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**Analysis of Nicaragua Economic
Policy under Ortega administration
from 2007 to 2020**

尼加拉瓜奧蒂嘉總統執政期間之經濟
政策分析（2007到2020年）

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Abstract

This study aims to reveal the impacts of the economic and political strategies of Nicaragua under the Ortega administration from 2007 to 2020. The case of the socio-political and economic crisis in Nicaragua has been of an ongoing nature lasting since 2018 when the president announced the enactment of a social security reform, which later expanded to larger demonstrations about the discontent of the Nicaragua Canal, the social injustices caused by the long-term regime, and mismanagement of the democratic elections during the Ortega administration. These impacts can be examined through the historical advances made in the policy reforms, the integration of market economy, and the pursuit of free trade agreements by the Nicaraguan government. This research explores the positive and the negative social, economic, environmental, and political impacts of Nicaragua. Finally, the implementation of free trade policy and management of economic relations with partner countries through its advantages in a free trade zone under market economic conditions, some positive effects can be seen.

Keywords: Nicaragua, market economy, agrarian reform, free trade agreements, preferential treatment, Central America, globalization

摘要

這項研究旨在揭示尼加拉瓜在 2007 年至 2020 年奧爾特加政府領導下的經濟戰略的影響。自 2018 年奧爾特加宣布頒布《尼加拉瓜社會保險改革》以來，尼加拉瓜的社會政治和經濟危機一直持續不斷。社會保障改革，後來又因之前尼加拉瓜運河的議題更擴展示威遊行，因長期政權造成的社會不公正以及奧爾特加政府執政期間對民主選舉的管理不善。這些影響可以藉由尼加拉瓜政府改革政策階段性任務來改進，市場經濟的自由化以及尼加拉瓜政府和各國的自由貿易協定簽署的優惠待遇來檢驗成果。本研究探討對尼加拉瓜社會，經濟，環境和政治的正面和負面影響。最後，在尼加拉瓜實施自由貿易政策以及透過其在市場經濟條件下的自由貿易區中的優勢來管理與夥伴國的經濟關係中，可以看到某些方面的積極影響。

關鍵詞：尼加拉瓜，市場經濟，土地改革，自由貿易協定，優惠待遇，中美洲，全球化

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List of Abbreviations

ALBA	Bolivarian Alliance for the Peoples of Our America
APP	People's Property Area
ATC	The Association of Farm Workers
BCN	Central Bank of Nicaragua
CABEI	Central American Bank for Economic Integration
CAFTA-DR	US-Central America and Dominican Republic Free Trade Agreement
CGWIC	China Great Wall Industry Corporation
CNZF	National Free Zone Commission
COSEP	Superior Council for Private Enterprise
COVID-19	Coronavirus disease 2019
ECF	Extended Credit Facility
ECLAL	Economic Commission for Latin America and the Caribbean
EPR	Extended Producer Responsibility
EXCAN	Association of Coffee Exporters of Nicaragua
FAO	Food and Agriculture Organization
FDI	Foreign Direct Investment
FENACOOP	National Federation of Agricultural and Agroindustrial Cooperatives
FSLN	The Sandinista National Liberation Front
FTA	Free Trade Agreement
FTAA	Free Trade Area of the Americas
FUNIDES	Nicaraguan Foundation for Economic and Social Development
GDP	Gross Domestic Product
GSP	Generalized System of Preferences
HKND Group	Hong Kong Nicaragua Canal Development Investment Company

IADB	Inter-American Development Bank
IFAD	International Fund for Agricultural Development
IMF	International Monetary Fund
INIDE	National Institute of Information Development
INSS	Nicaraguan Social Security Institute
MAERSK EEE	Maersk Triple E-class container ship
MDGs	Millennium Development Goals
MDRI	Multilateral Debt Relief Initiative
MEFCCA	Ministry of Family, Community, Cooperative and Associative Economy
MIDINRA	Minister of Agricultural Development and Agrarian Reform
NICA Act	Nicaragua Investment Conditionality Act
OECD	Organisation for Economic Co-operation and Development
OOT	Office of Territorial Ordering
PRGF	Poverty Reduction and Growth Facility
PRONicaragua	Nicaragua's official investment promotion agency
RTA	Regional Trade Agreement
SDGs	Sustainable Development Goals
SDT	Special and differential treatment
SSM	Special Safeguard Mechanism
TEU	Twenty-foot equivalent unit
UNAG	National Union of Farmers and Ranchers
UNO	National Opposition Union
UPANIC	Union of Agricultural Producers of Nicaragua
US	United States
USAID	United States Agency for International Development
WTO	World Trade Organization

Chapter 1 – Introduction and Motivation

Republic of Nicaragua, the largest country with the two largest fresh water lakes can be found in Central America. It is about 120,340 square kilometers, making it nearly 3 times larger than Taiwan, with a population density of 54 per square kilometer. It is abundant and rich in natural resources and manpower. The country, however, is amongst the poorest countries in the region in terms of the economy. It has relied on the prolonged foreign aid to build its economy. So, why does its overall development lag behind to its contemporaries in Latin America? Therefore, this study hopes to uncover through relevant historical factors, political factors, social factors, and factors relating to the Nicaragua's transition to market economy to analyze the obstacles that hindered its long-awaited economic development to better understand the causes of the economic stagnation of Nicaragua.

The study mainly discusses the overall economic and social development of Nicaragua from 2007 to 2020 under the current President Daniel Ortega, as of writing the paper. In view of the current social problems of poverty and unequal income distribution, the background and reasons for the formation of the social problems in Nicaragua were explored through its history. With an understanding of the social issues and the participation of free economic markets, it is important to understand how social and economic development affects each other in Nicaragua.

The political policies led by President Daniel Ortega affected the national economic development of Nicaragua. The schemes pursued by his administration often reach beyond the parameters of the market economy, but has maintained it through the signing of free and regional trade agreements, and numerous plans of development cooperation and investments,

which may well, indeed, provide positive impacts to the country. Using favorable conditions to introduce foreign capitals in Nicaragua, a large amount of international capitals came flowing in to drive the development of the country. The attraction of foreign capitals has always been the interests of many countries, to solve the problem of lack of funds, to assist in the promotion and boosting of the national economic development. The introduction of foreign capital also brings new production methods and technologies, production equipment and management experiences, all which can encourage the economic development of a nation. With the development of the economy, people's lives can be improved, and the numbers of people in poverty be reduced.

The author's research motive for producing this thesis is to demonstrate the support for making Nicaragua a better place to live in for the next generations, and support the trade liberalization, aiming to enhance the understanding and the information regarding the access to market for Nicaragua. The thesis will focus on Nicaragua since the author lived in Central American countries for the beginning eighteen years of his life, where eleven years – from year 2000 to 2011 – were spent in Nicaragua. The author deeply believes that Nicaragua has the opportunity to overcome its economic hurdles by better understanding the economic obstacles it is facing with its implementation of the market economy.

Through this study, the author hopes to provide some insights and explanations on the economic, political, and social circumstances under the Ortega administration, and provide a brief examination of its history to recent development arranged to explain the overview of economic development and the factors affecting its operation. The author also had the opportunity to participate in seminars, workshops and conferences in Taiwan where he had the pleasure of meeting important guests that works in the tourism sector, National Institute of Information Development of Nicaragua (INIDE), Central Bank of Nicaragua (BCN), water

system and treatment sector, and business sectors from Nicaragua. The hope is to create a research that examines the economic development challenges Nicaragua has experienced, and inspire people to generate opportunities and necessary steps to improve the economy status of Nicaragua in Central America.

“Leave this world a little better than you found it,” said by Robert Baden-Powell, and “know more today about the world than I knew yesterday and lessen the suffering of others,” said by Neil deGrasse Tyson, are the mottos the author tries to live by every day.



1.1. Background

Nicaragua has suffered a myriad of devastating incidents, such as the earthquake in 1972, the long-term civil war thereafter, and the socialist policies in the 1980s that affected the domestic economy, distribution of land, and industrial development for an extended time. In the 1990s, the government transitioned to a more democratic political regime, adopting the free market economy as part of the deal to receive the debt relief and economic assistance from the IMF while actively improving the investment environment to attract foreign investment. Due to the weak domestic industrial and technological foundation, the livelihood of its people and supplies relied on imports, thus, welcomed foreign investment. Export goods attached particular importance to agricultural products, textiles and garments, auto parts, leather shoes, food processing and other projects, mostly generated by foreign investment which provided job opportunities for the domestic labor force. In the state of globalization, businesses and manufacturing companies look to invest in Nicaragua to access its large labor force, tax incentives for imports and exports in its free trade zones, and other advantages to maintain a competitive edge in the market, which facilitated the economic prospects of the country.

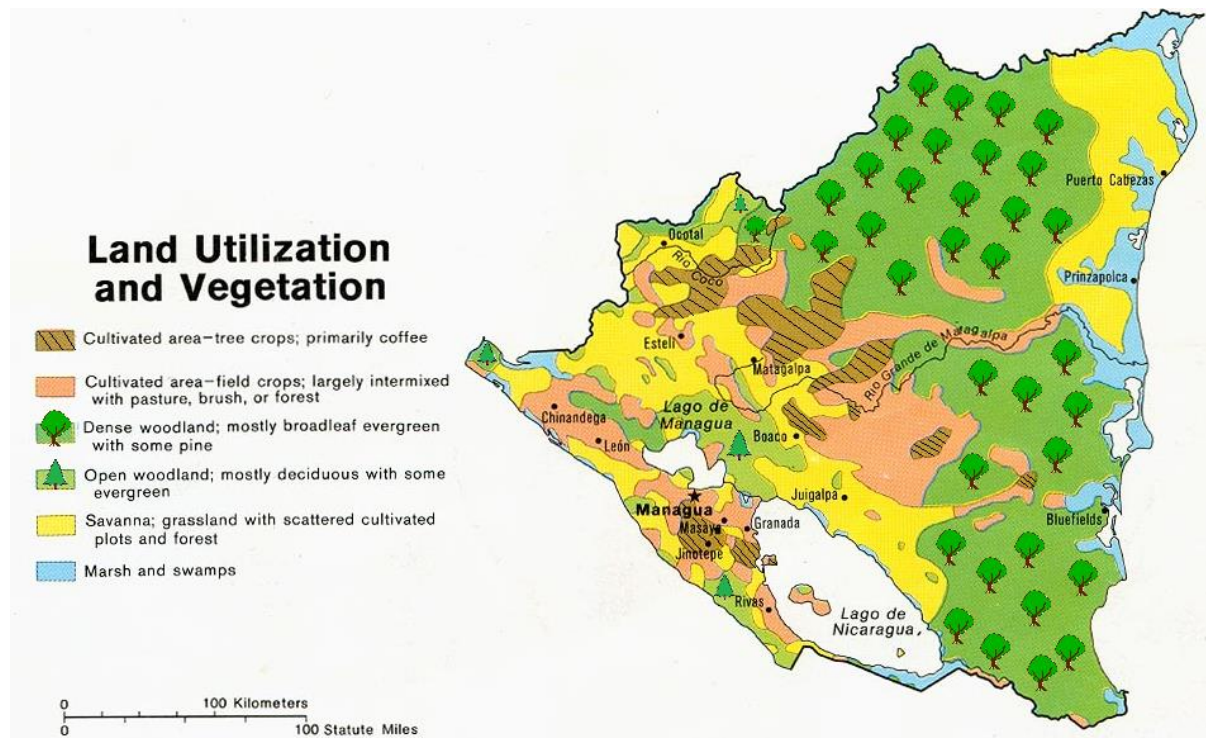
Nicaragua is known its arable land that is responsible for producing various types of agricultural products, such as coffee, bananas, beef, poultry, tobacco, maize, rice, sugar, soybeans and other beans, and timber. According to the data provided by the FAO, there is about 50,650 square kilometers of agricultural land¹ and 15,040 square kilometers of arable land.² The map on figure 1 below shows the different land use and vegetation throughout the nation, where the western part is more developed than the eastern part, the eastern being part of the two autonomous regions of the country that are mostly less developed and largely

¹ Agricultural land, according to the FAO, is the land area that is used for cultivation of crops and animal husbandry, which is under permanent crops, or under permanent meadows and pastures.

² Arable land includes land under temporary crops, temporary meadows and pasture for mowing, and land with temporary fallow; it does not account for the land that is possibly cultivable and not farmed.

comprised of dense rain forests. Nevertheless, the large plots of cultivated area scattered throughout the tropical dry forests in the eastern part are essential for the development since it provides food and income for the hundreds of thousands of people residing in the area.

Figure 1. Nicaragua - Land Utilization and Vegetation



Colored version available online at: <https://legacy.lib.utexas.edu/maps/nicaragua.html>

Economic development has taken off in recent years, and with regard to poverty reduction according to statistics from the National Institute of Information Development (Instituto Nacional de Información de Desarrollo, INIDE), the number of poor people has been reduced from 48.3 percent of the population in 2005 to 24.9 percent in 2016, while the number of extreme poverty has fallen from 17.2 percent in 2005 to 6.9 percent in 2016.³ The Zero Hunger program, also known as the Food Production Program (PPA), was a five-year program launched in 2007 to help eradicate hunger, malnutrition, extreme poverty and unemployment

³ Department of Investment Services (2019). “Investment Guide to Nicaragua”, page 3.

among the poor rural families, and was one of the more successful programs implemented in Nicaragua under President Daniel Ortega. Other economic and social programs, although effective, have yet to eradicate a significant amount of poverty while the country continues to receive international economic assistance. The poverty rate⁴ grew to 13.1 percent in 2019 from 9.5 percent in 2017, introducing an extra 240,000 people into poverty (World Bank).

National Demographics:

- Approximately 5.59 million people in 2007, and 6.39 million in 2008. The population growth rate in 2007 was 1.4 percent annual change rate.
- In 2018, there were about 6.47 million people, and in 2019 about 6.55 million. The annual rate of change was estimated to 1.1 percent.
- The population growth in Nicaragua was consistently kept above one percent in the past decade.⁵

Nicaragua is the poorest country in Central America and the second poorest in the Americas in particular. Nicaragua was listed as part of the Heavily Indebted Poor Countries (HIPC) Initiative,⁶ which made it eligible to receive economic assistance for debt relief since 1996 from the IMF and the World Bank. Additionally, in 2006, the debt relief program was accompanied by the Multilateral Debt Relief Initiative (MDRI) that provided additional debt relief to assist the eligible low-income countries to further reduce poverty, accomplish macroeconomic stability and ultimately meet the United Nations' Millennium Development Goals (MDGs) by 2015,⁷ which was later updated and modified to a more ambitious

⁴ People living with average income below \$3 per day in relations to 2011 Purchasing Power Parity (PPP).

⁵ Population Growth. World Bank Data. Retrieved: data.worldbank.org/indicator/SP.POP.GROW?locations=NI

⁶ A multilateral debt relief program launched by the IMF and World Bank in 1996 to reduce the external debt burden of low-income countries to a more sustainable level and promote implementation of poverty reduction strategy, and other key structural reforms designed to create macroeconomic stability and promote growth.

⁷ Marcelino, Sandra, and Ivetta Hakobyan (2014). "Does Lower Debt Buy Higher Growth? The Impact of Debt Relief Initiatives on Growth", p. 3.

development agenda with seventeen goals known as the Sustainable Development Goals (SDGs) set to be achieved by 2030. How to realize economic development in Nicaragua is an important issue at the present. To increase competitiveness in a freely open market, it is only after the government policies and the hard work of the people across the country that may drive and reverse the prevailing circumstances faced within the nation. This study hopes to uncover the economic circumstances, social problems, and development analysis of Nicaragua from 2007 to 2020 to better understand the reasons behind the complications to its economic development and analyze potential improvement methods.

1.2. Research Questions and Hypothesis

To understand the possibility of what Nicaragua really needs for economic development, first, it is important to identify the previous economic challenges and obstacles Nicaragua has interacted with. It is crucial to study the economic circumstances Nicaragua has been through under the tenure of President Daniel Ortega to determine whether or not the economic development of implementing the market economy was successful. As the scope of the research is broad, the following proposed research question this thesis hope to answer is aimed and focused at the direction of:

1. Why President Daniel Ortega maintained the free market reforms previously implemented by his political oppositions?
2. Why was Nicaragua unable to overcome its economic status or succeed in terms of achieving an economic development under the Ortega administration?

Initial observations:

1. By retaining an open market, the country is able to benefit from foreign direct investments to boost its economic development, creating job opportunities and productivity.
2. Exploitation of wealthy landowners (domestic and foreign; investors), political leaders, and misfortune of natural disasters might be causes that could explain the economic and environmental challenges in Nicaragua.
3. The lack of preparation from the Sandinistas government in 1979 to overtake and manage the economic activities and the implementation of the agrarian reform after the revolution caused further problems to land security and productivity.
4. Although Nicaragua enjoys a myriad of trade agreements, the byproduct of an open market made domestic farmers susceptible to market prices and import volumes.
5. The challenges of contemporary economic plans in Nicaragua:
 - Agricultural sector, outflow of labor force, unemployment; uneven distribution of resources, foreign aid (external factor, may be agenda driven); health, education, pollution, low wages, women, poor living conditions (urban slums), etc.

1.3. Literature Review

The literature review is sub-divided into three sections. First, the literature examines the market economy and transition to market economy from a socialist economy, which is largely guided by established western countries and organizations. Second, it observes literature that highlights the importance of sustainable development, a feature attached as part of the policy goals requested by the IMF to achieve the MDGs by 2015, which was later updated to achieve the SDGs by 2030. Lastly, it presents the initial challenges Nicaragua faces in its economy, land, and overall development.

1.3.1. The Market Economy

Prominent financial institutions such as the IMF and the World Bank supported the Washington Consensus, a set of economic policy recommendations for Latin America set out by John Williamson, a British economist, in 1989 that leaned toward free-market reforms. Williamson (2002) recapped the ten policy reforms that “Washington believed Latin America (not all countries) ought to be undertaking as of 1989,” which includes: fiscal discipline, reordering public expenditure priorities, tax reform, financial liberalization, exchange rate policy, trade liberalization, foreign direct investment, privatization, deregulation as in easing barriers to entry and exit, and property rights. The reforms have been largely regarded as orthodox in the OECD countries, where three key ideas are highlighted for economic development: macroeconomic discipline, a market economy, and openness to the world in terms of trade and FDI (Williamson, 2002).

The transition from a socialist economy to market economy is often guided by the international organizations, states, and experts in developed countries of the West (Lavigne, 1999). In socialist countries, the party in power is usually in control of the economy, therefore, the progress to macro-economic stability by restructuring micro-economic with the help of professionals and international organizations, such as the IMF and the World Bank, are required. The economic transition also describes the process of switching from a ‘centrally planned’ economy to a market-based allocation of economy, where the adjustment process is carried out through the transformation of the political and economic systems, sometimes relating to social changes that are brought by the change from economic planning to market-based economy (Fingleton et al., 1996).

The structural adjustment and implementation of free market reforms were the process according to which the IMF and the World Bank organization gave loans to underdeveloped countries under specific conditions to be fulfilled in its economy. These conditions were planned and devised by these institutions and were implemented under their supervision and support in order to repay its national debt. Roháč (2013) believes that the transition to a market economy was accompanied by a system of institutional reforms that consist of planned and non-planned characteristics. These programs usually contained methods that include liberalization of trade and economy, privatization of state-owned properties, improvement of the price system by eliminating subsidies or distortions, as well as increase the level of productivity and profitability of public enterprises, and reduce government expenditures while increase taxes (Doroodian, 1993).

Under the transition of market economy, economic performance would improve after substantial macroeconomic adjustment costs were experienced. Through the guidance of international organization (Lavigne, 1999), the implementation of the efficiency-enhancing policies would cause significant macro-economic costs, which will make the country need economic assistance from such organization in order to experience economic growth in later stages. Once the initial negative impact of the economic transition was absorbed, the economy would recover (Hare and Turley, 2013). For example, according to the macroeconomic patterns of these adjustment processes made by Turley (2013) show that during the first ten years of the transition there would be an increasing amount of capital flows injected into the private sector in relations to its GDP, indicating the need for private investments in a market-based economy.

The inflow of capital is very important for the development of a market economy. World

system theory regards Latin American economies as periphery countries⁸ that serve part of the capitalist world system, in which labor and resources are being exploited by the industrial system of the world (Ashcroft, 1998). Paired with the formation of a market-based economy, the less developed countries need to become capitalistic in support of increasing productivity (Mendels, 1972). For these countries to develop, the integration of newer technologies is one of the main practices to improve the wealth and the living standard of the people (Wallerstein, 1976). For instance, in rural areas, the use of machinery and factories helps boost the output levels of agricultural goods, which can later be exported at competitive prices in the global market.

1.3.2. Sustainable Development

According to the Purvis, Mao and Robinson, publications on the awareness of sustainability has risen in last two decades, one well-established description in particular utilizes the concept of three pillars of sustainability (Purvis et al. 2018). The three interconnected pillars—social, economic and environmental—have become universally known, especially among developing nations, when pursuing for economic growth while solving the problems of the social and ecological aspects of a nation to achieve economic prosperity. The broad concept of sustainable development can be traced back to 1987 by the Brundtland Commission, formerly known as World Commission on Environment and Development (WCED), was to encompass the considerations of development that “meets the needs of the present without compromising the ability of future generations to meet their own needs.”⁹ Decision-makers and policy-makers have to take long-term perspective of setting

⁸ Also referred as the periphery in context of world systems theory, which means they are less developed countries that oftentimes are dependent on, or sometimes even exploited by, more developed countries..

⁹ Federal Office for Spatial Development. Brundtland Report (1987). Retrieved in March 2018. Available at: <https://www.are.admin.ch/are/en/home/sustainable-development/international-cooperation/2030agenda/un-estones-in-sustainable-development/1987--brundtland-report.html>

policy goals that permeate into future generations, and account for the value of the environment as well as improving the socioeconomic status of the nation (Pearce et al. 1989).

While there is considerable amount of different and widespread interpretations of sustainable development, for the purpose of this research, the paper will use the definition provided by Pearce et al. (1989), which indicates economic development must guarantee at least the same level of economic opportunities in addition to social and environmental welfare. Moreover, the paper also takes into consideration the perspective of sustainable development provided by Brand (2015) that takes into account the sidelined and the subsistence-based ways of life of small farmers and indigenous peoples since most of economic plans in Nicaragua attach an importance to capital inflows, attracting foreign direct investment as a goal for economic development.

1.3.3. Challenges for Nicaragua

Kolodko (1999) identified that large government were susceptible to create weaker institutions in response to the “processes and [...] forces of liberalized markets”, which could encourage corruption and judicial instability, especially if the profits were privatized while the negative impacts and “losses [were] socialized”. Economic development is challenging when a country materializes its resources from its environment and provides cheap labor to attract foreign investments, especially when all resources are utilized for the development plans in the short-term (Todaro & Smith, 2015). Government should address the use of human capitals, use of natural resources, the environment, and policies in order to shift its goals toward a more sustainable one.

One of the core problems is that the multinational companies, national governments, and

the urban consumers are usually the winners of sustainable development (Brand, 2015). Big businesses often access less developed countries, such as Nicaragua, to exploit its resources in raw material and cheap labor for manufacturing and distribution of export goods (Wallerstein, 1976). Because countries in Latin America follow neocolonial patterns of development that consist of industrialization that usually includes mechanisms in exploiting arable lands, resources, and labor to boost its economy. Therefore, the losers of this model are the “people who depend on land, forests, and water as their traditional means of livelihood”, which are usually the poor farmers. But, how can this further be resolved with the engagement of land reform? The idea of development project is to bring positive means of livelihood to the people (Grisby Vergara, 2008), which is by creating a new alternatives for those living or working in or around the area.

Furthermore, Todaro and Smith (2015) emphasize the problems of farmers lacking resources to buy fertilizers to increase output levels since they usually use the lands as collateral to moneylenders, banks, or loans to buy the materials and equipment needed to boost production. Therefore, if the strategy fails to incentivize these farmers to increase their production capabilities, especially since in Nicaragua most of the farmers are just the tenants of the lands and do not have full ownership, it will further create poverty trap for these farmers that will further create problems of food security should the agricultural productivity decrease. Dethier and Effenberger (2011) stated that agriculture is the main source of income for most people living in the rural areas, with nearly 86 percent of them dependent on agricultural production.

