benefits of trade-related variables.

Wealth and growth in today's economy are primarily driven by intangible (intellectual) assets (Rosario and Vaz, 2005). The ascent of the new economy has featured the way that the worth made depends definitely less on their actual resources than on their elusive ones. These assets, often described as intellectual capital, are being recognized as the foundation of individual, organizational and national competitiveness

(Wiig, 1997). Edvinsson and Malone (1997) suggested that intellectual capital is knowledge capital, nonfinancial assets, intangible assets, hidden assets, or invisible assets. It can also be seen as a tool to achieve targets. Stewart (1997) defined intellectual capital as intellectual material that can be used to create wealth, knowledge, information property, and experience. Hence, for employment, the population with intellectual capital is the main concern of all governments in the world, including Nepal.

Nevertheless, this study shows that exports have effects on employment. Subsequently, the study also investigated the remaining effect of foreign exchange, industry, and education on employment. These perceptions could have significant ramifications for the product advancement strategy later on. Taking into account the product beginning impact, the commodity advancement strategy ought to be to help firms to bring down the boundary to partake in the worldwide market.

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# 국 문 초 록

-네팔 경제에서 무역 관련 변수와 고용 사이의 연관성에 대한 연구-

한 성 대 학 교 대 학 원  
국 제 무 역 경 제 학 과  
국 제 무 역 시 장 전 공  
마 헨 드 라

이 논문의 주요 목적은 2000년부터 2020년까지의 연간 시계열 데이터를 사용하여 무역 관련 변수와 고용의 영향을 조사하는 것입니다. 이 연구의 증거는 총 고정 자본 형성, 수출 및 인구 규모가 고용에 큰 영향을 미칩니다. 이는 전체 근로자에 대한 수출 개시 효과가 근로자 1인당 임금보다 더 크다는 것을 의미한다. 이 연구는 네팔의 고용 창출에 대한 외국인 직접 투자의 영향을 조사했습니다. 이러한 변수들은 고용에 유의미한 영향을 미치지 않는 것으로 나타났으며, 그 결과 수출 및 총자본 형성으로 인한 전체 근로자 수에 긍정적인 영향을 미치는 것으로 나타났다. 따라서 네팔의 제조업 부문은 수출용 품질의 상품과 서비스를 고용할 수 있습니다. 또한 변수 중 고용에 가장 큰 영향을 미치는 것은 총자본형성인 것으로 나타났다. 전반적으로 본 연구는 수출입이 고용에 미치는 인과적 영향을 발견하였다. Hwang et al. (2017)은 수출이 두 유형의 근로자 고용에 미치는 영향이 다를 수 있다고 주장했습니다. 여기서 수출 활동이 고용을 증가시키는 특정 경로를 설명하기 위해 추가 작업을 수행해야 합니다. 또한 고용주와 고용인의 특성을 고려한 관련 조사도 필요하다. 또한 현지 투자자가 관심을 갖고 있는 다양한 수출 분야에 대해 논

의합니다.

키워드: [총고정자본 형성, 외국인직접투자-순유입, 수출, 인구규모, 고용, 공개시장, 네팔 ]