When the farmers decide to produce commercial goods, governments usually support them with subsidies and access to credit that provide fertilizers, equipment, land protection services, and other output-oriented mechanisms to increase productivity via and support the

agricultural exports. Schultz (1953) stated that agriculture is crucial for the economic growth in the terms of ensuring subsistence for the nation, while Johnston and Mellor (1961) emphasized on the importance its importance in terms of the provision of raw materials for the industrial sector and food consumption for the nation, which in return can increase the income of the rural population. However, if the cycle of focusing on producing commercial goods is taken, it will create food scarcity problems for the domestic population since no producers are harvesting food for general consumption, which is why most developing countries import mass amount of food, usually from the U.S. or Canada that has great bargaining power to influence the food market when other countries tries to compete. The Food Price Crisis in 2007-08, for example, was created since too many farmers focused on increasing commercial products for exports rather than food for their own country.

As a response, consistent to the theme of solidarity promoted by the Sandinista party in Nicaragua, Adelman (1984) argued that the emphasis of agricultural productivity should be focused on the small- and medium- sized farms since they tend to produce goods for the domestic consumption rather than the large-scale producers that uses imported machinery and other output-oriented methods to produce goods for exports. In addition, market liberalization actually hurt small farmers the most since they are vulnerable to distortions of prices and failures of the market (Bezemer and Headey, 2008). Not to mention the property rights problems pointed out by Cook and Iliopoulos (2000), reasoning that cooperatives and even individual farmers would feel discouraged to invest their own capital to help boost production amid uncertain land tenure.

Furthermore, with the irreversible trend of globalization, the economic development of the growing global populations and consumption trends in developed economies around the world, according to Klimentov (2018), is expected to be unsustainable for the economic

transformation of developing countries. He learned that the renewable resources recycling rate, for instance, in China only has increased by 0.83 percent in span of four years – 21.05 percent in 2015 compared to 20.22 percent in 2011 – while the cost of not recycling each year for the European economy cost about US\$121 billion, and that it “could see a 3.9 percent GDP increase by shifting toward [sustainable] practices.”¹⁰

1.4. Methodology

The research method is primarily qualitative to better understand the impacts of the economic challenges encountered under the Ortega administration. A qualitative research design will be used to determine what these impacts are, and attributing causes of these impacts with in-depth and exploratory means. The focus will be to analyze the patterns of economic development through references with the economic trends, the social and economic policies implemented by the Nicaraguan government, as well as the political reforms, such as the agrarian and social reforms, experienced in Nicaragua.

Several of sources that will be analyzed ranges from secondary sources – government policy reports and laws, trade agreements, academic researches, and media coverage to information and data retrieved from the Central Bank of Nicaragua (BCN), PRONicaragua, INIDE, as well as long established reputable organizations such as the IMF, World Bank, and FAO as references to support the analyses, and among others, speeches, testimonials, and a firsthand information gathered by the author regarding the plans for building the Nicaragua Canal from the Nicaraguan Embassy are utilized to determine and identify the patterns and

¹⁰ Klimentov, Mikhail, “Coming full circle? The state of circular economies around the globe”, accessed November 29, 2018, <https://www.greenbiz.com/article/coming-full-circle-state-circular-economies-around-globe>

effects of the economic plans and trends – imports and exports, the FDI inflow – of Nicaragua along with a historiographical analysis of past reforms to examine the effects of their implementation to the economy. Specific time periods, such as the post-civil war Sandinistas regime, the transition to democratic regimes, and the Ortega regime will be examined.

As previously stated, the purpose of this thesis is to create a better understanding of the underlying causes of the economic development of Nicaragua. The case study of Nicaragua is a single case study; this allows the researcher to analyze the direct, in-depth characteristics and nature of impacts that the Nicaraguan economy can and have experienced.

1.5. Research Limitation

Due to the scope of the recent political turmoil of Nicaragua in 2018, plus the subsequent effects of COVID-19 pandemic in 2020, the likelihood of uncovering the impacts occurring or not occurring within the nation is something that continues to be not disclosed transparently through the media, especially under the long tenure of the Ortega administration. Achieving economic development is the main consensus for the people of Nicaragua, therefore, the research will focus on uncovering the past and present economic trends and challenges that the nation has experienced in order to examine and suggest opportunities and steps toward economic development that should work within the conditions of market liberalization, which encourages competition and cooperation.

Chapter 2 – Economy of Nicaragua.

The purpose of this chapter is to revise the economic trends and indicators of Nicaragua under the Ortega administration. In order to capture the patterns of economic trends created by President Daniel Ortega, it is necessary to interpret the main reasons why he maintained the free market reforms previously pursued by his opposition from the rightwing democratic party in contrast to his more radical, anti-free market rhetoric, and socialist approach in the 1980s.

2.1. Economic Overview

One of the first economic affairs President Ortega took care of in the beginning of his second term was the assurance to investors and businesses in respect to the private sector that the country will remain opened.¹¹ He promised to work for and put the Nicaraguan poor people first, reassuring increased job opportunities, while the lawmakers from the opposition would ensure that the government is on track with continuation of the free market reforms and the promotion of free press. In order to help lift extreme poverty and hunger coupled with the attraction of foreign investments, President Ortega required assistance from the IMF, which in turn requested that the government maintain an open market, minimize fiscal expenditures, and promote fiscal transparency for as long as it receives its economic assistance.

When Daniel Ortega was elected president at the end of 2006, an IMF representative paid the transitioning government a visit in December. The meeting discussed the successful macroeconomic stability and economic progress created under the exiting President Bolaños

¹¹ Ortega wins Nicaraguan presidency. *The Guardian Press*, November, 8, 2006. Retrieved February 2018. <https://www.theguardian.com/world/2006/nov/08/1>

with the support of the IMF and international community, including the debt relief of MDRI, and further extended to dialogues of reconciliation with the President-elect Ortega. The following statement was officially given by Anoop Singh, Director of the Western Hemisphere Department of the IMF:¹²

“President-elect Ortega has emphasized to me his commitment to prudent macroeconomic policies and intensifying poverty reduction. In particular, [...] his intention to work with the Fund towards an early new economic program that would entrench stability in Nicaragua, and move ahead with reforms critical for raising investment and sustainable growth, and accelerating employment creation and poverty reduction.”

Through the negotiations between President Ortega and the IMF in May and July 2007, the government was able to attain debt relief and a medium-term loan through the Poverty Reduction and Growth Facility (PRGF). The Nicaraguan government signed a 3-year deal in October 2007 that approved about \$111.3 million to support the anti-poverty programs and sustain the level of macroeconomic performance. The government was required to retain a sustainable amount of public debt through fiscal discipline in order to prioritize on social programs and infrastructure. Under the IMF supervision, transparency of fiscal management and spending was essential to strengthen investor confidence and achieve the MDGs that aimed to improve “access to health, education, water and sanitation, food security, housing and training opportunities for the poorest”.¹³

Since the defeat of President Ortega in the 1990 election, U.S. capital inflows to

¹² Press Release: Statement by Anoop Singh, Director of the IMF's Western Hemisphere Department, in Nicaragua. December 20, 2006. <https://www.imf.org/en/News/Articles/2015/09/14/01/49/pr06292>

¹³ Press Release: IMF Executive Board Approves US\$111.3 Million PRGF Arrangement for Nicaragua. October 5, 2007. <https://www.imf.org/en/News/Articles/2015/09/14/01/49/pr07224>

Nicaragua via foreign investments has risen due to cheap labor and low crime rates. Therefore, the Ortega administration maintained the business-welcoming atmosphere since 2007 and worked to meet the terms of the IMF and the CAFTA-DR agreement to strengthen the overall economic performance.

Table 1. Nicaragua: Selected Economic Indicators from 2007 to 2018.

Year	GDP growth (%)	GDP (millions of US dollars)	Imports (millions of US dollars) ¹⁴	Exports (millions of US dollars) ¹⁵	Remittances (millions of US dollars)	GDP per capita (US\$)
2007	5.1	7,316	3,610.6	1,222.1	739.6	1,327
2008	3.4	8,254	4,316.7	1,475.3	818.1	1,498
2009	-3.3	8,156	3,489.0	1,393.8	768.4	1,445
2010	4.4	8,586	4,173.2	1,822.1	822.8	1,506
2011	6.3	9,636	5,203.7	2,251.7	911.6	1,630
2012	6.5	10,508	5,854.1	2,671.9	1,014.2	1,735
2013	4.9	11,255	5,656.5	2,436.2	1,077.7	1,790
2014	4.8	11,806	5,876.5	2,670.8	1,135.8	1,917
2015	4.8	12,693	5,906.2	2,421.7	1,193.4	2,037
2016	4.6	13,230	5,887.2	2,226.4	1,264.1	2,030
2017	4.7	13,814	6,092.3	2,548.3	1,390.8	2,156
2018	-3.8	13,179	5,199.6	2,516.9	1,501.2	2,022

Source: BCN. Available at: bcn.gob.ni/estadisticas/sector_real/produccion/1-1.htm, bcn.gob.ni/estadisticas/sector_externo/comercio_exterior/importaciones/6-14.htm, and bcn.gob.ni/estadisticas/siec/datos/1a.2.1.04.htm

By the end of 2007, the GDP growth has risen above 5 percent, amounting about US\$7.3

¹⁴ Does not include the imports made in Free Trade Zones

¹⁵ Does not include the exports made in Free Trade Zones.

billion (see table 1). The sudden economic boost was due to President Ortega reaching out to join the socialist coalitions of ALBA during his inauguration in January 2007 to cooperate with major partners, such as Venezuela, Cuba, and Iran, on the development schemes and establish economic relations that would attract more financial and investment opportunities to improve the infrastructure of the energy and agricultural sectors of Nicaragua.

In 2008, the IMF granted an additional US\$10 million¹⁶ in financial support via the PRGF to offset the negative effects of the Category 5 status Hurricane Felix in September 2007, estimating a total amount of about US\$716 million in damages,¹⁷ where FAO evaluated more than US\$46.7 million in damages to the agricultural sector.¹⁸ By the end of 2008, GDP growth maintained a positive growth of 3.4 percent. Nevertheless, due the state of recovery from the natural disaster plus the external factor of the global financial crisis in 2008, the GDP growth rate in 2009 contracted by minus 3.3 percent, entering its first recession in which exports also declined due to lower demands of the international market. By late 2009, the Nicaraguan government had about US\$37.9 million from the PRGF to distribute over the course of 2010.

In early 2010, from February to March, the Nicaraguan government would enter another round of negotiations with the IMF to discuss for an extension of the 3-year PRGF arrangement signed in 2007. The deal was revised and would replace the original PRGF by the Extended Credit Facility (ECF) to promote longer-term reforms. In November, the IMF approved the extension of the ECF to December 2011 with an immediate disbursement of US\$8.95 million

¹⁶ Press Release: IMF Executive Board Completes First Review Under Nicaragua's PRGF Arrangement and Approves Increase in Financial Support by US\$10 million. September 11, 2008. Retrieved May 2018. <https://www.imf.org/en/News/Articles/2015/09/14/01/49/pr08204>

¹⁷ Hurricane finished plunging them into poverty. January 29, 2008. Retrieved February 2018. <https://web.archive.org/web/20090122094329/http://impreso.elnuevodiario.com.ni/2007/01/29/especiales/84368>

¹⁸ Assessment of Damage Caused by Hurricane Felix in the Caribbean of Nicaragua. FAO. 2007. Retrieved July 2018. http://www.fao.org/fileadmin/templates/tc/tce/pdf/Nicaragua_FAO_Evaluacion_2007.pdf

to continue to support the strong consumption and investment levels in Nicaragua,¹⁹ which is reflected on its GDP growth of 4.4 percent in 2010. In the following years, the IMF would continue to oversee its economic activities, stating that the outlook for 2011 and subsequent years were “favorable” and “generally positive”, indicated on its increased average of GDP growth from 2011 to 2017 by 5.2 percent, the highest compared to its neighboring countries.

In the past five years, the share of economic sectors in the GDP of Nicaragua has shifted toward the service sector. Regarding 2015, agriculture accounted for 18.8 percent of the GDP, industry accounted for 26.9 percent, and services for 54.3 percent (see table 2). As of 2018, agriculture sector dropped to 16.9 percent and industry 23.8 percent while the service sector grew to 59.3 percent. Services provided to the foreign investments, working on the agricultural products and livestock products at exporting industries in or out the free trade zones continued to grow as the manufacturing sector also supported the momentum of economic growth in the service sector of Nicaragua.

Table 2. Economic Sectors (% of GDP) from 2008 to 2018.

Year	Sector (% of GDP)			
	Agriculture	Industry	Manufacturing	Service
2008	19.5	28.1	16.9	52.4
2009	19.2	29.3	21.7	51.5
2010	20.8	26.9	24.3	52.3
2011	23.1	28.4	24.5	48.5
2012	21.9	29.4	24.3	48.7

¹⁹ Press Release: IMF Executive Board Completes Sixth Review of Nicaragua’s Extended Credit Facility and approves US\$8.95 Million Disbursement. April 27, 2011. Retrieved May 2018. <https://www.imf.org/en/News/Articles/2015/09/14/01/49/pr11148>

2013	22.9	26.9	25.6	50.2
2014	22.6	28.3	16.9	49.1
2015	18.8	26.9	14.7	54.3
2016	17.3	26.8	15.0	55.9
2017	17.2	26.2	15.2	56.6
2018	16.9	23.8	15.6	59.3

Source: BCN. Available at: tairaresource.com/total01.asp

However, due to the social and economic crisis that broke out in 2018, the economy was down and service industry declined. The Nicaraguan service sector accounted for about 60 percent of the GDP, employing more than half of its working population, has dropped in 2019 to about 50 percent in the preliminary data (World Bank).²⁰ Its recovery is very important for medium and long-term economic growth of Nicaragua since the main contributors in services are in traditional activities, such as tourism, personal, social and business services, government services and transport and telecommunication,²¹ in addition to the growing services in the financial sector.²² Moreover, due to the recent COVID-19 pandemic in 2020, the economy of Nicaragua would suffer a recession on all aspects, not just mainly the services, but supply chains of imports and exports as well as the participation of the labor force.

Nicaragua has established production traditionally based on agriculture, forestry, fishery and animal, whereas the domestic development of industry and services are foreign-owned and labor intensive. The domestic job opportunities paid low wages, thus the labor force immigrate

²⁰ Retrieved in May 2020. data.worldbank.org/indicator/NV.SRV.TOTL.ZS?locations=NI&view=chart

²¹ Services Policy Review. UN Conference on Trade and Development (UNCTAD), 2013. Retrieved March 2020. http://unctad.org/en/PublicationsLibrary/ditctncd2013d13_en.pdf

²² Financial Services: Business Potential in Central America. *Central America Data*. June 25, 2020. https://www.centralamericadata.com/en/article/home/Financial_Services_Business_Potential_in_Central_America

to neighboring countries to earn remittances. In 2007, during President Ortega's second term, the remittances to Nicaragua from foreign countries were US\$739.6 million, and by 2012 during his third term, that numbers increased by 37 percent, breaking the billion dollar mark to US\$1.01 billion (see table 1). In the following years, the remittances to Nicaragua continued to grow, and in 2018 the total remittances to Nicaragua reached US\$1.5 billion. For instance, most of labor force chose to work in Costa Rica at low-skilled occupations and sectors that paid better than the national wages, such as construction, domestic services and agriculture – 60 percent of coffee pickers were identified as immigrants in Costa Rica (OECD, 2018).

It was estimated that about 20 percent of Nicaraguans worked abroad to earn remittances to support their families. In 2019, the tax reforms were implemented instead of adjusting the minimum wages of workers to maintain foreign investments, reducing employment between 30 to 35 percent in the industrial sector, stated by Sergio Maltez, president of the Chamber of Industries of Nicaragua in July.²³ The Nicaraguan government passed Law 987 on February 28, 2019 as a reform to the tax Law 822,²⁴ which included the following but not limited to:²⁵

- 1) Increase personal income tax to the withholding rate of board of directors and similar head positions from the original 12.5 percent to 25 percent, while local workers have retained at 12.5 percent and non-residents at 20 percent.
- 2) Cooperatives with annual gross income larger than \$60 million córdobas (US\$1.73 million), originally \$40 million córdobas (US\$1.15 million), must pay an increased

²³ Tax reform reduces industrial employment by 30 percent. *El Nuevo Diario*. July, 4, 2019. Retrieved March 2020. <https://www.elnuevodiario.com.ni/economia/495628-reforma-fiscal-desempleo-nicaragua/>

²⁴ Law 822, also known as Tax Concertation Law, was approved in January 2013 to expand export incentives and encourage agricultural production in rural areas. For instance, a deduction of income tax equivalent to 1.5 percent of its export value for the first to six years for the newly established and existing exporter, exemption of Value Added Tax and Selective Consumption Tax, transfers of raw materials, intermediate goods, capital goods, spares, parts and accessories for machinery and equipment to agricultural producers. Information retrieved from PRONicaragua (2019), Investor Guideline, p. 48.

²⁵ Main changes to the Income Tax in Nicaragua. *García & Bodán (Attorneys and Counselors at Law)*. March 30, 2019. Available at: <https://garciabodan.com/en/main-changes-to-the-income-tax-in-nicaragua/>

annual income tax from the original 1 percent to 3 percent, while the fishing sectors in the Caribbean and main taxpaying contributors increased from 1 percent to 2 percent.

- 3) 10 percent deduction of income from foreign financial institutions, and increase resident and non-resident income and capital gains, including trusts, from 10 percent to 15 percent, while increasing the withholding to tax havens²⁶ from 17 percent to 30 percent.

The implementation of the new tax reform hoped to counter the budget deficits of about US\$300 million the government was facing in order to maintain fiscal stability.²⁷ The Superior Council for Private Enterprise (COSEP), the main business chamber that represents the private institutions in Nicaragua, has criticized greatly the government's enforcement of the new tax law, stating that the new tax law will seriously hurt the operation and production of the enterprises, especially when the new tax law increases the minimum income tax calculated based on revenue, which may exceed the actual profits of the enterprises.

In response to the incident, the government decided to increase the wages by 8.25 percent for the workers in the free zone areas on January 1, 2020, and adjust the minimum wage of other sectors by 2.63 percent starting March 1, 2020 (see table 3). However, with the prices rising year by year and the inflation index increasing as well, the conversion of Nicaraguan currency into U.S. dollars is still not much lower than the minimum wage level of 2018. In comparison to the similar wage adjustment the government ratified on January 1, 2018 for workers in free zone industries, an increase of 8.25 percent was provided much like the updated one in the year

²⁶ Financial technique that allows businesses and organizations to pay less tax compared to their nation.

²⁷ Department of Investment Services (2019). "Investment Guide to Nicaragua", pp. 34-36.

2020. *La Prensa*, the local daily newspaper, reported that the minimum wage was 5,044.7 córdobas (about US\$180) prior the adjustment and increased to 5,460.9 córdobas (about US\$190) thereafter,²⁸ which has not increased much in comparison to the new monthly salary of 6,399.07 córdobas when converted into US\$188.50 in 2020.

Table 3. Nicaragua: Minimum Wage Adjustment in 2020.

Economic sector	Wage Adjustment (%)	New monthly salary (approximate in U.S. dollars)
Agriculture	2.63%	US\$ 126.30
Fishing	2.63%	US\$ 192.00
Mining and quarrying	2.63%	US\$ 227.50
Manufacturing Industry	2.63%	US\$ 170.00
Free Zone Industries	8.25%	US\$ 188.50
Micro and Small National Handicraft and Tourism Industry	2.63%	US\$ 135.00
Electricity and Water; Commerce, Restaurants and Hotels; Transportation, Storage and Communications	2.63%	US\$ 232.50
Construction, Financial Establishments and Insurance	2.63%	US\$ 283.10
Community, social and personal services	2.63%	US\$ 177.00
Central and Municipal Government	2.63%	US\$ 157.50

Source: JD Supra. Available at: [jdsupra.com/legalnews/nicaragua-increase-in-minimum-wage-for-75132/](https://www.jdsupra.com/legalnews/nicaragua-increase-in-minimum-wage-for-75132/)

According to the national income per capita, the per capita gross national income

²⁸ Nicaragua: 8.25% Increase in Wages in Free Zones. June 8, 2017. Retrieved March 2019. https://www.centralamericadata.com/en/article/home/Nicaragua_825_Increase_in_Wages_in_Free_Zones

provided by the World Bank measures a country's most recent and updated version of the annual income divided by the value of the population, reflecting the average income of a citizen within the country. To understand the current economic strength and needs of a country, the data of World Bank will be used here to better understand the standard of living of the citizens of Nicaragua, starting from the third term of President Ortega. The per capita gross national income of a country is closely related to social, economic and environmental indicators. People living in countries with lower gross national income per capita tend to have shorter life span, access to sufficient food and safe drinking water, low literacy, low medical standards, and high infant mortality rates.

Table 4. GDP per capita (based current US\$)²⁹

Year	2012	2013	2014	2015	2016	2017	2018	2019
GDP per capita (US\$)	1760	1812	1934	2050	2108	2159	2021	1913

Retrieved from World Bank. Available at: data.worldbank.org/indicator/NY.GDP.PCAP.CD?locations=NI

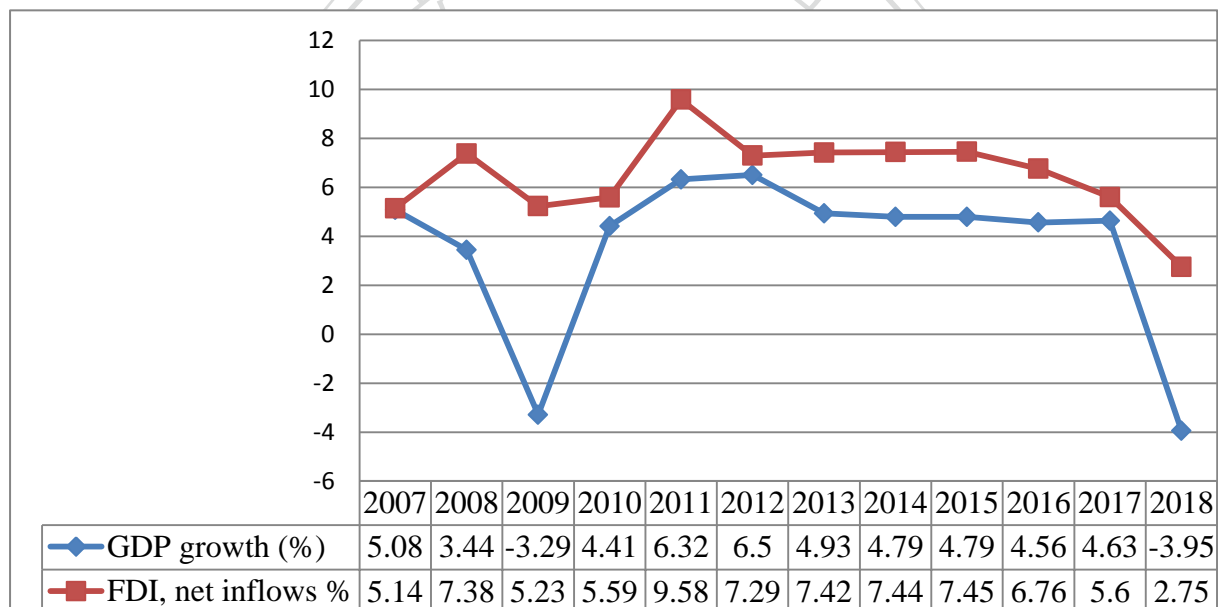
In reference to the World Bank data, the per capita income was about US\$2,159 in 2017 (see table 4), which was a substantial increase of above 62.7 percent compared to the US\$1,327 in 2007 (see table 1). In 2018, because of the political and economic crisis, the per capita income dropped to US\$2,021 and continued declining in 2019 to US\$1,913, which is lower than the income of US\$2,159 in prior the crisis in 2017. The World Bank ranked Nicaragua at 142 out of 190 economies in doing businesses for 2020.³⁰ That would mean that about 42 percent of the population earns less than US\$1.25 a day, where the unemployment rate is about 6.8 percent in 2019, which is higher than the 3.3 percent in 2017 (World Bank).

²⁹ Based on 2020 US\$ currency. Retrieved in June 2020.

³⁰ Doing Businesses 2020. World Bank Group. <http://documents1.worldbank.org/curated/en/688761571934946384/pdf/Doing-Business-2020-Comparing-Business-Regulation-in-190-Economies.pdf>

The IMF stated that in 2010, the FDI coming from the United States, Mexico, Venezuela, Canada, and Spain grew to US\$1.56 billion in 2010 from US\$335.7 million in 2007 (IMF, 2011). Furthermore, the total FDI attracted during the period 2007-2010 combined was US\$1.95 billion higher in comparison to the period 2002-2006 that brought in US\$720 million.³¹ The economy of Nicaragua has experienced positive growths for eight consecutive years, which is reflected on its average annual economic growth rate of more than 5.1 percent from 2010 to 2017 (see figure 2).

Figure 2. GDP Growth and FDI inflow from 2007 to 2018.



Source: World Bank.

In 2012, the GDP growth rate rose slightly from 6.32 percent in 2011 to 6.5 percent due to the result of the presidential elections and new promises made for economic expansions by President Ortega. In 2015, the net inflows of FDI in Nicaragua reached its peak of about US\$950 million, accounting for 7.45 percent of its GDP. The average GDP growth from 2013 to 2017 sustained a positive growth of above 4.5 percent, making it the most consistent and the

³¹ *ibid.*

second only to Panama in Central America. However, due to the socio-political outbreak in 2018, the economy experienced a reduction in GDP with an economic recession of minus 3.8 percent that amounted US\$13.2 billion.

The main industries in the manufacturing sector was dominated by the food processing industry, accounting for about 20 percent of GDP and 35 percent of total exports. Agricultural output value accounted for about 20 percent of GDP while agricultural related products exports accounted for about 60 percent of total exports. Among the bulk, meat and refined sugar products are the highest. The Nicaraguan government adjusted its trade policy to create conditions that encourage diversification of export production in addition to its already established traditional exports like coffee and cash crops. It facilitated access of existing markets and new markets, and pursued free trade agreements with large trading partners in the international arena to keep reaping the benefits from the free market reforms. For instance, the government eased the relocation for textile and garment facilities in free zones and continued the CAFTA-DR free trade agreement with the U.S. to incentivize foreign investments to increase exports and help create jobs in Nicaragua.³²

Table 5. Top Product Export (% share of total export) in 2018 and Total Export (in US\$) to the World in relations to the progress made from year 2006 to 2013.

Product \ Year	2006	2007	2008	2009	2010	2011	2012	2013	2018
Consumer goods	12.90	16.81	38.10	18.58	15.64	13.86	45.60	50.67	52.84
Raw Materials	64.60	55.41	32.42	54.39	53.57	54.82	33.66	29.15	30.17
Textiles and clothing	0.75	0.30	22.37	0.15	0.12	0.11	25.66	28.52	29.11
Animal	26.14	35.10	18.16	35.58	33.16	32.57	18.96	19.04	18.91

³² Miller (2016). *Sustainable Ecotourism in Central America*, pp. 31-32.

Intermediate goods	21.27	26.62	16.50	25.77	29.98	30.47	20.26	19.70	16.12
Vegetable	39.21	30.14	20.77	31.85	30.44	30.32	19.88	14.84	15.98
Total Export (U.S. dollars) ³³	\$759 Mil.	\$1.19 Bil.	\$2.54 Bil.	\$1.39 Bil.	\$1.85 Bil.	\$2.28 Bil.	\$4.55 Bil.	\$4.59 Bil.	\$5.01 Bil.

Source: World Bank.

As a result, textiles and clothing grew from a share in exports of 0.3 percent in 2007 to a 22.37 percent in 2008 (see table 5). The exports of such goods plummeted in 2009 due to the global financial crisis, the Nicaraguan Association of Textile and Apparel Industry (ANITEC) calculated that approximately 19,000 jobs were lost in the textile clothing sector of the free zones.³⁴ The sector later recovered in 2012, improving its percent of exports share to the world from 2012 to 2018 to an average of 27.97 percent due to expanding its exports to neighboring countries in Central America, such as Honduras and Mexico, effectively establishing it as one of the top exports among consumer goods and raw materials, despite having to cope with the absence of the Tariff Preference Level (TPL) extension that came with the CAFTA-DR from 2013 to 2024, which allowed certain clothing and apparels made and assembled in Nicaragua to enter the U.S. market duty free.³⁵

2.2. Demographic dividend

In regards to the population of Nicaragua, according to the OECD Economic Surveys of Costa Rica published on April 2018, it indicated that the labor productivity of Central America

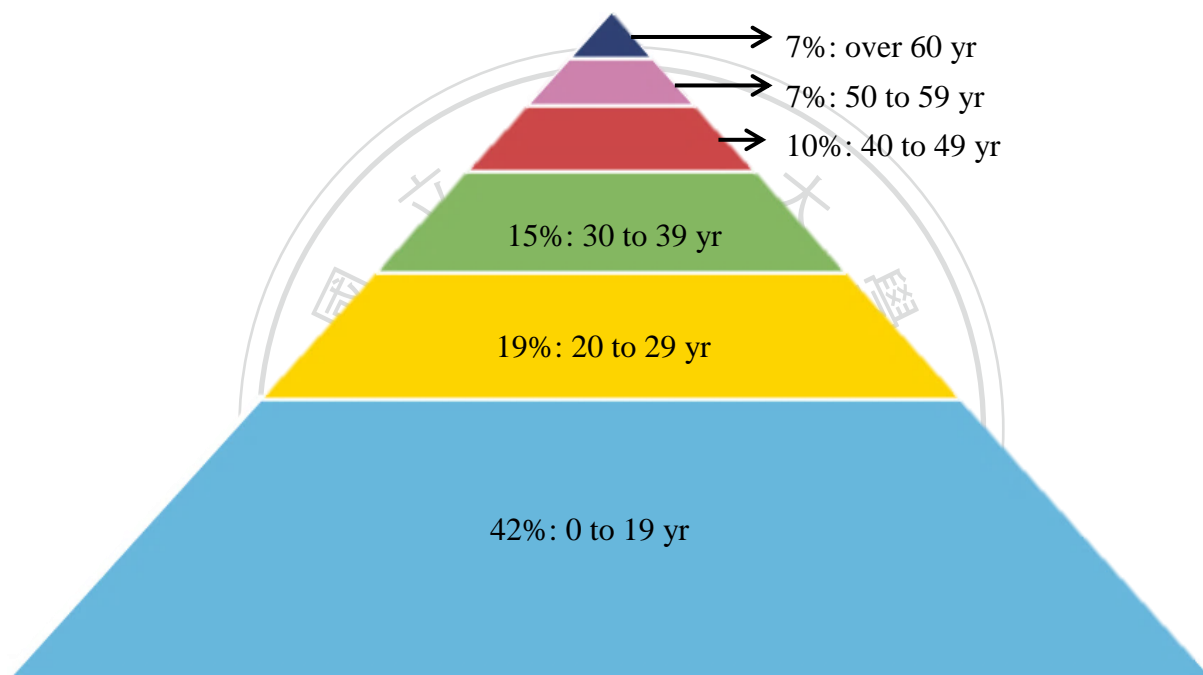
³³ Exports made included in Free Trade Zones.

³⁴ Portocarrero (2010). *The Textile and Clothing Sector and Sustainable Development in Nicaragua*, p.18.

³⁵ "CAFTA-DR: Nicaragua TPL." *USFIA - United States Fashion Industry Association*, 18 June 2013, available at: <https://usfashionindustry.com/policy/global-trade/cafta-dr-a-nicaragua-tpl>

was lower than the average level of the entire Latin America.³⁶ The proportion of working age population from 15 to 65 in relation to the total population has risen. INIDE estimated that Nicaragua has about 42 percent of people under 20 years old, 19 percent from 20 to 29, 15 percent from 30 to 39, 10 percent from 40 to 49, 7 percent from 50 to 59, and finally, 7 percent of people over 60 years old in accordance with the total population (see figure 3).³⁷

Figure 3. Population of Nicaragua by age group



Source: INIDE. Available at: <http://www.codeni.org.ni/datos-socio-demograficos/demografia/poblacion-por-sexo-grupos-de-edades-y-edades-simples/>

The statistics indicated a demographic dividend, which means that there are shifts in the age of population structure where the working age population turned out to be larger than the non-working age population that may result in a potential increase of economic growth in

³⁶ Costa Rica, Overview. April 2018. Retrieved May 2019. <http://www.oecd.org/economy/surveys/Costa-Rica-2018-OECD-economic-survey-overview.pdf>

³⁷ Population by sex and age groups. Federación Coordinadora Nicaragüense (CODENI). Retrieved March 2020. <http://www.codeni.org.ni/datos-socio-demograficos/demografia/poblacion-por-sexo-grupos-de-edades-y-edades-simples/>

terms of productivity, as defined by the United Nations Population Fund. This signifies that the foreign investments in Nicaragua are able to utilize the young labor force, about 42 percent of workers under 20 years old plus 34 percent of workers from 20 to 39 years old, yielding about 4.97 million people under age of 39 eligible to work in the service sector and manufacturing sector if calculated from the total population of 6.546 million people³⁸ in Nicaragua (see table in appendix A for more detailed numbers).

Juan Sebastian Chamorro, a representative of the private sector in the national dialogue for Nicaragua and chief executive of the Nicaraguan Foundation for Economic and Social Development (FUNIDES), a think tank related with the private sector, stated that political policies should make good use of the demographic dividend during the demographic transitional stages. It is necessary to draw on the relevant experience of other countries to formulate policies, such as improve the level of education, improve the professional occupations of the labor force, provide vocational and technical training, and make full use of the human resources in Nicaragua to accelerate economic growth.

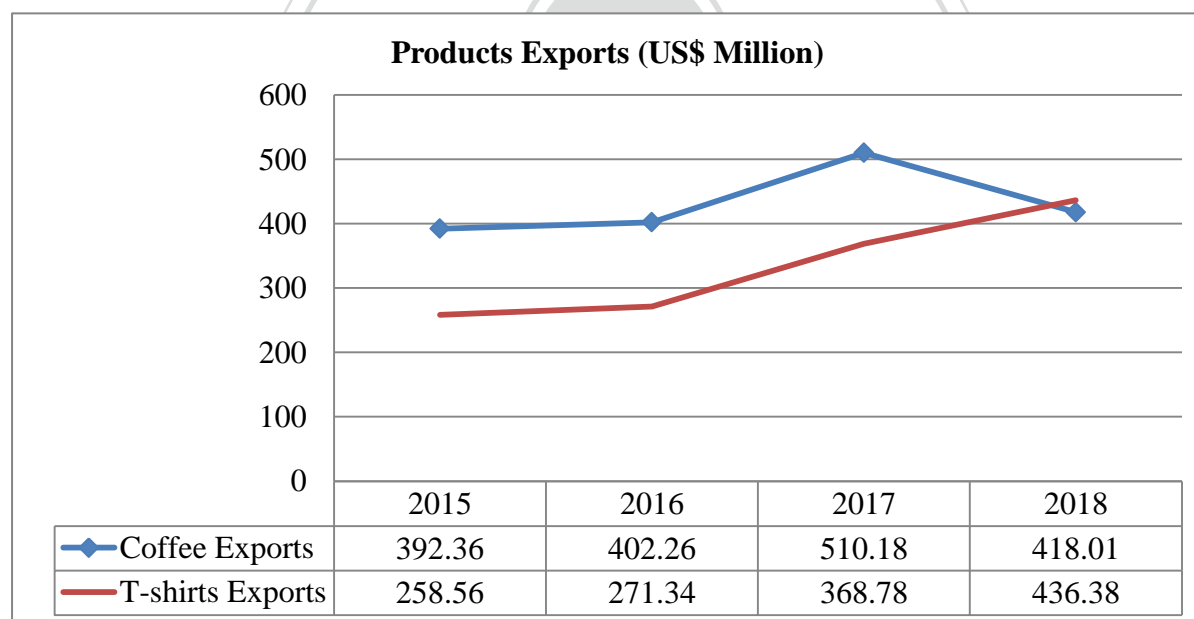
In order to improve the economic well-being of the people of Nicaragua, the increase of total income and consumption capacity of the labor force, the establishment of pensions and health insurance should also be prepared immediately. The Nicaraguan government could refer to its neighboring countries facing similar demographic changes to adjust its social services, labor and national health insurance, and other needs, so as not to cause greater financial stress and social pressure that has been demonstrated throughout prolonged sociopolitical crisis that has started since 2018, where mostly students protest against the pension reform that reduced payments to retirees and increased social contributions of workers.

³⁸ Estimates calculated in reference to the data from World Bank. Retrieved in June 2020.

2.3. Foreign Trade

Nicaraguan coffee exports amounted to US\$418 million in 2018 (see figure 4), which was reduced by about 18 percent from the previous year due to the decline of international coffee prices plus the effects of the domestic social and economic crisis, losing its top position in exports to the t-shirts exports. In 2019, the Nicaraguan coffee exports reached 340 million pounds, a slight reduction in comparison to the previous year, which was estimated to be more than US\$400 million according to the Association of Coffee Exporters of Nicaragua (EXCAN), but pointed out that the international coffee prices have fallen.³⁹

Figure 4. Coffee and T-shirts Exports to the world from 2015 to 2018



Source: World Bank. Available at: <https://wits.worldbank.org/CountryProfile/en/Country/NIC/Year/2015/Summary>

The average export price of coffee was at 103 dollars per 100 pounds, and in 2019 dropped to 89 dollars per 100 pounds,⁴⁰ while the production cost has risen to about 140

³⁹ Coffee price drops below 98.53 dollars. *El Nuevo Diario*. Retrieved May 2020. <https://www.elnuevodiario.com.ni/economia/493880-cafetaderos-prcio-cafe-quintal/>

⁴⁰ Bolaños (2019). Nicaragua: Coffee Annual, p. 2.

dollars. It is estimated that 300 million pounds will be exported in 2020, and that the exports of coffee are likely to be reduced by 12 percent as stated by the president of EXCAN, José Ángel Buitrago.⁴¹ Therefore, the private sector is not optimistic about the economic outlook of agricultural exports. The international prices of important agricultural products such as beef, coffee, and sugar have fallen; hence, the government has to identify ways to reduce production costs of its highest export products to help offset the negative yields.

From October 2019 to mid-January 2020, 57 coffee processing plants in major coffee producing areas in Nicaragua produced about 150 million pounds of green coffee beans, which has reached 45 percent of the entire production season. In 2019, coffee exports reached US\$460.2 million, based on the coffee harvesting season from October to December each year. The Nicaraguan coffee farmers were challenged by the effects of disproportionate rainfall that affected the quality of coffee beans, and therefore, reducing the amount of coffee exports by the end of harvesting season.

Although Nicaragua has an extended history and experience in the production of coffee, the consumption level is not as prominent as its neighboring countries in Central America. According to reports, the total domestic consumption of coffee was about 22.49 million pounds of which half of them were instant coffee and the other half roasted.⁴² The total coffee exports reached 341.34 million pounds (see table 6) during its harvesting season between the 2018 and 2019 period, where the U.S. imported more than half of its total exports amounting to 181.3 million pounds.

⁴¹ Nicaraguan Coffee will feel the ravages of the fiscal reform and the lack of financing this year. *La Prensa*, February 12, 2020. Retrieved May 2020. <https://www.laprensa.com.ni/2020/02/12/economia/2640144-cafe-de-nicaragua-sentira-este-ano-los-estragos-de-la-reforma-fiscal-y-la-falta-de-financiamiento-esta-la-impresionante-caida-esperada-en-la-cosecha>

⁴² Morin (2020). Nicaragua: Coffee Annual, Nicaragua, p. 2.

Table 6. Coffee Exports by destination in pounds in harvesting season 2018/2019.

Partner Country	Pounds
United States	181.30 million
Belgium	27.4 million
Germany	26.49 million
Italy	13.28 million
Spain	11.72 million
Canada	11.52 million
Sweden	6.68 million
United Kingdom	6.40 million
France	6.28 million
Mexico	5.11 million
Others	45.14 million
Total	341.34 million

Source: Center for Exports and Imports of Nicaragua.

Available at: [apps.fas.usda.gov/newgainapi/api/Report/DownloadReportByFileName?fileName=Coffee%20Annual Managua Nicaragua 05-15-2020](https://apps.fas.usda.gov/newgainapi/api/Report/DownloadReportByFileName?fileName=Coffee%20Annual%20Managua%20Nicaragua%2005-15-2020)

In 2019, Nicaraguan sugar production reached a total of 772,727 metric tons, of which one-third of the output was for domestic consumption. The sugar exports in 2019 amounted 569,254 metric tons, wherein the U.S. received 102,039 metric tons while Taiwan is second largest importer of Nicaraguan sugar with a volume of 100,539 metric tons (see table 7).⁴³

Table 7. Sugar Exports by destination in metric tons in 2019.

Partner Country	Metric Tons
United States	102,039
Taiwan	100,539

⁴³ Nicaragua: Sugar Annual. Retrieved July 2020. <https://www.fas.usda.gov/data/nicaragua-sugar-annual-4>

Ghana	61,943
Canada	61,600
South Korea	33,000
New Zealand	30,250
Italy	25,861
Polonia	20,502
Puerto Rico	21,386
Others	112,134
Total	569,254

Source: Center for Exports and Imports of Nicaragua.

Available at: [apps.fas.usda.gov/newgainapi/api/Report/DownloadReportByFileName?fileName=Sugar%20Annual Managua Nicaragua 04-15-2020](https://apps.fas.usda.gov/newgainapi/api/Report/DownloadReportByFileName?fileName=Sugar%20Annual%20Managua%20Nicaragua%2004-15-2020)

From January to August 2019, the cocoa production in Nicaragua reached US\$58 million, a 48 percent increase from its previous year. The cocoa products of the nation ranked among the best in the world, and many international investors came to the country to invest in the production of cocoa. The Nicaraguan beef was also noticed since it was meat quality with low fat content, and is widely recognized by the international market, where large volume of exports to Taiwan has become one of the major imports of beef in the Taiwanese market. Beef export is the second largest agricultural export of Nicaragua, second only to coffee export.

Companies have the freedom to choose to where to set up their operations in Nicaragua. It may settle in the industrial parks under free zone areas or outside, where they are still able to enjoy the incentives of the free trade zone with the permission from the National Free Zone Commission (CNZF). There are several areas of free trade zone located in the capital city of Managua and its surroundings. The free zones are mainly found in its capital Managua, close to the airport and only a three hour drive away to reach the Pacific coast of Corinto. Other free zones are found in the larger cities like Chinandega and León, as well as in cities at the central

region, Matagalpa and Jinotega, and in the city southwest close to the lake, in Rivas.⁴⁴

In 2019, a preliminary data from the Central Bank of Nicaragua estimated the export value of the free trade zones was US\$2.612 billion, an increase of 3.41 percent over 2018. The main exports were textiles, with an overall exports amounting to US\$1.5 billion in 2018 (World Bank). The import value is US\$7.35 billion, and the main items are crude oil, consumer products, machinery and equipment, etc. Compared to the previous year, where exports was US\$4.92 billion and imports US\$7.70 billion, accounting for more than 40 percent of its GDP for both years, further proving that Nicaragua is highly dependent on exports.

In terms of foreign trade, the United States is largest trading partner of Nicaragua. In 2018, the U.S. was Nicaragua's main trading partner, in which Nicaraguan exports to U.S. reached 61.1 percent and U.S. imports to Nicaragua were 27.8 percent (World Bank). According to the annual report released by the Central Bank of Nicaragua in 2018, the total value of exports was US\$5.387 billion, including the US\$2.87 billion made from free zones. The total value of imports reached US\$6.629 billion, including US\$1.799 billion from free trade zones.⁴⁵

Moreover, the merchandise trade deficit of Nicaragua got to US\$2.31 billion in 2018, an improvement from of a significant reduction by 24.2 percent compared to the trade deficit of US\$3.05 billion in 2017. The BCN stated that the result was affected by lower demands for non-oil goods imports in Nicaragua, which dropped by 18.3 percent,⁴⁶ and rather focused on imports of consumer goods and capital goods, as well as the dynamism observed in export volumes, specifically in the second half of the year. The industry sector of Nicaragua is

⁴⁴ PRONicaragua (2019), Investor Guideline, p. 30.

http://pronicaragua.gob.ni/media/publications/Investor_Guideline_2019_D6yuVmj.pdf#page=50

⁴⁵ Annual Report 2018. Central Bank of Nicaragua

https://www.bcn.gob.ni/publicaciones/periodicidad/anual/informe_anual/Informe%20Anual%202018.pdf

⁴⁶ *ibid.*

underdeveloped and many materials depend on imports, so it is still a challenge to improve the trade deficit in the short term.

Furthermore, exports increased to about US\$53.8 million, a 2.5 percent compared to the previous year, which is driven by higher exports to the United States and Central America. In contrast, the exports to the European Union and Taiwan decreased by 7.0 and 25.4 percent. According to the statistics provided by the Bureau of Foreign Trade of Taiwan,⁴⁷ Nicaraguan exports to Taiwan reached a total of US\$115.87 million, while importing about US\$26.29 million. In 2019, Nicaraguan exports to Taiwan increased by 8.5 percent to US\$125.65 million – due to increased exports of sugar (US\$22.46 million; 99.2% increase), apparel and clothing (US\$1.18 million; 56.79%), and tobacco (US\$423.7 thousand; 443.8%); while imports faced a downtrend of US\$20.25 million.

Table 8. Top Five Nicaraguan Export Products to Taiwan and Total Exports (in US\$) corresponding to the first six months of 2019 versus 2020

Items	Year		Change ratio (%)
	2019/01 - 2019/06	2020/01 - 2020/06	
Fish and crustaceans, molluscs and other aquatic invertebrates	US\$ 27,107,007	US\$ 39,895,003	47.18 %
Sugars and sugar confectionery	US\$ 14,251,206	US\$ 14,174,716	-0.54 %
Meat and edible meat offal	US\$ 11,373,367	US\$ 12,514,693	10.04 %
Coffee, tea, mate and spices	US\$ 2,294,964	US\$ 3,281,515	42.99 %
Iron and steel	US\$ 4,218,709	US\$ 2,322,221	- 44.95 %
Total Exports	US\$ 62,136,501	US\$ 73,682,758	18.58 %

Source: Bureau of Foreign Trade. Available at: cus93.trade.gov.tw/FSCP020F/FSCP020F

⁴⁷ Bureau of Foreign Trade. Statistics. <https://cus93.trade.gov.tw/FSCP020F/FSCP020F>

The preliminary data in 2020, from January to June, however, indicated a positive trend in both exports and imports between Nicaragua and Taiwan (see table 8 and 9). For instance, in comparison to the data for the first six months, Nicaraguan exports to Taiwan reached a total of US\$73.68 million – an 18.58 percent increase in comparison to the US\$62.14 million in 2019. The increased exports of fishery products by 47.18 percent, meat by 10.04 percent, and coffee by 42.99 percent (see table 8) demonstrates the increased fishery and agricultural harvesting levels in Nicaragua. The exports data also reflects the increased demand of fisheries and meat products, such as the Nicaraguan beef, and the Nicaraguan coffee in the Taiwanese market, which further expands on the economic relationship between Nicaragua and Taiwan.

Table 9. Top Five Nicaraguan Import Products to Taiwan and Total Imports (in US\$) corresponding to the first six months of 2019 versus 2020

Items	Year		Change ratio (%)
	2019/01 - 2019/06	2020/01 - 2020/06	
Cereals	US\$ 778	US\$ 2,334,325	299,941.77 %
Man-made filaments; strip and the like of man-made textile materials	US\$ 2,855,287	US\$ 1,803,359	-36.84 %
Plastics and articles thereof	US\$ 965,620	US\$ 1,076,934	11.53 %
Knitted or crocheted fabrics	US\$ 270,252	US\$ 1,030,304	281.24 %
Nuclear reactors, boilers, machinery and mechanical appliances; parts thereof	US\$ 940,907	US\$ 807,421	-14.19 %
Total Imports	US\$ 9,173,813	US\$ 10,983,555	19.73 %

Source: Bureau of Foreign Trade. Available at: cus93.trade.gov.tw/FSCP020F/FSCP020F

On the other hand, Taiwanese imports to Nicaragua amounted to US\$10.98 million in the first six months of 2020 – a growth of 19.7 percent in comparison to the US\$9.17 million in

2019 (see table 9). There is an upsurge in the imports of cereal by 299,942 percent as seen in the table below, suggesting an early need of food in Nicaragua amid the continuous social unrest of 2018 and negative effects of the COVID-19 in 2020 that may have affected the food production levels to provide for the domestic food consumption. The increased imports of plastics by 11.5 percent and knitted or crocheted fabrics by 281.2 percent indicate the greater demand of materials needed for the manufacturing companies at the industrial parks in Nicaragua.

In order to assist Nicaragua in alleviating poverty, the United States Agency for International Development (USAID), the Inter-American Development Bank (IADB), and Europe, Japan, and other developed countries on average provided economic and technical assistance to Nicaragua every year, becoming one of the major sources of earnings in foreign exchange for Nicaragua. Most importantly, the United States provided Nicaragua textile duty-free export quotas via TPL to ease the democratic development within the nation. Most products of bilateral trade are exempted from reduced or lower income taxes and enjoy zero tariff treatment. The average annual growth rate of textiles exported to the U.S. estimated to 9.4 percent between 2007 and 2014. However, since the previous extension of TPL was not guaranteed and has expired by the end of 2014, it threatened several manufacturers of the textile and garment industry in the free trade zones of Nicaragua. It was stated by ANITEC director Dean García that the loss of the preferential treatment would cause at least 30 percent or 33,000 jobs currently employed in the sector.⁴⁸

Investment in outsourcing services is another proof of the increasing diversification of industries in the free trade zones of Nicaragua. According to the statistics of the official investment promotion agency of Nicaragua (PRONicaragua), the outsourcing sector in the

⁴⁸ ANITEC. "Nicaraguan Clothing Sector to Lose 33,000 Jobs If TPL Ends." *Fibre2Fashion*, June 2014, www.fibre2fashion.com/news/apparel-news/newsdetails.aspx?news_id=165019.

free zones attracted investment from the United States, Canada, Europe, and Latin American countries from 2008 to 2018 has amounted more than US\$97 million, establishing over 45 companies that employ more than 10,000 people.⁴⁹ The service export value exceeds US\$152.5 million, where 80 percent of the services are provided in English. On the whole, the textile and garment industry in the free trade zones of the country remains to be the main exporter, but the Nicaraguan government continues to actively strive for investment in key industries such as auto parts, footwear, disposable medical supplies, and outsourcing centers.

2.4. Foreign Direct Investment

Nicaragua has abundant labor and low wages, and is relatively safe in terms of crime among the Central American countries. The Nicaraguan government encourages foreign investment through the adoption of trade policies, such as the signing of free trade agreements to make use of regional alliances with major trading partners and neighboring countries under its market economy and to help businesses and manufacturing companies enter its market to gain competitive advantages.

From 2012 to 2016, during President Ortega's third term, the FDI that has flown into the country were investing more in free trade zones for exports in vehicle wiring, farmed shrimp, tobacco, carton and other industries, to make full use of the cheap labor and tax incentives. The Nicaraguan government adopted open and transparent legal procedures and non-discriminatory treatment laws and regulations to assist enterprises compete openly and fairly, break trade barriers, improve intellectual property rights regulations, gain access to

⁴⁹ PRONicaragua. "Invest in Outsourcing Services." *PRONicaragua Investments*, 2018, <http://pronicaragua.gob.ni/en/investment-opportunities/48-outsourcing-services/>

government procurement, and expand investment controls to engage in business exchanges in order to help the economic development of the country.

In recent years, the influx of FDI, according to the Economic Commission for Latin America and the Caribbean (ECLAL), in the Central American countries has experienced an upswing of 9.4 percent compared to previous year, attracting a total of US\$12.798 billion in FDI in 2018 (see table 10). Nicaragua, however, due to the socio-political and economic crisis in 2018, has affected businesses and prompted some foreign investments to withdraw from the country, where it managed to maintain US\$359 million. The country experienced a 53.5 percent contraction in influx of FDI compared to previous year, where it drew in US\$772 million. Most of these exchanges were made via the free trade zones in Nicaragua or tax exemptions granted by the CNZF to maintain and attract foreign investments.

Table 10. Central America: FDI inflows, by recipient country and region, 2012 - 2018 (in millions of US dollars and percentage variations)

Country	2012	2013	2014	2015	2016	2017	2018	Change ratio 2017-18 (%)
Costa Rica	2 696	3 205	3 242	2 956	2 620	2 856	2 764	-3.2
El Salvador	466	179	306	396	348	889	840	-5.5
Guatemala	1 245	1 295	1 389	1 221	1 185	1 170	1 032	-11.8
Honduras	1 059	1 060	1 417	1 204	1 139	1 186	1 226	3.4
Nicaragua	768	816	884	950	899	772	359	-53.5
Panama	2 980	3 943	4 459	5 058	5 585	4 826	6 578	36.3
Central America	9 213	10 498	11 697	11 784	11 776	11 698	12 798	9.4

Source: ECLAL.⁵⁰

⁵⁰ Foreign Direct Investment in Latin America and the Caribbean (2019). Retrieved June 2020.

In the past decade, the highest amount of FDI drawn into Nicaragua was in 2014 and 2015 that brought US\$884 million and US\$950 million, respectively (see table 10 above), averaging above 7.5 percent growth in FDI inflows. The strategy of attracting foreign investments under Ortega was to ensure that businesses and manufacturers could enjoy the reduced or lower income taxes and exemption of value added tax and tariffs in its free zones that were only available in Nicaragua when compared to its neighboring countries in Central America. However, the impact of 2018 social and political crisis rendered its competitive edge of attracting and sustaining foreign investments, effectively ranking Nicaragua to the least attractive investment location after El Salvador in Central America. The foreign investments that decided to keep investing in the country stayed because of the ongoing preferential treatment and protection of the income tax exemptions approved by the CNZF, so the advantages of staying in anticipation for the recovery of the economy in the upcoming years far exceed the benefits of an early withdrawal.

The Nicaraguan government maintained a competitive edge to attract foreign investment into its borders through the implementation of free trade zones. Most of the capitals were invested in the free zones where tax exemption for imports and exports were granted to the zone or outside the zone. The ratified Law No. 915 enabled the promotion of investments, exports, and facilitation of foreign trade through PRONicaragua as a decentralized entity declared by the National Assembly starting October 2015.⁵¹ The preferential treatment of the free trade zones may also be enjoyed by businesses and manufacturers, no matter within or outside the zones, as long as they qualify for and obtain the official authorization of the

http://repositorio.cepal.org/bitstream/handle/11362/44698/10/S1900447_en.pdf

⁵¹ Law No. 915. Published in La Gaceta, Official Gazette No. 196 of October 16, 2015. Retrieved in April 2020. [http://legislacion.asamblea.gob.ni/Normaweb.nsf/\(\\$All\)/7CF0656F37BB92CB06257EDC007D7FD2?OpenDocument](http://legislacion.asamblea.gob.ni/Normaweb.nsf/($All)/7CF0656F37BB92CB06257EDC007D7FD2?OpenDocument)

National Free Zone Commission (CNZF) to enjoy the income tax exemption on profits earned within the first 10 years with an additional option to extend for another 10 years at a reduced 60 percent income tax exemption,⁵² as per Law No. 917 approved subsequently.

Furthermore, the revised Decree No. 46-91 on the same month,⁵³ provided total tax exemption on payment for several imports, such as its mechanical equipment, materials, spare parts, samples, molds, and accessories, as well as raw materials and components, investment of required vehicles, supplies and packaging materials, and other related items that are not available in Nicaragua and required for the operation of businesses in the free zone areas. Not to mention, exemptions from capital tax and stamp duties, selective consumption tax, value-added tax, export taxes on locally made products, real estate transfer tax, local tax, and capital gains tax on the left behind immovable property when businesses close their operations in the free zones sectors.

Nicaragua relations with China

In addition to attracting foreign direct investment, Nicaragua actively promotes economic and trade relations large economies, such as China. In 2012 and 2013, enterprises and investors from China continued to visit and to investigate the investment environment and opportunities of the country, getting hold of a number of specific cooperation projects with the government. Among them, President Daniel Ortega approved the construction projects of two satellites and a canal to a Chinese satellite manufacturer and a Chinese businessman, respectively.

⁵² Law of Free Export Zones. Law No. 917, approved on October 8, 2015 Retrieved May 2020. <http://legislacion.asamblea.gob.ni/normaweb.nsf/b92aeea87dac762406257265005d21f7/3e290e9879e2c7ea06257edc007d7ff6>

⁵³ Law of Reform to Decree No. 46-91, “Industrial Free Zones For Exports”. October 8, 2015. <http://legislacion.asamblea.gob.ni/Diariodebate.nsf/76ed72912dd57e570625698c00773f5d/3f238d8827e2deb806257f08006f1b3e#>

The China Great Wall Industry Corporation (CGWIC), a subsidiary of the state-owned China Aerospace Science and Technology Corporation, signed a contract in October 2012 to build two satellites for telecommunication,⁵⁴ for a cost amounting to US\$345 million financed by the CGWIC via loans from Chinese commercial banks.⁵⁵ The telecommunication satellites, akin to the satellite project built by the same entity in Venezuela,⁵⁶ would provide modern and efficient access to telecommunications, high-speed Internet, distribution of health-related and education-related services and information, and other services in Nicaragua, especially in the remote areas. Nicaragua would become the first country in Central America to have satellites that may cover beyond its borders and be applied for data collection with the permission of its neighboring countries to collaborate and work on improving the overall development at a regional level. The potential roles of these satellites include strengthening local and regional development, assisting poverty reduction, improving disaster management and emergency responses by monitoring the environmental, rural and urban, and crop yield estimation data from space (Acevedo, 2010).

The Hong Kong Nicaragua Canal Development Investment Company (HKND Group), a subsidiary of the Xinwei Technology Group in China led by Wang Jing, the Chinese businessman, signed an agreement in June 2013 to build the Nicaragua Canal. The Nicaraguan government approved a bill that granted the HKND Group a total of 100-year franchise, 50 years to finance, manage, and construct the canal, plus another 50 years to operate it, threatening the expropriation of lands from the locals surrounding the proposed construction sites. The idea of the building a canal in Nicaragua can be traced back since the 1800s and

⁵⁴ Nicaraguan Nicasat-1 satellite already has an international license. Retrieved February 2020. <https://www.laprensa.com.ni/2017/11/02/nacionales/2324460-satelite-nicasat-1-ya-licencia-internacional>

⁵⁵ “Nicaragua Commissioned a Telecommunications Satellite from China for US\$346 Million.” *Latam Satelital*, 19 Nov. 2015. Retrieved in March 2020. latamsatelital.com/nicaragua-satelites-2017/

⁵⁶ “China and Venezuela: Agreement for New Earth Observation Satellite.” *UN Office for Outer Space Affairs*, Satnews Daily, 22 July 2014, Retrieved March 2020. www.un-spider.org/news-and-events/news/china-and-venezuela-agreement-new-earth-observation-satellite.

1900s when several initiatives, such as a railway or waterway that connect the Atlantic with the Pacific, have been suggested in Nicaragua. However, due to the Chinese stock market crash in 2015, Wang's initial wealth of US\$10.2 billion has dropped to US\$1.1 billion, and could not help finance the US\$50 billion Nicaragua Canal megaproject.⁵⁷ On June 14, 2019, six years after granting concession to the Chinese businessman to build the canal, in accordance with the clause 15.2 in Law 840 states that "given the impossibility of achieving the financial closure of the project within seventy-two months (six years), the Government or the corresponding sponsor will have the right to terminate the concession for such project".⁵⁸ In addition, according to multiple media sources,⁵⁹ the HKND Group has abandoned the project, which is reflected on its lack of publicity surrounding the topic when asked by Bloomberg and its unreachable website.

2.5. Inflation Rate

In response to the inflation rate, it was kept relatively high and unstable under Ortega administration. According to the IMF data, the inflation annual rate since he took office in 2007 rose from 11.1 percent to 19.8 percent in 2008 (see table 11) due to the economic challenges encountered after the natural disaster caused by a Category 5 hurricane. Following was the global financial crisis in 2009, where it managed to reduce it to 3.7 percent thanks to the implementation of fiscal discipline under the IMF supervision, but then increased to 5.5 percent in 2010.

⁵⁷ \$50bn Nicaragua canal postponed as Chinese tycoon's fortunes falter. November 27, 2015. Retrieved in March 2018. <https://www.theguardian.com/world/2015/nov/27/nicaragua-canal-postponed-chinese-tycoon>

⁵⁸ Canal law meets deadline to be repealed. June 14, 2019. Retrieved in February 2020. <https://www.elnuevodiario.com.ni/nacionales/494398-canal-interoceanico-nicaragua-ley-hknd/>

⁵⁹ Nicaragua's Chinese-Financed Canal Project Still in Limbo. August 20, 2019. Retrieved in February 2020. <https://thediplomat.com/2019/08/nicaraguas-chinese-financed-canal-project-still-in-limbo/>

In 2011 during his preparation for the next presidential election, inflation rate rose to 8.1 percent. The inflation rate would later reduce from 7.2 to 7.1 percent in 2012 and 2013, respectively, throughout his third term, and was kept under 6 percent for 2014 and 2015 (see table 11).

Table 11. Inflation rate and consumer price (annual change)

Year	Inflation rate (%)	Consumer Price ⁶⁰	
		Total Index	Change ratio %
2007 (second term)	11.1 %	106.1	16.9
2008	19.8 %	127.2	13.8
2009	3.7 %	131.9	0.9
2010	5.5 %	139.1	9.2
2011	8.1 %	150.3	8.0
2012 (third term)	7.2 %	161.1	6.6
2013	7.1 %	172.6	5.7
2014	6.0 %	183.0	6.5
2015	4.0 %	190.3	3.1
2016	3.5 %	197.0	3.1
2017 (fourth term)	3.9 %	204.6	5.7
2018	4.9 %	214.8	3.9
2019	5.4 %	226.3	6.13

Source: Inflation rate from IMF; Consumer Price from BCN.

Available at: <https://www.imf.org/external/datamapper/PCPIPCH@WEO/OEMDC/ADVEC/WEOORLD/NIC> ; <https://www.bcn.gov.ni/estadisticas/precios/IPC/2-1-06.htm>

⁶⁰ Base indices with reference to 2006 = 100 in accordance with the data from the BCN.

However, the inflation rates started rising a little from 3.5 percent to 3.9 percent in 2016 to 2017, a recurring trend every time President Ortega prepares for the presidential election. The inflation rates for 2018 and 2019 have risen to about 5 percent due to the massive protests across the nation against the Ortega regime that caused the withdrawal of many foreign investments, which are expected to rise amid the coronavirus pandemic in 2020.

According to the Central Bank of Nicaragua, the consumer price index rose from 214.8 in 2018 to 226.3 in 2019, corresponding to the inflation rate increasing by 5.4 percent. The consumer price index is one of the main indicators of measuring inflation. It measures the average change of prices paid for goods and services by consumers over time, representing that the higher it is the more consumers pay. In relations to the inflation rate, a more than 3 percent indicates rise in prices for goods and services, and more than 5 percent indicates a more serious inflation. When prices increase, the currency purchasing power decreases. When the CPI increases, prices of goods and services become higher, this is specifically reflected on the rising inflation. It is recommended to evaluate the investment options, and vice versa.

As of the end of 2019, the BCN calculated an increase of inflation rate to 6.13 percent,⁶¹ marking its highest inflation rate yet seen in five years. Nicaragua and its finance heavily depend on donations and foreign aid from developed countries. According to official estimates, Nicaragua received donations from developed countries of approximately US\$111 million in 2013, accounting for about 5 percent of the government's annual revenue. Therefore, if economic assistance from developing countries were reduced, it will most likely increase the risks of the government's medium-term fiscal plan, interrupting the efforts for the economic and social programs, such as the poverty and hunger reduction program in Nicaragua.

⁶¹ As of the late 2019, BCN estimated an increased inflation rate to 6.13%. Retrieved May 2020. <https://www.laprensa.com.ni/2020/01/21/economia/2631879-bcn-revela-que-nicaragua-finalizo-el-2019-con-un-a-inflacion-6-13-la-mas-alta-en-cinco-anos>

2.6. Economic challenges in Nicaragua

On April 18, 2018, the Nicaraguan socio-economic crisis broke out, and people took it out on the streets to protest against the social security reforms regarding the 5 percent reduction to pension benefits, the land expropriations for the Nicaragua Canal under Law 840, or the “Special Law for the Development of Nicaraguan Infrastructure and Transport in respect of the Canal, Free Trade Zones and Associated Infrastructures”, plus many other injustices under his administration. The economy of Nicaragua was seriously affected by the unprecedented amount of violence acted upon the government forces under Ortega against the mass political demonstrations against his regime that resulted into “300 dead, over 2,000 injured, and hundreds arbitrarily arrested and prosecuted,”⁶² mostly comprising of students and young people. The act is considered to be the deadliest domestic conflict to date since the nearly three decades of war that ended in 1990.⁶³ The overall economy turned from being the highest and most productive in respect to its annual GDP growth when compared to its neighboring countries to becoming the lowest in Central America. Among the three major international credit rating agencies in the world, Fitch Ratings and Standard & Poor's credit rating for Nicaragua has been downgraded from “B+” before the crisis, down two positions to “B-”, and the outlook has been downgraded from “stable” to “negative”.⁶⁴ Moody's rating downgraded Nicaragua from “B2” to “B3” in February 2020, but the outlook was upgraded from “negative” to “stable” with the rationale that the credit profile remain balanced amid the financial shock due to the social unrest in Nicaragua.

According to the Doing Business report published by the World Bank in October 2018,

⁶² World Report 2019: Rights Trends in Nicaragua. *Human Rights Watch*, 17 Jan. 2019, www.hrw.org/world-report/2019/country-chapters/nicaragua.

⁶³ As Nicaragua Death Toll Grows, Support for Ortega Slips. *The New York Times*. Retrieved on March 2020, www.nytimes.com/2018/05/04/world/americas/nicaragua-protests-ortega.html

⁶⁴ Nicaragua - Credit Rating. *Trading Economics*. Retrieved on May 2020, <https://tradingeconomics.com/nicaragua/rating>

Nicaragua ranked 132 out of 190 countries or regions in the world, ranking last in Central America. The ranking of various international economic evaluations about Nicaragua is generally negative, which is really unfavorable for the country to attract foreign investment with its open market. Enterprises and the public can only reduce expenditures in hope to overcome such difficulties, looking forward to political stability. However, hopes of recovery were soon worsened by the emergence of COVID-19 outbreak for Nicaragua in the year 2020, which not only affected the global economy, but also the health and well-being of the people. In response to the pandemic, the Nicaraguan government issued a pre-reduction of electricity bill by 3 percent starting since July 1, 2020. The financial banking industries in Nicaragua also have provided a six-month grace period for loans and will review the loan conditions according to each customer's need and situation. The post-pandemic economy awaits the joint efforts of global humanity to eliminate the spread of the virus and restore the economic growth as soon as possible.

Nicaragua is a unitary country divided into 15 provinces (departments) with two autonomous regions, and is further divided into cities. The political system is divided into four power branches: executive, legislative, judiciary and electoral, but in reality the central government has all political power. The president is elected by the citizens in a general election to serve for a five-year term. On November 6, 2016, the election of the president, vice president and members of Congress was held, and Ortega was elected president to serve for a third consecutive term in office until 2021 with the first lady Rosario Murillo, his wife, as the vice president. The ruling party is the left-wing Sandinista National Liberation Front (FSLN) under the current President Daniel Ortega. The total number of seats in the National Assembly is 92 seats, where FSLN has 70 seats, and the election of the ruling party FSLN accounted for more than 65 percent of the votes. The ruling party has control of power, one-party dominance, and has the advantage in the implementation of policies and the promotion and implementation of

bills. The political environment of Nicaragua is at high risk, there is little consensus between the government and the people, and there is a growing domestic and international opposition.

The United States passed a bill called the Nicaragua Investment Conditionality Act (NICA Act) in September 2016 to respond against the alleged election scheme committed by Ortega. The impact of the NICA Act prevented the Nicaraguan government from obtaining or using loans from international organizations, which may cause greater risk of social and economic instability. Major economies of the world have decided to impose sanctions on the key political figure in this crisis, following the number of sanctions to Nicaragua imposed by the Trump administration. The United States is the main trading and investment partner of Nicaragua. However, in April 2018, due to the social and economic crisis that occurred in the nation, the U.S. imposed sanctions on to the country through the NICA Act to pressure the end of Ortega regime by blocking its access to preferential loans from multilateral institutions such as the World Bank and the Inter-American Development Bank (IADB). This will cause the Nicaraguan government to handle the pressure of the increasing source of public debt, only able to request loans with high interest rates, amid facing economic recession. The economic growth rate of Nicaragua in 2017 reached 4.7 percent, and the BCN announced an economic recession of minus 3.8 percent in 2018, which is expected to worsen in the subsequent years.

The unresolved political and economic crisis in 2018 had dissipated due to the crackdown by National Police under Ortega and the effects of the COVID-19 pandemic breaching the Nicaraguan borders in 2020. Among the major issues in Nicaragua, foreign investment has been greatly reduced, as well as the number of bank deposits, foreign exchange deposits, and financial aid from international organizations, whereas the government is facing an increasing budget deficits, which further elevates liquidity pressures that will damage the macroeconomic and financial stability Nicaragua had garnered in the past two decades.

Overall, Nicaragua has not improved from its overreliance on foreign aid and trade deficits. The uncertainty of foreign aid and the insufficient budget to supply all year round have led to increased debt. The government has pledged to continue to improve social security, carry out tax reforms, and increase fiscal stability to reduce the impacts of the diminishing foreign aid. Nicaragua politics should strengthen infrastructure, improve labor technical standards, and severely punish corruption to improve internal and external relations. According to the Corruption Perceptions Index⁶⁵ from Transparency International, Nicaragua ranked 161 out of the 180 countries scored,⁶⁶ moving down nine places compared to the previous year, with a score of 22 out of 100 on the corruption scale (100 is very clean and 0 is highly corrupt). Only when the political and business environment improves in Nicaragua, can the government and the people benefit from the market economy, which will accelerate the development of the economy.

Furthermore, the economic assistance from Venezuela via ALBA were engaged in large-scale economic construction projects and state-owned enterprises, such as Albanisa⁶⁷ that was created in 2007 as a result of joining ALBA, which has allegedly funneled more than \$4 billion in Venezuelan petro-dollars to help fund the political campaigns and supporters of President Ortega.⁶⁸

⁶⁵ Not to be confused with Consumer Price Index (CPI).

⁶⁶ Corruption Perceptions Index. Nicaragua. Retrieved June 2020.
www.transparency.org/en/cpi/2019/results/nic#details

⁶⁷ Alba Petróleos de Nicaragua, S.A. (Albanisa) is a private company owned by the Venezuelan state oil company PDVSA (51%) and the Nicaraguan state oil company Petronic (49%).

⁶⁸ Aburto, Wilfredo Miranda, and David C. Adams. "Daniel Inc: How Nicaragua's Ortega Financed a Political Dynasty." *Univision*, 5 May 2018,
www.univision.com/univision-news/latin-america/daniel-inc-how-nicaraguas-ortega-financed-a-political-dynasty.

2.7. Impact of Nicaragua Canal Construction to the Economy of Nicaragua

In February 2012, President Ortega proposed to build the Nicaragua Canal, officially known as the Nicaragua Canal and Development Project, to promote national economic development. He believed that although the Panama Canal can meet the needs of cargo transportation between the Pacific and the Atlantic, it was necessary to develop a second and more economical canal in the Americas to cut costs and time of land and sea transportation for the shipment of industrial products from China and other Asian countries to Central and South America, as well as the shipment of raw materials from Latin American countries, such as Venezuela and Brazil.

In addition to the joint participation of Venezuela, Cuba, Ecuador, Bolivia and other allies in this project, the plan will also seek funding from Brazil and China, which has attracted the attention of domestic and international businesses. The canal is expected to cross Lake Nicaragua from the Brito harbor on the Pacific side to the Punta Gordo River on the eastern Caribbean coast. It is planned to be about 278 kilometers long, 27.6 meters deep, and 230 to 520 meters wide, and would be three times longer than the Panama Canal. The Ortega administration calculated that the construction of the canal was expected to create about 50,000 jobs for the initial five years of its construction and an additional of 200,000 job opportunities when the canal is operational.⁶⁹

The project was approved on June 13, 2013 via Law 840 that enforced the previously created institution of the Interoceanic Grand Canal Authority of Nicaragua in 2012 to be part of the Commission for the Nicaragua Canal Development Project and supervise the planning,

⁶⁹ Silva (2019). After Six Years, Wang Jing Could Not Guarantee Investment for the Interoceanic Canal. *La Prensa*, June 13, 2019, laprensa.com.ni/2019/06/13/nacionales/2559459-tras-cinco-anos-wang-jing-no-pudo-garantizar-inversion-para-el-canal-interoceanico.

construction, and future operation of the canal.⁷⁰ President Ortega and Wang Jing signed the Framework Agreement of Concession and related documents of a total of 120 pages on the following day. In the following year, in July 2014, the HKND Group and the Nicaraguan government announced the definitive route of the canal, which was expected to be completed by the end of 2019 with a total construction cost of about US\$50 billion financed by the HKND Group.

However, the Nicaraguan citizens did not have much trust in the government's decision to grant concession to a Chinese company. In addition, the proposed canal route passes through the largest freshwater lake in Nicaragua, which is opposed by environmentalists, fearing that its construction would pollute Lake Nicaragua and damage the natural ecology along the route. The Nicaraguan government wanted to use its geographical advantage to obtain political and economic benefits, as well as expanding its influence and capacity to attract foreign investments in Central America, so that it could uplift the Nicaraguan people out of poverty. The efforts President Ortega showed when pushing for the realization of the canal construction demonstrated his commitment to reverse the economic circumstances Nicaragua was caught in and to achieve the long awaited dream of building a waterway canal that has started since the 1800s.

The following chronological events will try to explain the Nicaragua Canal in more detail:

Back in 2013 when the deal was made, the initiative seems to be very positive, and was a great opportunity to lift the country from poverty, generating hundred thousands of jobs upon its completion. However, it has made little to no progress since the inauguration of the

⁷⁰ Official Law 840. Approved on June 13, 2013. Available at: legislacion.asamblea.gob.ni/Normaweb.nsf/b92aaea87dac762406257265005d21f7/914d10ad15d09a2f06257b9e004c82e8?OpenDocument

construction in late December 2014, largely due to Wang's lack of construction experience, and the decline of his personal wealth due to the collapse of Xinwei shares when the Chinese stock market crashed in mid-2015 that continued to early 2016. There were some rumors that the Chinese government was supporting this project, but the government denied having any affairs to do with it because if they do, the U.S. government might intervene, and that was the last thing anyone one of them desired. Especially under the situation where President Daniel Ortega just won the reelection in 2012, and is preparing to run for the next presidential election in 2016 along with his wife as the vice president.

On November 7, 2016, Wang Jing sent a message congratulating President Ortega and his wife on their victory of the general election and pledged to fulfill the construction of the canal. However, due to the expansion of the Panama Canal in mid-2016 that enabled transit of ships with an overall length of 366 meters, width of 49 meters, depth of 15.2 meters, and capacity of 13,200 TEUs to go through its third set of locks, the prospects of building a Nicaragua Canal was worrisome. The local newspapers and media sent reporters in late December and early 2017 to check on the progress of the construction sites and only to find out empty dirt roads, describing the area where large ships would go through as a quiet road where cows and horses can be seen instead.⁷¹ In April 2017, the Chinese technicians and employees at the HKND Group office in Nicaragua abandoned their posts and left the country, and no news regarding the topic was heard from the Chinese company. The company went as far as shutting down its home office in China and taking down its official website from the Internet in 2018, leaving no address or telephone number for anyone in Nicaragua or potential investors to contact them at.

⁷¹ Silva (2019). After Six Years, Wang Jing Could Not Guarantee Investment for the Interoceanic Canal. *La Prensa*, June 13, 2019, laprensa.com.ni/2019/06/13/nacionales/2559459-tras-cinco-anos-wang-jing-no-pudo-garantizar-inversion-para-el-canal-interoceanico.

In 2019, leading environmental lawyer concerning the canal, Mónica López, notified the local daily newspaper *La Prensa* that in the Framework Agreement of Concession signed between President Ortega and Wang Jing contained a clause that stated if the concessionaire did not obtain financing to develop the project within six years since the signing of the agreement, the Government of Nicaragua was compelled to withdraw the concession.⁷² The Nicaraguan Peasant Movement led by Medardo Mairena celebrated on June 13, 2019 that the Nicaraguan government will have to cancel the concession terms to the Chinese firm, and said that they would continue to demand the repeal of Law 840 because of it “orders the expropriation of the land”.⁷³

However, on August 13, 2019, President Daniel Ortega announced that new projects of environmental studies for the interoceanic canal would continue and make necessary adjustments. He also shared his views on the failures of past canal construction attempts, stating “the powers, from England to Spain [...] want to dominate the route to make the canal, and then the United States with its troops intervening in Nicaragua ... imposing a treaty⁷⁴ on Nicaragua so that Nicaragua could not make any concession to any country. It was when the United States said, as it means now, ‘America for the United States’, why? Because they had no competition in Europe”.⁷⁵

It became clear from the interview the author had about the Nicaragua Canal (see

⁷² *ibid.*

⁷³ Arias, Alma Vidaurre, et al. “Canal Law Meets Deadline to Be Repealed.” *El Nuevo Diario*, 14 June 2019, elnuevodiario.com.ni/nacionales/494398-canal-interoceanico-nicaragua-ley-hknd/.

⁷⁴ The Bryan-Chamorro Treaty signed in 1914 by William Jennings Bryan, U. S. Secretary of State under the Wilson administration that frequently intervened in Latin American affairs, and Emiliano Chamorro from the politically powerful Chamorro family which represented the Nicaraguan government, which granted the U.S. the rights in perpetuity to construct a canal across Nicaragua with a renewable option of 99 years to establish and operate a naval base in the Gulf of Fonseca, located on the Pacific coast by the borders of El Salvador, Honduras, and Nicaragua, plus another renewable option of 99 years for the lease of the Corn Islands, located on the east of the Caribbean coast, with the purposes of protecting the proposed canal when completed and operational.

⁷⁵ Daniel Ortega: “We have not given up” on the great interoceanic canal. August 13, 2019. Retrieved Feb 2020. <https://www.elnuevodiario.com.ni/nacionales/498858-daniel-ortega-canal-interoceanico-nicaragua/>

appendix B) that if completed and operational, it can compete with the Panama Canal since it is able to permit larger ship containers, up to 25,000TEU with future option to expand to admit an additional 6,000TEU. Most importantly, they mentioned that the calculations and studies indicated that the canal should help reduce the overall poverty rate by 11.2 percent and the extreme poverty by about half, guaranteeing several hundred thousands of job opportunities in the free trade zones, tourist centers, and the operation of the canal.

In addition, PRONicaragua organized a comparative analysis of the cost and time of marine transportation between the Central America countries and the major ports of the United States. The days spent traveling from port Corinto in the Pacific side of Nicaragua to the port of Los Angeles takes about 11 days, which is 3 days quicker compared to Panama. Most importantly, exporting from El Bluff port located in the Atlantic side of the bay in Bluefields would reach the port in Miami in just 3 days, which is 6 days faster compared to Panama (see table 12).

The price, however, is more expensive in Nicaragua compared to Panama due to its less developed ports that are unable to handle the docking of large container ships, provide transportation for its large supply volumes, as well as not being able to enjoy the benefits of granting subsidies to the transportation costs since the canal is not built yet. As of 2018, the average cost for both sides of the oceans would average above US\$830 in comparison to Panama. It is already at a competitive price when considering the low cost of services in Nicaragua, such as the renting of houses, apartments, and condominiums, and telecommunication services, as well as reasonable cost of water services and energy (PRONicaragua, 2019).

Table 12. Transportation cost and time between Central American countries to U.S. ports.

Countries	Los Angeles, CA		Miami, FL	
	Cost US\$	Days	Cost US\$	Days
Costa Rica	1,890	20	2,393	12
El Salvador	2,685	9	1,860	3
Guatemala	2,185	8	1,715	3
Honduras	3,345	9	2,095	3
Nicaragua	2,675	11	2,215	3
Panama	1,670	14	1,560	9

Source: Sealand, 2018. Available at: pronicaragua.gob.ni/media/publications/Investor_Guide_line_2019_D6yuVmj.pdf

2.8. Summary and Discussion of Chapter 2

An economic overview and examination of the economic indicators, such as the GDP, income per capita, foreign trade, FDI, inflation rates, and so on are given to identify the economic trends Nicaragua has experienced. The main reasons President Ortega maintained the market economy since 2007 was to attract capital inflows via foreign direct investments, creating domestic job opportunities with businesses brought by foreign investors, and receive economic assistance from the IMF and the international community, such as debt relief and loans, to help reduce poverty by financing social programs and infrastructure that would improve the living circumstances of the rural people, for instance, improve their access to credit to buy fertilizer, equipment, and other productive-oriented factors to increase agricultural output levels for exports. However, the economic development was hindered by the sociopolitical crisis in 2018 that spooked the inflows of FDI, causing a number of foreign investors to withdraw from the nation, as well as the implementation of tax reforms, wage adjustments, the continuous unstable inflation rates, the pursuit of ambitious projects by

expropriating lands from the poor, such as the Nicaragua Canal, and the market vulnerabilities caused by the changes in international prices of exported goods, such as coffee.

The following is a synopsis of the chapter regarding the production structure and labor forces that are completely preserved in Nicaragua, and, thus, the author has identified the following advantages in Nicaragua:

1. The abundance of labor: 76 percent of the population is under 40 years old, and the labor force is about 3.2 million.
2. Low wages: although the government has raised the wages of workers, it is cheaper than the wages of workers in neighboring and developing countries.
3. The government developed free trade zones that provide tax incentives for businesses that are located in the industrial parks of the free trade zones as well as some located outside of the zones. Manufacturers may obtain permission from the National Free Zone Commission (CNZF) to enjoy full exemption of income tax from profits for the first 10 years, and can extend period once with its consent, an exemption of 60 percent income tax for the 11th to 20th years period.
4. Exemption of tax reduces the costs of machinery and equipment, parts and accessories, samples, molds, investment vehicles and supplies that are imported through the free trade zones, which also are exempted from customs duties and other taxes.

From these optimistic interpretations, as long as capitals are reinvested in Nicaragua, they will help the economy recover and boost economic development. For instance, in accordance to the preliminary data provided by the Bureau of Foreign Trade in Taiwan, Nicaragua has imported higher amount of cereals in the first six months of 2020 to feed its people in order to cover for its food security and maintain a healthy and productive labor force. In addition, the

increased amount of imported materials, such as plastics and fabrics, reflect the demand of resources the manufacturing companies need to produce goods that will later be exported.

As for the NICA Act imposed by the U.S. and in face of the economic recession, Ovidio Reyes, President of the Central Bank of Nicaragua, said that the economy of Nicaragua has gradually recovered from the recession in the beginning of 2020 (Alvarez, 2020). Total deposits in 2019 increased by 3.8 percent, lending rates fell to 9.86 percent, currency and finance stabilized, foreign exchange deposits were about US\$2.397 billion, and the price inflation rate was 6.13 percent. Although the overall economy was still declining by 4.5 percent due to the weakening of the international economy, the government continued to invest in infrastructure and peacefully resolve the economic and socio-political crisis. It is expected that the new coronavirus epidemic will end in 2020 and the economy will become better.

As for the Nicaragua Canal, a reason why China has abandoned its attempts to construct a canal in Nicaragua is to avoid competing with its Panamanian counterpart in Central America.⁷⁶ In 2017, Panama cut ties with Taiwan in favor of establishing economic relations with China with the purpose to collaborate with its appealing global trade ambitions under the One Belt One Road infrastructure development initiative that would connect the major economies of the world. Should the canal be built successfully, however, the harbors and ports would attract plentiful of foreign investors and businesses from around the world, but it must be constructed without damaging the natural and beautiful yet fragile ecosystems, as well as the Lake Nicaragua, which could risk one of the main sources of water supply for agriculture⁷⁷ and its people nationwide.

⁷⁶ Cropsey, Seth. China Sets Its Sights on South America. April 9, 2018. Retrieved in March 2020. <https://www.the-american-interest.com/2018/04/09/china-sets-sights-south-america/>

⁷⁷ Lake Nicaragua provides water for 26 percent of bean crop, 21 percent of the sorghum crop and 16 percent of corn and sugar production in Nicaragua, according to the UNICEF and WHO reports. Available at: <https://cronkite.asu.edu/buffett/nicaragua/will-nicaraguas-interoceanic-canal-project-ruin-its-sweet-sea/>

In regards to corruption in Nicaragua, President Ortega has made a few alternations to the Political Constitution of Nicaragua over the years with the help of the Supreme Court to better serve him and his compatriots. In late 2009, the pro-Sandinista Supreme Court lifted the constitutional term limits to enable presidents to run for consecutive terms.⁷⁸ For instance, under Article 147, one of the clauses stated that “family members within the fourth level of consanguinity or the second level of marital relations of the candidates for President and Vice President of the Republic” may not run for president or vice president,⁷⁹ to which his wife, Rosario Murillo, has become the Vice President of Nicaragua alongside President Ortega since 2016, which violated the law if not repealed. In addition, in Article 171, clause number three stated that to be qualified as a magistrate of the Supreme Electoral Council, the individual must be “at least thirty years of age but no older than seventy-five years on the day of election,” and also not be “family members within the fourth level of consanguinity or the second level of marital relations of the candidates” for president and vice president of the state,⁸⁰ to which was also repealed and allowed the council to be backed with loyal supporters, friends and relatives of Ortega and Murillo, tightening their control over the judicial power, to better serve them on the process of approving decisions and win on the day of the elections.

⁷⁸ Nicaragua court backs re-election. BBC News. October 20, 2009. <http://news.bbc.co.uk/2/hi/8316167.stm>

⁷⁹ Title VIII, Chapter III - Executive Power. Article 147. Accessed in July 2020. Available at: <https://nicaragua.justia.com/nacionales/constitucion-politica-de-nicaragua/titulo-viii/capitulo-iii/#articulo-147>

⁸⁰ Title VIII, Chapter VI - Electoral Power. Article 171. Accessed in July 2020. Available at: <https://nicaragua.justia.com/nacionales/constitucion-politica-de-nicaragua/titulo-viii/capitulo-vi/#articulo-171>

Chapter 3 – Trade Policy and Trade Agreements

The political inclinations of President Ortega have changed since his first run back in the 1980s, where his policies were socialist and benefitted toward the revolutionaries of his political party that helped end the Somoza dictatorship in 1979 and participated in the war against the Contras thereafter that lasted to 1990 that eventually forced the Sandinista party out of power. After winning the presidential election to serve from 2007, he started to pursue more moderated political policies, seeking for trade agreements that were consistent with the free market reforms, opening the market of its nation to the international arena. In this chapter, the author will analyze the trade agreements the Ortega administration engaged in, as well as the impacts of opening its market to the world.

3.1 Trade Agreements

To promote trade liberalization, Nicaragua and many countries have signed free trade agreements. As members of the Central American Common Market (CACM), they have signed free trade agreements with the European Union, the United States, Mexico, Dominica, Chile, Panama, South Korea, and the Republic of China (Taiwan), and preferential trade agreements with Japan, Canada, Russia and Norway.⁸¹ And actively negotiate with other countries to strengthen bilateral investment relations and enjoy rich regional trade agreement benefits where manufacturers can relocated to Nicaragua as a production base and benefit from the multiple free trade agreements within the zone to make profits amid the tax-free markets in relations to Europe and the United States.

⁸¹ Foreign Trade Information System. Retrieved March 2020, http://www.sice.oas.org/agreements_e.asp

It is also possible to enjoy the preferential tariff treatment for exports through the Generalized System of Preferences (GSP) schemes of the WTO member countries that grant GSP treatment, and benefit from the regional free trade agreements, all of which are to promote the economic development of Nicaragua. As of 2020, Nicaragua is a beneficiary of multiple GSP-granting countries, which includes Belarus, EU, Japan, New Zealand, Norway, Russia, Switzerland, and Turkey,⁸² as well as Canada that reviewed and modified the treatment's name under the General Preferential Tariff system⁸³ since Nicaragua is considered to be one of the least developed countries in Central America. The Nicaraguan government must accelerate its pace to actively join and strengthen its domestic industrial competitiveness and attract foreign investment. The government provided preferential conditions to attract more competitors, encouraged international cooperation, provided open cooperation, and emphasized industrial liberalization, which are catalysts for boosting economic growth. At the same time, it would increase labor rights, the protection of personal intellectual property rights, and provide special regulations on investment, services, and telecommunications, as well as the inclusion of the global environmental protection.

Under the trend of globalization, multilateral economic systems, such as the WTO, are facing restricted access since regional economic integration has gradually become the mainstream. Free Trade Agreement (FTA) and Economic Cooperation Agreement (ECA) in the global trading system continued to gain increasing traction and importance. The participant member countries open their markets to each other and cancel or reduce most of the import and export trade restrictions, including tariff barriers, and give the contracting parties preferential market access in accordance with the signed agreements. In addition, the member countries of WTO are still able to retain their own external benefits of reduced trade barriers and improved

⁸² Retrieved June 2020, http://sice.oas.org/TPD/GSP/GSP_Schemes_e.ASP

⁸³ Retrieved June 2020, <https://unctad.org/en/pages/PublicationWebflyer.aspx?publicationid=673>

trade policies, therefore, favoring the creation of regional agreements rather than the negotiations of a global consensus discussed in the Doha Round or a continental consensus as seen through the failed proposal of the Free Trade Area of the Americas (FTAA) agreement.

Joining regional integration may remove barriers, expand trade and increase investment and employment, interconnect regional industries, enhance industry competitiveness, and promote economic growth. At the same time, it also brings great benefits – strengthen the competitive advantages of domestic products in the international market; participate in regional economic integration and integrate with the world to enhance its international status; promote deep cultivation of industries in the country and attract foreign direct investment to create job opportunities.

The following are brief descriptions of certain agreements that Nicaragua enjoys:

US-Central America and Dominican Republic Free Trade Agreement (CAFTA-DR)

US-Central America and Dominican Republic Free Trade Agreement (CAFTA-DR), signed by the United States and Costa Rica, El Salvador, Guatemala, Honduras, Nicaragua, and the Dominican Republic, was approved by the US Congress in July 2005 and formally signed into legislation on August 2, 2005, entered into force on April 1, 2006 in Nicaragua. Europe and the United States are the largest consumer markets in the world. Its products sold to the United States can quickly respond to demand of the market and reduce transportation costs. There are tariff-free or preferential tariff exemptions, which can improve the competitive advantage of investing in the local production of Nicaragua.

In addition to the quota restrictions on a few sensitive agricultural products, the Central American countries enjoy the preferential treatment of zero tariffs or annual tax cuts to the

United States for 100 percent of the industrial products, 85 percent of the agricultural products, and many other products. Among the many others, for instance, was the preferential treatment of textile and apparel products in form of a Tariff Preference Level (TPL) system as part of the CAFTA-DR that could be traced back since January 1, 2004, which was very beneficial to the investment of Taiwan and South Korea in the textile industries in Nicaragua. The TPL treatment in Nicaragua was a 10-year preferential blessing of duty-free export quota system on textiles made and assembled at its free trade zone areas, and under the competitive advantage of eliminating tariffs to cover for the production costs, it created many domestic jobs opportunities and promoted economic development while it lasted until 2014. No further TPL treatment was granted since the U.S. Secretary of Commerce of the Obama administration deemed that the textiles industry in Nicaragua “can compete globally and maintain its position in the market”.⁸⁴

Bolivarian Alliance for the Peoples of Our America (ALBA)

Nicaragua is a member of the Bolivarian Alliance for the Peoples of Our America (ALBA), which was proposed by Venezuelan President Hugo Chavez in 2001 and was established in Cuba in 2004 to promote the economic development of the member states of the alliance through investment and trade cooperation. Nicaragua joined ALBA since the inauguration of President Daniel Ortega in January 2007 with the intention to leverage the balance of power of the U.S. in Latin America. In order to resist the establishment of the Free Trade Area of the Americas (FTAA) advocated by the United States, the multilateral organization was formed with the purpose of strengthening regional political, economic, and social cooperation to eliminate poverty and social injustice, as well as creating a regional integration in Latin America. Ortega publicly maintained relationship with the U.S. and

⁸⁴ Nicaraguan Textile Companies Do Not Need TPL. December 2, 2014. Retrieved in October 2019. https://www.centralamericadata.com/en/article/home/Nicaraguan_Textile_Companies_Do_Not_Need_TPL

worked within the conditions of market-based democracy to attract foreign investors and gain their confidence. But on the other hand, he declared his stance against the privatization of natural resources and the “tyranny” of global capitalism caused by Western forces. President Ortega gave a public speech about his understandings of the market economy and views on reasons to work with ALBA in his inauguration address on January 10, 2007 at the Plaza del Malecón in Managua alongside President Hugo Chávez of Venezuela and President Evo Morales of Bolivia, which are highlighted in the following:

“[...] We are going to join ALBA ... that unity of the people is the only thing that can lift all of Latin America out of poverty, because we can all unite here in Central America; but we have to trade with other countries and if fair trade is not established, then one day a country, a sector will be fine; another day it will be bad and it will go bankrupt. [...] There is the treaty with the United States, CAFTA, which was approved a few months ago and we were saying, quite clearly, that this treaty did not contemplate, did not consider, what is the condition of a country like the United States, which has great and enormous resources and that subsidizes its economy, with the economies of our countries and, therefore, it was necessary to know how to negotiate. But, at the end, the treaty was signed which brings benefits to some sectors but does not bring benefits to others. [...] We will continue to fight for conditions to improve, but we have our own proposal, our own approach to Latin American unity, which is ALBA!”⁸⁵

The assistance of Venezuela to Nicaragua was as high as US\$500 million per year from 2010 to 2014, and under the Petrocaribe Arrangement, where member states should help refine its oil and carry out joint energy infrastructure projects to enjoy subsidies from purchasing

⁸⁵ Full transcript of speech available in Spanish at: <http://www.radiolaprimerisima.com/noticias/general/8492/discursos-de-hugo-chavez-evo-morales-y-daniel-ortega-en-la-plaza-del-malecon-el-10-de-enero/>

Venezuelan oil. In the case of Nicaragua, Venezuela provided 100,000 barrels of crude oil in exchange for Nicaraguan beef and dairy products every month, but after the death of the Venezuelan President Chavez in March 2013, the content of the mutual assistance has changed and donations of barrels has stopped since 2015 due to the Venezuelan economy experiencing a recession, and, thus, foreign exchange was cut short. In 2018, Nicaragua only received US\$20.98 million, a steep decline by 82.04 percent compared to 2017.

In regard to the combat capitalism and privatization of natural resources, Ortega not only joined ranks with Venezuela but also formed a bilateral economic relationship with Iran, one of the observer members of ALBA. The trade deal with Iran, known for its development of nuclear technology, was set out to improve the infrastructure in the agricultural and energy sectors in exchange for the agricultural products of Nicaragua. Ortega hoped to build a state-owned hydroelectric power station to help decrease the amounts of blackouts happening almost daily in 2007 and 2008 with the help of Iran. The Iranian government pledged a sum of around \$500 million in aid to construct the power station as well as a deepwater port at Monkey Point to facilitate shipping of goods directly from the Atlantic side.⁸⁶ In addition, the funds would be provided to projects such as a farm equipment assembly factory, 4,000 tractors, five milk-processing plants, a health clinic, and 10,000 houses.⁸⁷ To gain the support of the masses, Ortega demonstrated local farmers a number of tractors – more than 100 tractors⁸⁸ – delivered by Chavez through ALBA arrangements in 2008, which were produced by a factory built by Iran in Venezuela,⁸⁹ the same project that Iran pledged to

⁸⁶ Iran to Finance Deepwater Port in Nicaragua. September 26, 2007. Retrieved in March 2018. <https://www.nuwireinvestor.com/iran-to-finance-deepwater-port-in-nicaragua/>

⁸⁷ Nicaragua defies US with Iran trade deal. August, 6, 2007. Retrieved in March 2018. <https://www.theguardian.com/world/2007/aug/06/usa.iran>

⁸⁸ First tractors donated under ALBA. <https://ticotimes.net/2008/04/25/first-iranian-tractors-donated-under-alba>

⁸⁹ Iran to fund Nicaraguan projects. August 5, 2007. <https://al-jazeera.tistory.com/m/238?category=125027>

build in Nicaragua.⁹⁰ However, many of these projects have yet to be accomplished or attract enough foreign investments to push for its development.

Despite holding the delicate relationship with the U.S. under CAFTA-DR, the investment climate under Ortega administration became relatively uncertain. The reason Ortega was seeking for more immediate investment opportunities with U.S. oppositions, such as Venezuela and Iran, into its infrastructure was due to the U.S. lack of commitment to develop similar local projects. For instance, a port at Puerto Cabezas that was managed by a U.S. company DELASA but was then suspended in 2002 due to the rising concerns about the unresolved illegality issue of the harbor lease suspected by the regional government and the citizens,⁹¹ which resulted into revolts that reminded the people about memories of the revolution.⁹² Moreover, as stated in the records of the U.S. bilateral relations with Nicaragua, there were more than 125 firms operating there with certain relation to the U.S., which are involved in energy, financial services, textiles and clothing, manufacturing, and fisheries.⁹³ Therefore, the Nicaraguan and the U.S. government had to maintain trading relationship to achieve the shared long-term prospects for economic development. Even so, the FDI inflows in 2008 were increased to a 7.38 percent (World Bank), amounting to about \$506 million where a total of \$243 million were used to finance the telecommunications infrastructure and the energy sector.⁹⁴

In short, the decisions made under Ortega administration were fickle, pulling interests from opposite ends of the spectrum. Ortega was managing a set of economic policies and

⁹⁰ Command and General Staff School (2009). *The Professional Journal of the U.S. Army*, p. 81.

⁹¹ USA International Business Publications (2012). *Nicaragua Business Law Handbook*, page 40.

⁹² Jewiss (2002). The Effects of Globalisation on Indigenous Communities in Latin America: Case Studies from Nicaragua, www.austlii.edu.au/au/journals/IndigLawB/2002/11.html

⁹³ Bureau of Western Hemisphere Affairs. "Nicaragua." *U.S. Department of State*. 16 Dec. 2016, 2009-2017.state.gov/r/pa/ei/bgn/1850.htm.

⁹⁴ "Nicaragua (07/09)." *U.S. Department of State*, 2009-2017.state.gov/outofdate/bgn/nicaragua/126431.htm

decisions made that would satisfy and garner the U.S support in economic assistance on one end, while combating the influence of U.S. “neoliberal” capitalism on the other end by joining forces with his allied socialist nations, such as Cuba, Venezuela, and Iran. However, despite the uncertain atmosphere, the FDI inflows resulted into an average growth of 7.01 percent (see figure 1) for his second term – even managing to attract 5.23 percent of FDI amid the global financial crisis in 2009. The market openness Ortega preserved under IMF supervision, plus the talks of improving property rights and strengthening the judicial system created an investment friendly environment for foreign businesses looking to invest in low production cost areas.

The Single Free Trade Agreement – Mexico (Single FTA)

Nicaragua and the five Central American countries signed the Single Free Trade Agreement (Single FTA) with Mexico on November 22, 2011 and went into effect on September 1, 2012, officially replacing the original bilateral free trade agreement between Nicaragua and Mexico that was in force since 1998. According to the content of the agreement, in addition to 98 percent of the products of member countries can be exempted from customs duties within the territory, can enjoy the preferential tariff treatment based on the origin of product with appropriate certificates and declarations of origin. Since the Mexico-Nicaragua bilateral FTA came into effect in 1998, the trade between the two countries has grown from US\$100 million to US\$553 million in 2011; among them, the value of Nicaraguan exports to Mexico has increased by threefold; the amount of imports from Mexico has increased by five.

Peanuts, seafood, sugar, beef, and other agricultural and animal husbandry products benefitted from the FTA and heightened the export to Mexico. In view of the 2012 Nicaraguan exports to Mexico amounting to US\$72.57 million, a 20 percent decline from 2011, prompting

all sectors of the Nicaragua eager to attract a large number of Mexican companies to invest them through the renewed agreement, and further deepen the bilateral economic trade and investment cooperation between Nicaragua and Mexico.

European Union - Central American Association Agreement (EU-CAAA)

Nicaragua entered into force on August 1, 2013 along with Honduras and Panama for the trade part of the Association Agreement signed in 2012 to enjoy tariff concessions with the EU, cutting of import tariffs on both sides.⁹⁵ The agreement covers the three main pillars to support economic growth, specifically trade, development of cooperation, and political dialogue. The economic trade part will be implemented first, and cooperation in security, democracy, society, education, and various aspects of economic development will soon be followed. The EU has opened a zero-tax rate for 91 percent of products imported from Central America, of which 99.2 percent are industrial products manufactured in Central America imported into the EU.

Nicaragua-Taiwan Free Trade Agreement

Taiwan and countries in Central America have successively signed free trade agreements. The free trade agreement between Taiwan and Nicaragua came into effect in January 2008. The Economic Complementation Agreement signed between Central American countries, Costa Rica, El Salvador, Guatemala, Honduras, and Nicaragua to establish the Central America Trade Office (CATO), was established as early as September 1997 based on the official guidelines “Enhancing Economic and Trade Ties with Diplomatic Allies in Central America” of the Taiwan foreign policy. In accordance with the policy, the establishment a stronger partnership with countries in Central America must be endorsed through the embassies

⁹⁵ European Union Trade Agreement with Honduras, Nicaragua and Panama entered into force. Retrieved June 2020. http://www.sice.oas.org/TPD/CACM_EU/Entry_into_force/IP-13-758_EN_e.pdf

stationed in the respective diplomatic countries (currently including Belize, El Salvador, Guatemala, Honduras, Nicaragua, and Dominican Republic) to facilitate the promotion of various businesses that promote bilateral relations with Taiwan, business cooperation, investment development, tourism and other related businesses are implemented through individual country and regional promotion projects.

After the Taiwan FTA entered into force in January 2008, the Nicaraguan manufacturers can evaluate and expand to the Taiwanese market, and in return, the Taiwanese manufacturers can also evaluate local business opportunities and tariff conditions, and export advantageous products to the Nicaraguan market. With the assistance of the Embassy of Taiwan in Nicaragua, the Taiwanese government and the Ficohsa Bank, the fifth largest bank in Nicaragua, set up together a line of credit fund of \$2 million to facilitate and promote the trade between the countries, with special interest rates for the Nicaraguan people,⁹⁶ like the preceding signing of arrangements with the Banpro Bank and the Lafise Bank in Nicaragua. In the future, Nicaraguan manufacturers import products to Taiwanese manufacturers or to third parties can register for the low-interest loans, which will help Taiwanese businessmen expand their businesses in Nicaragua, thus increasing the amount of foreign investment into Nicaragua. From January to May 2020, the total exports of Taiwan to Nicaragua reached US\$9.84 million, an increase of 28.3 percent over the same period in 2019, and bilateral trade reached a sum of US\$73.05 million, also an increase of 17.5 percent. The tariff-free treatment of the Nicaragua-Taiwan FTA in January 2008 is beneficial to Taiwanese manufacturers, where more than 90 percent of the products are opened to freely enter and exit the markets on both sides, which allow Taiwanese companies to carefully evaluate the business opportunities under the FTA to invest in favorable industries in Nicaragua.

⁹⁶ Eximbank Taiwan and Banco Ficohsa Nicaragua sign Re-Loan Agreement. Retrieved July 2020. https://www.taiwanembassy.org/ni_es/post/17042.html

The following is a list of the status of the remaining global and regional economic integration not mentioned above that Nicaragua has negotiated:⁹⁷

In force:

- Free Trade Agreement between Chile and Nicaragua (October 2012)
- Five Central American countries (Costa Rica, El Salvador, Honduras, Nicaragua and Panama, excluding Guatemala) and South Korea (signed on February 21, 2018)
- Six Central American countries and United Kingdom of Great Britain and Northern Ireland (signed on July, 18, 2019)
- Tariff reduction agreements signed with Colombia, Venezuela, Cuba and Ecuador.

Under negotiations:

- Four Central American countries (excluding Costa Rica) and Canada
- Four Central American countries and Panama and the Caribbean Community (CARICOM)
- Latin American Integration Association (ALADI) (attended the Sixteenth Meeting of the Council of Ministers on August 11, 2011; ongoing negotiation since March 2012)

All these trade agreements provide an advantage and are positive to the overall Nicaraguan economy

3.2 Free Trade Zones

In addition, the World Trade Organization (WTO) at the 4th Ministerial Conference held in Doha, Qatar, allowed Nicaragua to maintain the existence of the free trade zones after

⁹⁷ In accordance with June 22, 2020.

2008 in accordance with the special and differential treatment (SDT) provisions for developing countries, which required all other members to treat them more favorably, for instance, to protect the trade interests of the respective countries (WTO, 2020). In respect to the special provisions, the neighboring Central American countries with higher incomes must review the laws and regulations of the free zones sector and carry out adjustments to avoid subsidizing exports. With the implementation of the free trade zones, 89,927 jobs were recovered by 2010 after the unemployment caused by the global financial crisis (IMF, 2011). According to the ANITEC, the neighboring countries Guatemala, El Salvador and Honduras have no installation of a free trade zone similar to Nicaragua since 2016, which should help the country continue to attract more foreign investments.

At the beginning of the establishment of the free trade zones in Nicaragua, only a few Taiwanese businessmen engaged in garment have settled in the free zone sector. Thanks to the executive order issued by President Violeta Chamorro to reward foreign investment in November 1991, Taiwanese business enterprises began to make large-scale investments in the free zone sectors of Nicaragua. Since the President Daniel Ortega raised the labor wages (see table 3) and raised income taxes significantly in 2019, a small number of Taiwanese enterprises had to leave reluctantly. At present, although many Taiwanese businessmen that are investing in Nicaragua no longer enjoy the same benefits as those in the past, the performances of a handful of manufacturers who have mastered the function of the US market, handled market competitiveness, and deeply cultivated technology advancements are still booming. However, Korean businessmen actively grasp the incentives of the CAFTA-DR and the free trade zones of Nicaragua. The Korean ambassador to Nicaragua

stated in October 2018 that there were a total of 34 Korean businesses and factories set up in the country⁹⁸, mainly operating at the textile industry, generating more than 35,000 jobs.⁹⁹

According to the statistics provided by CNZF and BCN, in 2018, there was an average of 194 businesses working at the free trade zones in Nicaragua, which employed about 122,000 direct employees (see table 13). In 2019, the export value of the free zones reached US\$2.894 billion, a marginal increase from the previous year. The main export items were in textiles (US\$1.5 billion), automotive wiring units (US\$58.84 million), and cigars (US\$26.64 million). The free trade zones became the main driving force of foreign exchange earnings in Nicaragua. In addition to promoting export growth, it also created a large number of employment opportunities. The Nicaraguan government continues to actively attract investments and use preferential market entry conditions brought by the FTA to attract foreign investment to set up factories. Álvaro Baltodano, president of the National Free Zone Commission (CNZF), stated that they expect to generate 150,000 jobs by 2020 or 2021 in the free trade zones.¹⁰⁰

Table 13. Industrial free trade zone indicators in Nicaragua from 2006 to 2019

Year	Business	Direct employment	Exports (in millions of US\$)
2006	99	76,783	941.89
2007	121	84,408	1,110.27
2008	124	82,754	1,275.75
2009	118	69,067	1,231.91

⁹⁸ Korean investment grows in the South Caribbean. June 7, 2016. Retrieved in January 2020. <https://www.laprensa.com.ni/2016/06/07/economia/2047475-inversion-coreana-crece-en-el-caribe-sur>

⁹⁹ New textile plant in Mateare generates 800 jobs. February 16, 2016. Retrieved in January 2020. <https://www.elnuevodiario.com.ni/economia/385213-nueva-planta-textil-mateare-genera-800-nuevos-empl/>

¹⁰⁰ 150,000 jobs projected in 2020 in free zones. <https://www.elnuevodiario.com.ni/economia/430385-proyectan-150-000-empleos-2020-zonas-francas/>

2010	125	77,035	1,613.26
2011	131	77,035	2,051.85
2012	146	102,029	2,156.43
2013	141	106,102	2,358.17
2014	153	109,139	2,524.91
2015	161	108,027	2,493.99
2016	176	112,305	2,612.80
2017	190	116,062	2,638.09
2018	194	122,010	2,870.34
2019	191	122,535	2,894.06

Source: CNZF and BCN. Available at:
bcn.gob.ni/estadisticas/sector_real/produccion/1-18.htm

According to the 2006 CAFTA-DR, the textile industry in the free trade zones of Nicaragua were granted the treatment of TPL for purchase of textiles exports from 2007 to the end of 2014, the average annual growth rate of textile exports to the U.S. had reached 9.4 percent. However, the sector was vulnerable to the expiring TPL with the U.S. in 2014 as it has experienced slow decline, but the textiles sector was able to cover its losses by gradually increasing the exports of textiles and clothing to its neighboring countries, such as Honduras and Mexico (see table 14). Since then, the government has actively diversified its product lines and encouraged multiple industries to make use of its free trade zones to set up high value-added production lines.

Table 14. Nicaragua Textiles and Clothing Exports by Country (in millions of US dollars)

Country	2014	2015	2016	2017	2018
United States	1,289	1,209	1,205	1,211	1,290

Honduras	58	75	60	78	113
Mexico	4.9	3.9	10	12	12

Source: World Bank (selected top 3 export share in 2018).¹⁰¹

For example, the Japanese Yazaki Group invested in the production of automotive wiring and autoparts in Nicaragua since 2001, and then expanded rapidly. At present, there are five factories in Nicaragua with a total employment of about 12,000 people, a total factory area of 8 hectares¹⁰², and a total investment of about US\$60 million, in order to supply the increasing demand for the assembly line of major car series in Europe, Mexico, and Japan. In addition, Dräxlmaier Group, a manufacturing company from Germany, also set up a factory in Nindirí from downtown Masaya¹⁰³ with a total investment of US\$10 million, employing about 1,000 people. In October 2017, the French Delfingen also announced an investment of US\$2 million to set up a factory in the city of Chinandega to provide components for the Yazaki Group. At present, the automobile wiring has become the second largest free trade zone export after clothing.

According to the Cigar Aficionado, the American magazine dedicated to feature the best cigars of the world, stated that Nicaraguan cigars are of good quality. The cigars of Nicaragua continually ranked top ten on the “Top 25” best cigars in the world, and have been spotted several times as the number one, earning the title of “Cigar of the Year”. Not only did Nicaragua win the top position of 2019, but also took eight spots out of the top ten positions on the rankings listed by the magazine, giving the top one a score of 96, and the lowest one

¹⁰¹ Available at: Nicaragua Textiles and Clothing Exports By Country. Retrieved March 2020. https://wits.worldbank.org/CountryProfile/en/Country/NIC/Year/2018/TradeFlow/Export/Partner/by-country/Product/50-63_TextCloth

¹⁰² A hectare is roughly around the size of the grassy area inside a 400-meter running track.

¹⁰³ German Company manufactures parts of BMW and Volkswagen in Nindirí, Nicaragua. Retrieved May 2020. <https://www.granpacifica.com/german-company-manufactures-parts-bmw-and-volkswagen-nindirí-nicaragua.html>

with 93 points. International brands have come to Nicaragua to set up procurement and production bases in free trade zones. According to figures from the Cigar Association of America, there were more than 70 cigar factories in Nicaragua that exported 140 million cigars to the U.S. in 2018, surpassing its competitors in Dominican Republic and Honduras¹⁰⁴. In 2019, cigars are the third largest export products in the Nicaraguan free zone sector, falling behind textiles and vehicle wiring, and are mainly exported to the United States (\$17.637 million), Honduras (\$12.47 million) and Dominica (\$ 7.93 million), creating additional employment opportunities for nearly 16,000 people in the free trade zone, not to mention the 55,000 farmers and pickers working in the small city of Estelí alone¹⁰⁵ and the countless others around Nicaragua.

3.3 Regional Trade Liberalization

In recent years, the global economic and trade environment has undergone rapid changes, and regional trade liberalization has become prevalent. The Nicaraguan government should carefully study what industries have advantages and disadvantages in development and positioning under this trend. International professionals invest in technology and improve the efficiency of resource use to assist the business community to develop steadily at home and expand and market its business to the world, creating a Nicaraguan economic miracle.

In recent years, from the perspective of important international development trends, the world is fighting for resources. The issue of global warming has attracted attention from all walks of life – from environmental pollution, environmental protection, environmental

¹⁰⁴ Tobacco: Booming Industry in Nicaragua. June 28, 2019. Retrieved in May 2020. https://www.centralamericadata.com/en/article/home/Tobacco_Booming_Industry_in_Nicaragua

¹⁰⁵ Nicaraguan cigars become premium. June 26, 2019. Retrieved in May 2020. <https://www.taipeitimes.com/News/world/archives/2019/06/26/2003717626>

protection of commodities, green economy, zero recycling, energy saving and carbon reduction, and newer concepts and knowledge. Creativity has become a new engine of economic development. Countries have shifted from focusing on investment in production networks to focusing on internal needs, such as the improvement of productivity in emerging industries such as communication technology and changes in logistics business models. The world online has promoted business processes in various industries in regional trade liberalization markets to be faster and more efficient. Nicaragua, with the support of the Central American Regional Trade Agreement, the business community can take advantage of the direct benefits of market liberalization.

The government should have a strategy of supporting liberalization measures, adapting to changes in domestic and foreign economic and trade environments, and developing trends. Bilateral investment with various regions, and research and analysis of the overall economy and overview of these regions, scheme that reward investment from various countries, and multilateral and regional free trade agreement opening commitments, clearly determine whether countries truly further invest to the scheme and the overall strategic development of the country. Correspondingly, it is necessary for the government to lead industrial integration and assist the industries to expand internationally.

Nicaragua currently signed agreements that are open to foreign and regional trade freedom agreements. Based on this, the Ortega administration chooses strategies that are suitable for manufacturing, wholesale, retail, technology, or services to expand its sectors overseas and domestic markets.¹⁰⁶ The government formulated plans to support the market liberalization by supporting treatment of mechanisms and practices carried out at the international stage to help foreign manufacturers know the advantages available in Nicaragua

¹⁰⁶ PRONicaragua (2019), Investor Guideline.

and the important areas in which Nicaragua can participate in investment or introduce technological cooperation.

In order to enhance the degree of trade liberalization, all countries have signed regional trade agreements (RTA) with their trading partners. It is hoped that through preferential trade agreements between regions, intra-regional trade will be more liberalized than out-of-region trade. High, driving trade development in the region, RTA types related to tax unions, economic integration agreements, free trade agreements, partial preferential agreements, etc. For example, the Free Trade Agreement (FTA) between Taiwan and Nicaragua reached an agreement in early 2006 Signed and entered into force in January 2007. This agreement has greatly increased the bilateral trade of imports and exports and total investment, and also promoted Nicaragua's economic development and created local employment. Nicaraguan exports and imports with Taiwan have grown, so that the Taiwanese people can enjoy the deliciousness of fish, beef and coffee.¹⁰⁷ Furthermore, the CAFTA-DR between Nicaragua and the United States can also become a springboard opportunity for Taiwanese manufacturers to manufacture, produce, and export goods into the U.S. market. The Taiwanese textile industry manufacturers have increased their profits because Nicaragua has won the concession of importing 100 million square meters of fabrics outside the United States to enjoy the benefits of exporting to the United States. The WTO gives Nicaragua a preferential tax-free period for sustainable maintenance after 2008, which is more beneficial to the development of competitiveness of enterprises.

In order to promote the Nicaraguan economy from a low-income to a middle-income economy, the government needs to formulate a new economic model based on innovation and high added value, mainly targeting areas where the country has a solid foundation where it

¹⁰⁷ See Table 8 for detailed numbers of Nicaraguan exports to Taiwan.

can strengthen. At this stage, the country is focusing on development industrial projects, and should not continue to develop low-level labor-based industries, but begin to move towards a knowledge-based industry. In addition to manufacturing, wholesale and retail trade industries, invest in technology or service industries with high knowledge intensity. In the future, foreign investment will be encouraged to invest in industries such as advanced manufacturing, high-tech industries, modern services, new energy, energy conservation and environmental protection, and special incentives such as tax breaks will be used to attract foreign investment, with a view to attracting foreign funds and outstanding professionals and technologies more efficiently. The introduction of Nicaragua has driven the overall economic development of regional trade liberalization since there are more opportunities to make full use of the comparative interests among countries, and therefore can improve the international competitiveness of Nicaraguan companies. At the same time, the Nicaraguan market is also open to other countries; therefore, industries that are less competitive in the country will be challenged by competition. The government should provide guidance to strengthen its ability to respond, provide industry upgrading and transformation guidance, plant and equipment updates, provide low-profit financing, and stabilize employment.

According to the IMF in 2017, global economic growth fell to 3.1 percent in 2016, a new low after the 2008 financial crisis, mainly due to factors such as global trade stagnation, increased political uncertainty, and weak investment. Demand of exports in advanced countries has slowed. The new global trade restrictions in 2016 were the highest since 2009, and the global economy will fall into the predicament of high debt and low investment status. According to the IMF, the growth momentum of the global economy from 2017 to 2018 is still dominated by emerging markets and developing economies. However, under the development of the global economy, it has long been established that it consumes a lot of resources, resulting in the planet's limited resources are exhausted and the environment is

deteriorating. International Journal of Recent Trends in Science and Technology advocates the concepts of green innovation and circular economy. The concept of circular economy is deeply embedded in the sustainable industrial development. The introduction of green innovation technology from product design improves resource productivity and eliminates waste. Use resources efficiently and reduce environmental impact. Economic development uses innovation, employment, and distribution of a new model of circular economy to drive industrial competitiveness, allow the sustainable development of economic industries that recycle resources and protect the environment. For example, turning agriculture into a business with business opportunities and sustainable development, reversing the effects of dependence on subsidies, and promoting the transformation and development of agriculture, enhancing quality of smart agriculture, strengthening the value of agricultural innovation and integrate them into the economic system where they can benefit from its cyclical services.

3.4 Agricultural subsidy policy

In the middle of the era of globalization, this generation is the era of economic globalization, where economic development is capital-driven. Globalization of capital has a series of concepts such as methods used in trading across borders and use of tariffs. This issue has become the concern of most people and businesses in the world, so countries around the world have been paying attention to the negotiations on trade issues of the WTO “Doha Development Round”, but the negotiations of achieving a global consensus on reducing or eliminating trade barriers among countries have failed after many years. Therefore, the free trade agreements such as “Bilateral Trade Agreements” and “Regional Trade Agreements” have been rapidly developed in recent years instead, which not only damaged the prestige and

legitimacy of the WTO trade dispute settlement mechanism, but even triggered trade wars and global trade war in some cases.

The global spread of the COVID-19 in 2020 has exposed the world to a crisis of economic recession. Many countries have suffered social and unemployment problems. People in developing countries and least developed countries have even been subject to risks of the most basic livelihood security. The World Bank estimated that if the Doha Round is successfully negotiated, the global trade liberalization will result in a world total income of US\$287 billion in 2015, to which US\$86 billion would be placed received by developing countries and may assist the 68 million people out of poverty, where US\$54 billion of US\$86 billion would be gained by the agricultural sector,¹⁰⁸ which is in line with the objectives of the WTO. However, for the developed countries, the threat of unemployment and loss of the economic markets is of great impact to their own countries.

Furthermore, as for the main agricultural products that the people eat and drink, the price and supply of products in the market are moving toward the same direction, for example, the producer decides how much a certain agricultural product is produced, in addition to taking into account the price, cost, technology, and so on for the agricultural products. If the market price is good, the farmer would increase the supply, and if the price is not, there will naturally be less production, and this works accordingly to the law of supply and demand. The price of a product has a reverse relationship with the quantity demanded; if the income and other prices remain the same, cheaper products would be consumed more following the law of demand. However, if largest producing countries do not abide by WTO rules, create a fairer trading environment, promote global economic development, especially for the poorer countries, and do not guide resources and allocate them according to the price – the market can naturally

¹⁰⁸ Anderson et al. (2005). Global Impacts of Doha Trade Reform Scenarios on Poverty, pp. 11-12.

reconcile both, the supply and demand, to achieve a more effective allocation of resources in the market.

The reactionary economies all over the world have severely criticized the fact that globalization is actually global economic imperialism dominated by the United States and European countries. In the process of globalization, capital and labor have been allowed to flow across borders, forming a global competitive environment. Whether within a country or between countries, globalization has widened the gap between the rich and the poor. Individuals or countries with the basic skills and conditions for global survival are the winners, enjoying the advantages of accumulating wealth. Farmers in developing and least developed countries rely on the crops they grow for food and clothing, and sell the remaining agricultural goods to make money to support their families, but if the market price is manipulated, there is no way for them to survive, increasing the likelihood of falling into extreme poverty.

The U.S. is a large economy, and farmers can receive large subsidies to produce when main agricultural products receive a loss in price. Just like the agricultural subsidy program initiated under Trump administration, the amount in 2019 is as high as US\$16 billion to assist American farmers affected by the US-China trade war.¹⁰⁹ In order to receive the incentives of such treatment, local farmers deliberately plant crops with higher amount of subsidies such as soybeans. In 2018, the U.S area of soybean cultivation reached 36.2 million hectares, accounting for 35 percent of global production, and exports accounted for 47 percent of total output. Soybean is the largest source of animal feed and the second largest source of vegetable oil in the world. About two-thirds of the total soybean output is refined into soybean oil and animal feeds.

¹⁰⁹ Trump administration unveils details of \$16 billion aid package for farmers hurt by trade war. Retrieved June 2020.
<https://www.cnn.com/2019/07/25/trump-unveils-16-billion-aid-for-farmers-hurt-by-china-trade-war.html>

When thinking about global trade flows in the era of globalization, the economy is the larger community of this world. In accordance with to the law of supply and demand in the market, the increased output of specific crops will result in lowering their prices globally. Farmers do not grow crops according to the market demand, but look at the government subsidy policy, which disrupts the market mechanism and has an adverse effect. As far as the U.S. is concerned, the reason farmers need assistance is because Trump imposed additional tariffs on Chinese imports, officially raising the US\$34 billion worth of Chinese goods exported to the U.S. to total cost of US\$50 billion from increase of the original 10 percent tariff rates to 25 percent in response to China raising its tariffs to the same amount.¹¹⁰ Both, the U.S. and China violated WTO rules, and countermeasures made in China to greatly reduce the U.S. imports of soybean will also affect American farmers. The losers of this trade war are the average consumers in the U.S. and China since companies will need to transfer goods at additional costs to the consumers, which also disrupt the global supply chain.

The U.S. agricultural production subsidies are trade distorting domestic support, which include the Aggregate Measurement of Support (AMS), blue box subsidies, and micro subsidies as per WTO's Agreement on Agriculture (AoA) to provide domestic support to farmers. Members of EU and developing country members want the U.S. to reduce subsidies – the total amount of US\$20 billion.¹¹¹ The United States rejected the request since the tariffs on agricultural products have not been significantly reduced, so that it could export its products in

¹¹⁰ China announces retaliatory tariffs on \$34 billion worth of US goods, including agriculture products. Retrieved June 2020.

<https://www.cnbc.com/2018/06/15/china-announces-retaliatory-tariffs-on-34-billion-worth-of-us-goods-including-agriculture-products.html>

¹¹¹ Agricultural Subsidies. Downsizing the Federal Government. Retrieved June 2020.

<https://www.downsizinggovernment.org/agriculture/subsidies#:~:text=The%20federal%20government%20spends%20more,wheat%2C%20cotton%2C%20and%20rice.>

bulk, plus the reduction in agricultural subsidies would reduce the income of farmers and the export output of the nation.

Similarly, the massive subsidies for rice in the U.S. each year not only distort rice production and trade, but even dump massive exports into international markets in disguise, harming the rice industries of developing countries that do not have enjoy any form of subsidies from the local government. The 2008 Farm Bill, from 2008 to 2012, continued to implement various subsidies for the production or export of agricultural products such as rice in WTO negotiations for further agricultural liberalization. In 2018, U.S. Congress passed an US\$867 billion farm bill.¹¹² Some subsidies may violate the U.S. commitment to WTO, since these production subsidies will suppress international agricultural product prices through various export promotion methods, thereby hurting the interests of developing countries that rely on agricultural product exports. For example, in 2005 and 2008, Brazil complained to the WTO that the U.S. cotton subsidies violated relevant WTO regulations, which is why most developing countries insisted that the U.S. must first significantly reduce agricultural production subsidies during the agricultural negotiations in Doha Round and demanded the right to implement the Special Safeguard Mechanism (SSM).

All countries stand from the perspective of its own national interests in trade negotiations, especially in WTO Doha Round negotiations, and compare who gets the larger benefits and who is the bigger winner. Although the United States is not a major rice producer in the world, its output accounts for only 1.5 to 2 percent of the total production output of the world, but its exports account for an important position in the global trade of rice, so its production subsidies have a considerable impact on the price of rice in international markets. Rice is a global crop,

¹¹² Congress just passed an \$867 billion farm bill. Retrieved June 2020.
<https://www.washingtonpost.com/business/2018/12/11/congress-billion-farm-bill-is-out-heres-whats-it/>

and more than half of the world's population eats rice. Rice earns about 1 billion to US\$1.5 billion annually for American farmers, and rice exports are crucial to American rice producers. The rice production in the U.S. is still not self-sufficient since imports of rice to the country over the years increased: 119,000 tons in 2013, 126,000 tons in 2014, 131,000 tons in 2015, 144,000 tons in 2016, 138,000 tons in 2017, and imports are still growing.

The U.S. rice subsidy policy will affect Nicaragua under the CAFTA-DR since the import tariffs of rice in Nicaragua from the U.S. are reduced to zero until 2023. The cheap rice imported from the U.S. will trade through the free trade zones duty-free, and is expected to continue to grow. In 2004, the CAFTA-DR agreements signed by five Central American countries and the Dominican Republic, allowed the U.S. to win over the regional markets for dumping agricultural products. As tariffs fell, more than 17,000 Nicaraguan rice farmers faced the impact of the massive influx of U.S. rice, which is heavily subsidized by its government, into their markets. In 2003, the U.S. government invested US\$1.3 billion in the rice production sector, while the rice production cost reached US\$1.8 billion, indicating that at least 72 percent of the U.S. rice production cost was actually paid by the state. The cost of planting and milling white rice is 415 US dollars, and it is dumped in the export market at 274 US dollars per ton, making the export price 34 percent lower than its actual cost, affecting the international price of rice where only the U.S. can afford to continue to use this method.

The annual domestic rice consumption in Nicaragua is more than 6 million quintals (one quintal = 100 kg.) in 2017, the average domestic annual output of rice is about 4 million quintals, and about 2 million quintals imported from the United States, according to The Minister of Development Industry and Commerce (MIFIC) in Nicaragua.¹¹³ In 2019, the

¹¹³ Nicaragua produces 75 percent of the rice consumed. Retrieved June 2020.

1) <https://www.elnuevodiario.com.ni/economia/383350-estamos-produciendo-70-consumo-nacional-arroz/>
2) <http://laprensa.com.ni/2017/03/04/economia/2192602-se-produce-75-ciento-del-arroz-se-consume>

production of rice reached 5.5 million quintals, where 7 million quintals of rice are being consumed, according to the minister of MIFIC Orlando Solórzano¹¹⁴. The Nicaraguan free market mechanism does allow the exports of rice to neighboring countries, but under specific regulation that only permits licensed exporters to export rice. Honduras, Guatemala and Costa Rica purchase rice from Nicaragua because its price is cheaper in comparison to that of neighboring countries, to which profits can be made by reselling them. Plus, the sales volume of rice is not large, so the government is not worried about it affecting the domestic supply and demand in Central American markets.¹¹⁵ For that reason, Nicaragua provides tax-free incentives and coordinating the supply chain of rice producers to rice milling plants to make the price of rice in Nicaragua cheaper than other Central American countries.

3.5 The impact of US rice subsidy to Nicaragua

Nicaragua is an agricultural country and its agricultural products accounts for the bulk of its exports. It enjoys the reputation of being a farm estate in Central America, but its industry and technology are not well-developed. Many livelihood of the Nicaraguan people depended on imported supplies, and even one of the staple foods in Nicaragua, such as rice, also rely on imports. The United States is the third largest rice exporter in the world, but the fact that the U.S. export volume ranks third is due to the country providing agricultural subsidies to the farmers. The subsidy programs include direct subsidies, counter-cyclical payments and marketing loans with the goal to offset the changes of global market prices for rice. In fact, the American rice farmers can profit from dumping exports at a lower cost in larger volumes.

¹¹⁴ Orlando Solórzano: Nicaraguan production meets the demand of the population. Retrieved June 2020. <https://www.vivanicaragua.com.ni/2019/06/02/sociales/orlando-solorzano-la-produccion-de-nicaragua-abastece-la-demanda-de-la-poblacion/>

¹¹⁵ Nicaraguan government restricts legally licensed exporters to export rice. Retrieved May 2020. <https://www.trademag.org.tw/page/newsid1/?id=486734&iz=6>

Developed countries use the resources provided by the IMF, the World Bank and strong bilateral trade agreements to push open the gates of opportunity for the developing and less developed countries. Making full use of the WTO regulations that all countries must abide by, and allow poor farmers in developing countries, agriculture products that are being affected an opportunity to succeed. These farmers may only sell the products at lower prices than the production cost due to large volumes of similar products being dumped into the market. Under the influence of imported food, farmers in poor countries simply cannot earn enough income to make an honest living, making it more challenging to eradicate poverty in countries like Nicaragua.

If developing countries lose their control of its implementation on tariffs and trade barriers, they will face the threat of increased food imports. In order to avoid damage to rural development, it is necessary for developing countries to strive for special and differential treatment to maintain farmers' livelihoods and promote food security. For example, in 2004, five Central American countries along with Nicaragua signed the Central American Free Trade Agreement (CAFTA) with the United States, and the Dominican Republic joined later, thereby changing the name of the agreement to CAFTA-DR. The reduced tariffs for imports caused Nicaraguan agricultural producers to face the impact of the dumping of US agricultural products, which received substantial governmental subsidies, into their markets. As per agreement of the FTA, national policies were unable to protect its farmers and the rural economy by raising import tariffs. Both countries expected that this agreement will bring economic and trade benefits to their own countries, but only the U.S. succeeded in benefitting from the unrestricted access to the Central American market and a longer phased implementation of the year-by-year tariffs reduction period, similar to the proposed Free Trade Area of the Americas (FTAA) that was not agreed upon by the majority of the Latin American countries. The countries that sign the FTA with the U.S. have not received any special

treatment, but have forced to fully open their markets for the U.S. exports of agricultural products for 18 to 20 years.

The acceleration of trade liberalization and promotion of indiscriminate trade liberalization have limited the power of developing countries to decide their trade and agricultural policies, and the results negatively affected poor communities. International agreements must be sufficiently flexible to allow governments of developing countries to formulate appropriate policies based on their domestic conditions. The market cannot be controlled by a few importers since the beneficiaries of cheap imported products are agricultural groups and large enterprises rather than farmers and consumers themselves. In order to ensure food security, rural development, poverty reduction, and long-term economic considerations, developing countries must establish a category of “special products”. The government has the right to decide which items are to be exempted from the reduction of import tariffs to safeguard its farmers and domestic production of goods.

Rice is considered as the staple food for the people of Nicaragua, and the consumption of rice is increasing day by day. Rice cultivation provides national employment opportunities and household income, but domestic production was not able to achieve a level of self-sufficiency to meet national needs, as a result, the country relies on the imports of rice. If prices were maintained and are affordable for low-income consumers, not only would it help reduce hunger and improve lives, but the low prices would also impact the domestic rice producers’ income at the same time. Therefore, government should use trade policies to maintain control of import and export volumes of rice to achieve a balance for both, the consumers and producers.

The 2008 global food crisis, for example, featured a time when there was insufficient

rice production in Haiti. The tariffs on rice have been greatly reduced, and the price of domestically produced rice became more expensive than imported ones, rendering the rice industry in Haiti unable to compete and diminished its production. Haiti, once considered as self-sufficient in the production of rice, produced only about 14 percent over the 2011 to 2016 period,¹¹⁶ depending significantly on the imports of rice to fulfill the domestic food demand. And when government loses control of imports, it will lead to a food crisis and food shortages that will cause food prices to rise and panic buying, leading to street riots. The signing of the agreement is like a going to a barbershop for a haircut; once the procedure starts, one must wait for every cut until the very end and expect for the best outcome.

One of the more successful examples Nicaragua can learn from is from Taiwan. In order to protect its farmers from the massive imports of pork, the government implemented a regulation that prohibited U.S. imports of pork that contain ractopamine, a drug used in animal feed to promote growth and leanness in the meat, stating that it is unsafe for human consumption. Nicaragua failed to do this, but instead allowed mass imports of U.S. food, causing a decline in prices of various agriculture products for its national farmers. The government could identify the most reliant agricultural production instead and impose regulation on such imports, for instance prohibit the imports of corns and soybeans that use pesticide, to protect the national farmers and the production of major crops for domestic consumption. According to U.S. official site, its total agricultural exports to Nicaragua in 2018 reached \$220 million,¹¹⁷ leading with two major crop products: corn with \$57 million, accounting for 25.9 percent of total exports, and soybean meal with \$44 million, 20 percent of exports.

¹¹⁶ Hait, Staple Food Market Fundamentals. March 2018, *USAID*. Retrieved May 2020. https://reliefweb.int/sites/reliefweb.int/files/resources/Haiti%20MFR_final_20180326%20%281%29.pdf?platform=hootsuite

¹¹⁷ Nicaragua. *Office of the U.S. Trade Representative*. Retrieved in May 2020. <https://ustr.gov/countries-regions/western-hemisphere/nicaragua>

According to Sinforiano Cáceres, president of the National Federation of Agricultural and Agroindustrial Cooperatives (FENACCOOP), the tariffs level for 45 percent of brown rice and 62 percent of white rice will drop to zero for the next 18 years since implementation of CAFTA-DR, meaning that the agreement is until the year 2023 (Raworth, 2005).¹¹⁸ Even if tariffs were not reduced, the price of American rice exports will still be lower than the production costs of rice in Nicaragua. The government of Nicaragua assists farmers to set up agricultural cooperatives, and use agricultural subsidy policies as remedies to protect their productions. Producers in Nicaragua need to increase their competitiveness before they have a chance to succeed, but the population of farmers in Nicaragua is twice than that of the U.S., so the government has no way to compete and compare with the agricultural subsidies implemented in America. Under the American subsidy system, its rice farmers did not pay any attention to the price of rice and still produced rice in large quantities for export dumping to occupy the market. Developing countries must have the right to set their implementation tax rate at a sufficient level to deal with the dumping and protect the income of small farmers. But they must also maintain the imposed tariff rates and the maximum tariff rates given to a commodity, the maximum tariff level should be maintained at a level of 40 to 60 percent to cope with the offsets of the fluctuations in world market prices.

Nicaragua can take the early economic take-off of Taiwan and South Korea as examples; economic phenomenon like these ones is worth exploring. The use of agricultural land reform should be paired with the support from the government to invest in the construction for agricultural infrastructure – the roads, water conservancy facilities, development of agricultural technology and post-harvest storage system, as well as provision of seeds,

¹¹⁸ Raworth and Green (2005). Kicking down the Door: How Upcoming WTO Talks Threaten Farmers in Poor Countries. p. 30

fertilizers, loans and other policies. Allowing the incomes made from agricultural production to drive the development of other economic activities, thereby increasing the national income and build the country toward the status of developing countries. Furthermore, the agricultural policy must implement safeguard measures as a production protection strategy for the domestic staple food, and not entirely rely on imports, so as to avoid the domestic food crisis caused by the export restrictions of the producing countries.

The views of agricultural protection and liberalization have been controversial internationally. Each country has a different agricultural production environments and different food crops, and regarding food safety stocks is an important evaluation for the government – whether it should it be in accordance with the law of comparative interests to measure the self-sufficiency level or how much is produced and imported to judge food safety stocks. In addition, the U.S. subsidies for rice have a considerable impact on the international rice market. Rice is an important agricultural product in the world and one of the main foods in many countries, especially in Asia. If the supply is insufficient, it may lead to political and social unrest. It is said that rice imports from the U.S. are not much, about 64,000 tons, but the domestic rice industry may also suffer from its subsidies, especially for small farmers. The Taiwanese government has ensured domestic food security in both domestic rice cultivation and production. Although long-term protection requires higher costs, a moderate protection would not stop production or reduce the production of rice due to cheap import prices.

Taiwan has excellent technology in rice farming based in several regions of its diplomatic allies. It also dispatched agricultural technical missions in Nicaragua to assist in breeding of livestock animals and production of agricultural goods. The increase in global rice prices in 2008 was not due to underproduction, it was due to rice-producing exporting countries wanting to suppress domestic inflation and maintain stable domestic food prices, so they adopted export

taxation or restriction in export volumes, and even implement measures to ban such exports. Certain agricultural production subsidies can distort production and trade and have a negative effect on countries that do not provide such subsidies. The problems brought about by the comprehensive liberalization of food can be solved with appropriate protection and appropriate liberalization to resolve inequities and crises.

Nicaraguan production ratio of major food crops is generally short. The proportion of imported food has been as high as 40 percent, which has declined in recent years. The government of the country attaches great importance to food security policies. The rice production has grown by 44 percent in 2012, accounting for 52 percent of the Central American production. The Nicaraguan government hopes to achieve the goal of self-sufficiency in rice production in the coming years. If the U.S. does not provide large subsidies for rice in its nation, which are exported for dumping, it is an ideal goal to achieve self-sufficiency but also export and earn foreign currencies to increase the national income of Nicaragua. However, under CAFTA-DR, there are non-tariff barriers on rice in Nicaragua until year 2023, which will be imported duty-free, so it will be difficult to reduce the import volume.

According to the data provided by the Food and Agriculture Organization (FAO), the total of rice imports in Nicaragua from 2009 to 2017 averaged 128,260 tons (see table 15). In 2009 and 2010, U.S. rice imports to Nicaragua accounted for above 93 percent of its total rice imports to the country, while domestic farmers managed to produce an average of 394,253 tons. The Nicaraguan government managed to lower the imports of U.S. rice in 2011 to 2012, almost reducing it by half compared to the previous years, which averaged about 70,074 tons, comprise of about 56 percent of its total rice imports. Since the Nicaraguan farmers were starting to increase its rice production and increasing other sources of rice imports, such as

from Brazil starting 2011, between the years of 2013 to 2015, the country managed to import an average of 5.5 percent of U.S. rice, trimming it down to nearly 6,954 tons.

Table 15. Rice imports to Nicaragua – U.S. imports versus total imports in relations to the national rice production from 2009 to 2017

Year \ Rice (tons)	Rice, U.S. imports	Rice, total imports	National Rice production
2009	113,083	120,597	334,516
2010	121,073	124,754	453,990
2011	78,618	132,756	413,321
2012	61,531	114,650	418,656
2013	9,449	119,489	371,934
2014	4,092	127,328	369,048
2015	7,320	132,087	365,096
2016	540	144,360	418,079
2017	7,239	138,315	422,612

Source: FAO, detailed trade matrix,¹¹⁹ and repurposed.

In 2016, due to the rising tension of Nicaraguan election and the U.S. concerns regarding the “flawed presidential and legislative electoral process”, stated by the U.S. Foreign Service Officer and then spokesperson for the U.S. Department of State Mark Toner,¹²⁰ led to a substantial decrease of imports of U.S. products where only 540 tons of rice entered its borders.

¹¹⁹ FAOSTAT. Detailed trade matrix. Retrieved 2020. <http://www.fao.org/faostat/en/#data/TM>

¹²⁰ U.S. expresses concern over Nicaragua's 'flawed' election. Retrieved in May 2020. <https://www.reuters.com/article/us-nicaragua-election/u-s-expresses-concern-over-nicaraguas-flawed-election-id-USKBN13108W>

By 2017, Nicaragua was able to produce at least 80 percent of the rice consumed domestically according to Michael Healy, president of the Union of Agricultural Producers of Nicaragua (UPANIC), “some years ago, we were importing 80 percent of rice and were producing around 20 percent, today in Nicaragua we are producing 80 percent of the rice we consume and we are only importing 20 percent”,¹²¹ therefore, was able to import 7,239 tons of U.S. rice, which only accounted for just 5.2 percent of its total imports of rice.

3.6 Summary and Discussion of Chapter 3

The world and regional economic integration Nicaragua enjoys under the Ortega administration is analyzed. Nicaragua has obtained a myriad of preferential agreements that could help the country development from its current status of second poorest country in the Central America to a more reliable and stable economy. For instance, Nicaragua is able to maintain its free trade zones and protection of quotas on imports and exports via the SDT and GSP arrangements under the WTO membership. Due to the slow progress of multilateral negotiations in WTO, and the fact that a global consensus of trade agreement has yet to be reached via the Doha Round negotiations, Nicaragua was able to pursue for multiple trade agreements through individual and regional integration, but negotiations are to be pursued bilaterally or in collaboration with its neighboring countries to reach for a trade agreements as a region with larger economies in the international stage.

The WTO special and differential treatment (SDT) provisions are favorable to Nicaragua because the country is considered as the less developed country in Latin America. Nicaragua is

¹²¹ Rice farmers expect a good harvest. *El Nuevo Diario*. Retrieved in May 2020. <https://www.elnuevodiario.com.ni/economia/420693-arroceros-esperan-buena-cosecha/>

specifically permitted to maintain the existence of free trade zones after 2008, while the other Central American neighbors with an overall better economic performance, such as Honduras, El Salvador, and Guatemala must revise their tax-free export zone laws and carry out certain adjustments to avoid export subsidies. Thus, the investors will choose to invest in the free trade zones in Nicaragua. Nevertheless, since the expiry of the TPL arrangement via the CAFTA-DR with the U.S. in 2014, some foreign textile manufacturers were forced to find alternatives in other regions, and the Nicaraguan government has diversified its exports to other countries as initial response to cover for the restricted export quotas to the U.S. market. Therefore, the government must identify its strength should it continue to face the increased competitiveness and possible restrictions of the international market in the future.

According to a 2015 study by Oxfam,¹²² it is estimated that there were about 210 wealthy individuals with a total amount of US\$30 billion in wealth,¹²³ which was more than 2.5 times the country's GDP, meaning that the consumption level and purchasing power of these people and families were high. The gap between the rich and the poor was still prevalent; for instance, in 2016, there were still 24.9 percent of the poor and 6.9 percent of the people in extreme poverty in Nicaragua. The poor are engaged in labor intensive work, have inadequate income, and low consumption standards as well as low purchasing power, in which they can only access mainly sub-quality and low-priced products, driving apart the consumer market.

In terms of market access, Nicaragua is nearby to the vast consumer markets such as the United States and Latin America. With its convenient location, low wages, and advantages in the multiple free trade agreements, Nicaragua has attracted a large number of South Korean

¹²² Oxford Committee for Famine Relief, an international non-governmental organization working in more than 90 countries, was established to end the injustice of poverty and tackle the inequality that keeps people poor.

¹²³ Coveted and criticized, Latin America's rich multiply. June 24, 2015. Retrieved March 2020. http://www.jamaicaobserver.com/business/Coveted-and-criticised--Latin---America-s-rich-multiply_19152420

textile and clothing industries to operate in free trade zones. In recent years, China has become the second largest source of imports in Nicaragua after the United States. Importers of the general merchandise, computer and communications industries are particularly fond of importing Chinese goods to provide cheaper daily necessities. The Chinese Huawei mobile phones, smart phones and tablets have been favored by the middle- and low-income consumers and have gradually established their market position after only to Apple and Samsung. The industrial development in Nicaragua is lagging behind, and domestic large-scale infrastructure projects all rely on foreign investors. Therefore, the international bids announced by the country are mostly for the construction of highway, power facilities, water supply systems, institutions and hospitals, agricultural machinery and equipment, school repairs, and so on. Japan is also actively promoting the international reputation of high-quality domestic products and engineering services through international donations to construct bridges, roads, hospitals, schools, solar power and other public engineering assistance projects, and also directly providing outsourcing services through the Japan International Cooperation Agency (JICA) to effectively enhance the business and job opportunities and improve its international image of engineering service industry to the domestic market and companies in Nicaragua.

Chapter 4 – Social Policy Reforms in Nicaragua

Despite the national and international development efforts in Nicaragua, the country is experiencing a deteriorating economy with a negative 3.95 GDP growth rate in 2018, and the same negative economic outlook for 2019 due to the social unrest (World Bank). The most recent policy reform was the alternation of the pension reform that sparked the massive demonstrations across the country in 2018. This chapter explores the impact of certain policy reforms on the social, economic, and political aspects in Nicaragua. For this, the food security policy is examined, as well as the policy for agrarian reform, where an explanation of its history is provided to better understand the challenges of land rights faced today, and finally, the social security reform is taken into consideration as to explain the occurrence of the Nicaraguan protests and the withdrawal of foreign investments.

4.1 Food Security Policy

As previously mentioned in the background information of chapter 1, the PPA, also known as Zero Hunger program, is one of the most successful social programs that helped combat hunger in Nicaragua from 2007 to 2011. A total amount of about US\$3.36 billion were invested into combating poverty for the initial four years of its implementation, an average of US\$841 million per year which is about 13.5 percent of GDP (IMF, 2011). Of this amount, an annual average of US\$167.4 million was invested in rural development to help the poorest families improve their incomes and living conditions through technical assistance and access to credit, as well as increase levels of productivity and exports.

For the initial four years of its implementation, a total amount of about US\$74.3

million¹²⁴ were provided to 59,755 poor rural women and their families to help them achieve food security, along with create savings fund and reduce chronic malnutrition among children (IMF, 2011). According to IMF, the PPA distributed more than 11,300 production bonds to women-headed households and provided grain seeds program has benefited 3,000 families, where more than 114,000 producers participated in. The amount of budget was later raised to US\$150 million to benefit 75,000 rural and semi-urban families living in extreme poverty that have tenure or access to 0.7 to 1.5 hectares of land (Kester, 2010).

In 2012, the PPA continued to grow with funding coming from ALBA, the International Fund for Agricultural Development (IFAD), and the IADB to increase the scope from 75,000 families to over 100,000 beneficiaries (Kester, 2010; IMF, 2011; Larracochea et al., 2014). By the end of 2012, a total of 103,336 Production Food Bonds (BPA), also known as the Zero Usury loan program, was delivered to small and medium producers in rural areas as well as benefitting more than 100,000 women-headed households that also helped them with training via technical support and workshops, and formation of savings fund groups to promote and create cooperatives.¹²⁵ According to the Ministry of Family, Community, Cooperative and Associative Economy (MEFCCA), “we’ll have 75,000 women organized in cooperative cells of 50 women each [...] each cooperative will handle a revolving fund of C\$250,000 córdobas [about US\$1,000], which makes Zero Hunger the largest program for forming cooperatives and creating revolving funds, with a total of C\$375 million córdobas”, which is about US\$15 million in 2011 exchange rates. However, Larracochea et al. (2014) stated how most bonds were given out during the election period of 2008 and 2011, which is probably a strategy utilized by President Ortega to boost popular votes when it’s time for the general elections.

¹²⁴ Estimated exchange rates of C\$1.5647 billion córdobas to dollar in 2010.

¹²⁵ Larracochea et al. (2014). Zero Hunger: How Are the Women Doing?

4.2 The Agrarian Reform

Nicaragua is an agricultural country with a wide disparity between the rich and the poor and an uneven distribution of wealth. In accordance to the latest data on the arable land in Nicaragua provided by the FAO in 2017, there is about 5.06 million hectares of agricultural land and 1.5 million hectares of arable land available for agricultural production in Nicaragua (see figure 1) – that is about 54.6 percent of land out of its total land area ready to be used for agriculture. In order to improve the access to land use for the poor and landless people in Nicaragua, the Sandinista government came up with agrarian reforms in the 1980s to help these people, however, the process was caught up with the Contra War¹²⁶ that caused complications over the land distribution, rendering properties with the problems of multiple ownerships.

The following subsections, the first two sections are to discuss the history of the agrarian reforms Nicaragua has experienced in order to better understand the current situation, which is explained in section three. Then, section four provides details and explanation of relevant laws relating to land and property rights in the Nicaraguan Constitution. Finally, examples in relations to land use are elaborated in section five.

4.2.1. The Sandinista Agrarian Reform since 1979

The Nicaraguan government began land reform after the Sandinista National Liberation Front (FSLN) overthrew the Somoza regime in 1979 to 1989. The attitudes and means of the Sandinista government in accordance with the agricultural structure and profile analysis of the nation were to provide the peasants with arable land to produce agricultural goods for export. The reform was to be carried out in stages of theoretical foundations, cooperate with

¹²⁶ Contras were military right-wing rebels that fought against the socialist Sandinista party through 1979 to 1990. The group was allegedly financed, trained and advised by the U.S., which provided weapons via Iran.

technology talents and invest funds on the basis of the existing agriculture to improve the problem of unequal distribution of rural land and improve the lack of land security for tenant farmers, such as the excessive cost of renting lands and the lack of funds of farmers to invest in machinery and equipment. Although the implementation of this land reform can be regarded as fruitful in the history of Nicaragua, it cannot be regarded as very successful in politics, agriculture, and economy. It did not transform the country into the industrial society like the land reform implementation in Taiwan, which pushed the country forward to developing country status.

Among the one of the top priority of the agrarian reform was to cultivate land, and the main method used was to redistribute the arable lands equally to the poor farmers. The agrarian reform usually refers to the transfer of land ownership from a small number of wealthy landowners with large amount of lands to the famers whose job is to cultivate them and harvest agricultural products. The expropriation of arable lands and private arable lands by the government were to provide peasants with the access of lands to fulfill the following three goals: 1) self-sufficiency in national food production, 2) increase agricultural exports in exchange for hard currency, and 3) promote agro-industrial development to increase the value of farming production.¹²⁷ The government invested huge amounts of capital in industrial production to promote the national economic development. The transformation of land worked by cooperatives was also part of the plan of the reform to increase the levels of productivity, which is reflected on the Sandinista propaganda of “spirit of solidarity and cooperation”¹²⁸.

After the end of the 1979 revolution in Nicaragua when the leftist Sandinista government won and took over, it emphasized on the redistribution of income, coexistence of the public and

¹²⁷ Puig Salvador Martí i (2001). *The Origins of the Peasant-Contra Rebellion in Nicaragua*, p. 5

¹²⁸ Solidarity was and still is one of the key features the FSLN party promotes under President Daniel Ortega.

private sector, reduction of social class inequalities, improvement of the ability to repay foreign debt, and improve the living conditions of the poor. During the process of the agrarian reform, some compensations were given corresponding to the transfer of lands to the original owners, ranging from a small amount to the actual value of the land, so that the government could purchase the surplus of lands that were idle or abandoned in the rural areas from owners living in the cities, the countryside, or even from foreign countries that has fled due to the violent tensions caused by the war, and then resell these lands to the landless peasants for productive use, so that they have their own land to use and harvest.

Under the Sandinista government, the National Union of Farmers and Ranchers (UNAG) was established in 1981 to voice and represent the small and medium-sized farmers and push for the realization of the land reform and redistribution of land to the farmworkers with part of the pro-Sandinista rural middle class and to the poor peasants. The organization, which was backed by the Sandinistas, was the only form of organization in Nicaragua that represented the large majority of the farmers and thus the government had total control of the agrarian reform. Under the reform, it nationalized properties previously owned by the Somozas and redistribute lands that were left unused or abandoned to landless farmers to increase productivity in the agricultural sector. The Sandinista government, however, confiscated properties out of the jurisdiction through coercion in some cases, accusing landowners to be related to or a supporter of the Somoza family, and expropriated lands from their opposition. The Sandinista officials “did not use legal means to confiscate properties [...] they used brutal force. Whoever opposed them was simply killed,” addressed in a testimony by Roberto Argüello, President Emeritus of the Nicaraguan American Banker and Business Association.¹²⁹

¹²⁹ US Committee on International Relations (1995), pp. 86-93

The sizes of lands were not stated in the law for redistribution plans, but rather focused on ensuring that the lands given out were efficiently used. The government managed to acquire roughly more than 1.98 million hectares in total from private landowners. Of this amount, approximately 2,000 properties of arable land were confiscated from the Somoza family and their associates, constituting about 991,480 hectares.¹³⁰ The Sandinistas issued decrees 760 (Abandonment Law) and 782 (Agrarian Reform Law) to seize large and medium-sized lands that were abandoned or from owners who left the country and the lands that were mismanaged, which led to expropriation of about 1,450 properties, totaling 593,500 hectares.¹³¹ The government also purchased 1,050 properties, about 138,800 hectares through foreclosures on mortgages accounted by the State bank, and through what prior owners claimed to be sold off or confiscated under pressure.¹³² The remaining 1,360 properties, about 276,000 hectares, were confiscated through de facto occupation without upkeep of the law and from the people convicted of rebelling against the government.¹³³ Of the overall reform program, 35 percent of the arable land, about 450,000 hectares in total from large landowners,¹³⁴ were distributed to the farmers to work on, leaving merely 12 percent of land to the public sector (Everingham, 2001).

The land titles were given out to single household or multiple households working together as cooperatives without official registration into government archives or granting of land titles to the tenants. The new tenants would receive documents signed and stamped by local officials that granted them land tenure with the duty and responsibility to produce agricultural products for export, but not full ownership of the land (Tijerino, 2008). In addition, a law passed in 1986 regarding land productivity stated that if the land left idle or mismanaged,

¹³⁰ *Nicaraguan Property Disputes* (1995), pp. 19-21.

¹³¹ *ibid.*

¹³² *ibid.*

¹³³ *ibid.*

¹³⁴ <https://land-links.org/country-profile/nicaragua/#summary>

the government will confiscate and distribute these properties under the People's Property Area (Área de Propiedad del Pueblo, APP) to employ farmers and manage agricultural production (Rocha, 2010). The legal titles of confiscated properties, which were largely given to cooperatives, have not been officially registered to the current tenants but only allowed them to use it for production. By 1988, 58 percent of the reformed lands were held by cooperatives – where only about 55,000 of the 120,000 households had received legal titles¹³⁵ – while 40 percent were state-owned (Ceci, 2005). Most of the recipients of the reformed lands were owned by state companies and cooperative farms, and the farmers must work and produce results in order to have access to the lands (Merlet, 2002). This would later become a greater issue when the Sandinistas take the surprising loss at the 1990 election, which led them to quickly pass laws that granted land titles to the tenants, exposing further flaws of the land titling method Nicaragua has experienced under the Ortega administration.

By 1988, according to the former Minister of Agricultural Development and Agrarian Reform (MIDINRA)¹³⁶, Jaime Wheelock Román, he stated that the Sandinista agrarian reform distributed roughly 6,000 properties for a total of about 2.1 million hectares – about 1.63 million hectares distributed to about 80,000 families, who were granted agrarian reform titles to use the land productively but allowed to sell the land, and the remaining 495,700 hectares formed part of the APP as state farms, of which around 212,460 hectares were later abandoned due to the Contra War (Larson, 1993).

Through the guidance of the socialist party, governmental investment of tractors and irrigation system largely increased – “in 1987, there were 5,484 tractors working the land,

¹³⁵ Everingham (2001), p. 65

¹³⁶ An entity created by Decree No. 696 of April 4, 1981 as part of the “Reconstruction” program responsible for promoting development and social, economic and technological transformations of the agricultural sector in accordance with the general plans of the Government.

while 96,025 hectares were under irrigation” in comparison to 1978 in which 2,850 tractors were used and 63,880 hectares under irrigation¹³⁷ – to boost agricultural output, but it was unsuccessful due to the worsening state of the armed conflict. Private investment have been hit, many foreign investments withdrawn, foreign banks have stopped financing; thus, the land reform has failed to achieve the expected goals for economic development. There were many factors contributing to the failure of the land reform, but a major one was the constant pressure instigated by the U.S. and its obstruction to the process of political stability and economic development in Nicaragua.

U.S. Response toward the Sandinistas in 1980s

The United States did not support the FSLN, also known as the Sandinistas, as the new Nicaraguan government when it took power from 1979 to 1989. The reason is largely due to the U.S. fear of losing the benefits sowed under the Somoza regime and through the National Guard, where its interests, such as trade and capital, were protected. According to William Leogrande’s *Making the economy scream: US economic sanctions against Sandinista Nicaragua* (1996), the U.S. tried maintaining friendly relationships with Nicaragua under Carter administration after failing to replace a more moderate oppositional figure instead of the Sandinistas. The U.S. “pledged to provide foreign assistance to help rebuild its shattered economy”, but only under certain conditions—one of them being the strong opposition to acts of violence against another country—would the U.S. provide economic assistance. But before the end of Carter administration in early 1981, he suspended the aid because intelligence reports showed Sandinistas smuggling arms to the revolutionaries in its neighboring country at El Salvador.

¹³⁷ Puig Salvador Martí i (2001). *The Origins of the Peasant-Contra Rebellion in Nicaragua*, p. 9

The Reagan administration continued to suspend foreign assistance to Nicaragua. The president declared an embargo against Nicaragua, prohibiting all trade between U.S. and Nicaragua, and also attempted to isolate the Sandinista regime by restricting multiple financial aids from organizations such as the World Bank and the IADB while the Nicaraguan government was trying to repay its national debt left by Somoza. Most importantly, the Reagan administration was involved in the support and funding of the Contra militia—insurgency group that includes ex-members of the National Guard and supporters of the anti-Somoza revolution—to fight against the Sandinistas until December 1989, which according to Noam Chomsky’s *What Uncle Sam Really Wants* (1992), in the chapter *Teaching Nicaragua a Lesson*, was “a large-scale terrorist war against Nicaragua”. Chomsky highlighted that the insurgency of the Contras “ensured that Nicaragua could not demobilize its army and divert its pitifully poor and limited resources to reconstructing the ruins that were left by the US-backed dictators and Reaganite crimes.”

In addition, Chomsky mentioned that the U.S. was unwilling to provide economic assistance to Nicaragua when another natural disaster occurred in 1988. The impact of Hurricane Joan in Central America, according to the U.S. National Hurricane Center, affected Nicaragua the most out of all the Central American countries, displacing more than 180 thousand residents, destroying over 20 thousand homes, in addition to ruining major city infrastructures—roads, bridges, buildings, etc.—and arable lands which includes agriculture crops, livestock, and poultry.¹³⁸ The U.S. refused to send disaster relief while pressuring its foreign allies to send Nicaragua “very little aid”. Chomsky believed that the U.S. “wanted Nicaraguans to starve so we could accuse the Sandinistas of economic mismanagement [since] they weren’t under our control, Nicaraguans had to suffer and die.”

¹³⁸ Preliminary Report: Hurricane Joan By Dr. Harold P. Gerrish.

http://www.nhc.noaa.gov/archive/storm_wallets/atlantic/atl1988-prelim/joan/prelim02.gif

Under the constant pressure of the U.S. to Nicaragua throughout the 1980s, governmental, non-governmental, and foreign investment were not welcomed, the production levels were inadequate, the amount of sales was low, exports were scarce, and many Nicaraguan people migrated, plus the government had insufficient tax revenue and experienced fiscal deficits. In order to pay for huge public and military expenses, the Sandinista government issued more currency, which led the nation to experience a severe hyperinflation. Another reason for the unsuccessful transition to develop the economy was due to the effects of the long-term war against the Contras, causing major economic and social setbacks in the country. This led Nicaragua in dire need of a recovery plan and assistance from the U.S. instead of making them the enemy of the state, hence, the democratic transition in the beginning of the 1990s.

4.2.2. The “Lame Duck” Period of the Sandinistas

Since the Sandinista government did not expect to lose the election and thought that they would rule for a much longer time, it passed a series of laws to guarantee the properties to the current tenants during the outgoing period from February 25 to April 25 in 1990. The political stunt was known as the *Sandinista piñata*,¹³⁹ which mostly granted the redistributed lands to the current tenants and the state-owned land that the government has accumulated to the beneficiaries of the revolutionary party. Law 88 converted all land titles it had distributed over the past few years via the agrarian reform into full titles ownership to the tenants. In addition, Laws 85 and 86 allowed families that occupied the state properties to legally transfer the houses and assets into their possession as of late February (Larson, 1993). The implementation of these three laws locked hundreds of thousands hectares of land to the beneficiaries and supporters of the Sandinista party to protect their own interests.

¹³⁹ The *Sandinista piñata* was used to describe the way the Sandinista party took away large sums of land much like the festive action of breaking a piñata open to spill out its treats in which everyone around got a piece of the treats. This pivotal moment led the Chamorro administration in a course of reimbursing property compensations to former landowners that were demanding returns for the expropriated properties by the Sandinistas in 1980s.

According to *La Prensa*, it claimed that most of the lands taken away were rich in assets, in terms of motorcycles, farm tractors, military trucks, and luxury cars, and were also the most productive in respect to agriculture. The evidence of such robbery was speculated to be destroyed by the creators of the *piñata*, “we found the bank’s files obliterated [...] computers and documents had disappeared”, stated by the administrative director of the Housing Bank, Oscar Moncada (Ibarz, 2013). The specific sum of property passed into the hands the Sandinista and its supporters will never be accurately identified. However, the Office of Territorial Ordering (Oficina de Ordenamiento Territorial, OOT)¹⁴⁰, created under the Violeta Chamorro administration in late 1991 to review the assignment of urban and rural properties during the lame duck period of the Sandinistas, and discovered around 11,000 local beneficiaries of Law 85 and 100,000 of Law 86.

Therefore, the U.S. strongly backed the National Opposition Union (UNO), a coalition of parties formed to compete against Ortega in the 1990 election with Violeta Chamorro, who studied in the U.S. and was from a democratic party, as the rival candidate. The robust economic assistance by the U.S. to the UNO party, a total of US\$9 million to fund its campaign¹⁴¹ and an additional US\$49.75 million of nonlethal aid in effort to keep the contras intact,¹⁴² facilitated the outcomes of the election in favor of Violeta Chamorro. The decision to support the Chamorro administration was made to foster a regime that can open up the markets for the U.S. to control and benefit for its own economy. The market exploited by enterprises has caused the Nicaraguan economy to decline rather than grow.

¹⁴⁰ *Nicaraguan Property Disputes* (1995), pp. 19-21.

¹⁴¹ Sayed (2017). War, Violence, Terrorism, and Our Present World: A Timeline of Modern Politics Chapter “Nicaragua”.

¹⁴² Robinson (2019). Chapter, “Nicaragua”.

In response to the numerous protests and talks concerning property rights, the Chamorro administration agreed to privatize a portion of the state properties to the workers of the Farmworkers' Association, known as Asociación de Trabajadores del Campo or ATC, which has been a less conflictive process in the rural areas than in the urban areas.¹⁴³ According to the conclusion of the negotiation talks, the agricultural workers were given more than 30 percent of the rural properties under the APP that were redistributed into the cotton, cattle and coffee enterprises, as well as a similar percentage to the tobacco enterprise. The farmers were provided with a one year rental contract with the options to buy and receive loans with about 6 to 9 percent interests with a one year grace period depending on each circumstance of the clients.¹⁴⁴ While privatization of the rural lands has been processed quite smoothly, the return of properties to former owners, however, has been rather complex and continued to be a serious problem. For instance, many former owners would return from foreign countries once the country is relatively safe, and go on court to demand for compensations or reclaim their old properties with documents known as “papelitos”, the old property titles, resulting to about 1,000 properties being returned,¹⁴⁵ but not all court disputes have been successful.

Although Violeta Chamorro was elected president in 1990 to abandon the socialist policy and adopt a free market economic policy while amending the constitution, it did not make much progress in terms of economic development. A series of laws were passed from her administration to the transition of the Alemán administration to deal with land ownership issues, but the laws were applied only partially since her absence. It was until 1994 that the economic reforms gradually became more effective under Chamorro administration, leading the country back to democracy, but the road to democracy was not an easy one.

¹⁴³ Larson (1993).

¹⁴⁴ *ibid.*

¹⁴⁵ *ibid.*

The widespread corruption within Nicaragua all levels, for instance officials giving relatives advantages to gaining land tenure through preferential agreements or to gain advantages in transfer of land at the free trade zones, were benefiting the political leaders and the wealthy, rather than the poor, and thus, costing the nation its opportunity for economic growth and social stability. During the term under President Arnoldo Alemán from 1997 to 2002, widely known for charges of corruption and misallocation of economic aid following the Hurricane Mitch in 1998, launched a medium term plan for sustainable economic growth called the “1997-2000 Program of Structural and Economic Reform”¹⁴⁶ to adopt a more open attitude towards foreign investment to further expand public investment, stimulate consumer demand, and increase employment opportunities. The economic plan would also be continued by the Bolaños administration from 2002 to 2007, in addition to advertising anti-corruption and transparency policies, as the international demand for agricultural and livestock products increased, therefore economy grew out of recession to about 5 percent. Then, in 2007, Daniel Ortega, the left-wing Sandinista party, regained power in Nicaragua.

4.2.3. Current situation of the Land Reform

The land reform policy is implemented and enforced by the state to change the social and economic structure. The land reform is a policy to reduce poverty, allocate land in a fair, reasonable, and efficient manner, providing fair prices to producers, and provide food security for the people. The Sandinista government also has major achievements in meeting the needs of its people, such as mobilizing the masses to implement social democracy, improving national education, reducing illiteracy rates, building rural schools, and raising public health care expenditures, and the formation of the various social programs, such as the Zero Hunger program and provision of bonds, to increase productivity and women’s access to land.

¹⁴⁶ USA International Business Publications (2012). *Nicaragua Business Law Handbook*, p. 36.

After the reform, foreigners can purchase land and real estate freely, except for reserved areas, without any restrictions. However, due to the implementation of the Sandinista agrarian reform after the revolution, many lands ended up being occupied or owned by multiple owners, causing the need to verify the purchase and sale history records before actually purchasing it to avoid future property rights disputes. In the 1980s, when the government of Sandinistas was in power, the agrarian reform expropriated the land of the landlords that fled from war and redistributed them to the revolutionaries. After President Chamorro came to power in the 1990s, the former landlords returned to the country through legal channels or through the relations of the party and the U.S. to reclaim property or apply for compensation, however, some were unsuccessful due to insufficient evidence and lack of documentation.

As for the Nicaraguan state-owned free zone areas, are only rented and not sold. The monthly rent for a square meter factory is about 2 to 4 dollars. The private sector is built according to the needs of the enterprises, so the rent is relatively high, and the manufacturing businesses can invest in the purchase of land in the free zone areas or outside as needed, and apply for the permission to set up factories.

Since 2007, under the Ortega administration, a level of previous land reform tendencies has been engaged in again, focusing on distribution of land to benefit small-scale producers to improving the overall agricultural production in terms of self-sufficiency,¹⁴⁷ thus managing to reduce the demand of food imports. The self-cultivating farmers have a high willingness to produce, greatly increased productivity, and stabilized the grain supply with the technical and financial assistance of the government and international organization. The liberalization of

¹⁴⁷ Wilm, Johannes (2014). The Significance of the Agrarian reform in Nicaragua, p. 138.
<https://www.researchgate.net/publication/267153814> The Significance of the Agrarian reform in Nicaragua

agricultural land property rights can attract capital, technology, and labor as it increases the efficiency of agricultural land use since the close relationship between land and people is an important production on which humanity depends on.

4.2.4. Relevant Law Articles regarding to Land Rights

There a total of nine articles in the Political Constitution of Nicaragua regarding the rights of lands in Nicaragua,¹⁴⁸ seven of them being articles relating to the Agrarian Reform:

Title I: Fundamental Principles

Article 5 – *(regarding protection of stateless people)*

[...] The various forms of public, private, associative, cooperative, and communal property shall be guaranteed and encouraged without discrimination in order to produce wealth and shall serve social needs by operating freely. [...]

Title IV: Rights, Duties and Guarantees of the Nicaraguan People

Chapter 1 Individual Rights

Article 44 – *(regarding protection from expropriation and right to own property)*

The right of private ownership of movable and immovable property and of the instruments and means of production is guaranteed.

By virtue of the social function of property, for reason of public utility or social interest, this right is subject to the limitations and obligations imposed by the laws regarding its exercise.

The immovable property mentioned in the first paragraph may be the subject of expropriation in accordance with the law following the cash payment of fair compensation.

¹⁴⁸ Political Constitution of Nicaragua. Retrieved May 2020.
<https://nicaragua.justia.com/nacionales/constitucion-politica-de-nicaragua/>

In the case of the expropriation of uncultivated large estates for the purposes of agrarian reform, the law shall determine the form, quantification, installment of payments and interests that are recognized as compensation.

The confiscation of property is prohibited. Officials who violate this provision shall respond with their property at all times for any damages they may have caused.

Title VI: National Economy, Land Reform and Public Finances

Chapter 1 National Economy

Article 99 – *(regarding protection and promotion of land use)*

The State is responsible for promoting the country's integral development; as the manager of the general well-being, it shall guarantee the individual, social, sectorial and regional interests and needs of the nation. It is the responsibility of the State to protect, foment, and promote private, public, cooperative, associative, community, and mixed forms of ownership and economic and business management, in order to guarantee economic and social democracy.

The conduct of economic activities is primarily a matter for individuals. The leading role of private initiative which includes in a broad sense large, middle-sized, and small businesses, mini-enterprises, cooperative, associative, and other enterprises is recognized.

Chapter 2 Agrarian Reform

Article 106 – *(regarding protection of stateless people)*

The Agrarian Reform is the fundamental instrument for the democratization of property and the fair distribution of land, and is a means that constitutes an essential part for the global promotion and strategy of ecological reconstruction and the sustainable economic development of the country. The Agrarian Reform shall take into account the socially necessary man-land relationship; properties are guaranteed to the beneficiary peasants in accordance with the law.

Article 107 –

The Agrarian Reform shall eliminate large uncultivated farmlands and shall be implemented primarily with lands of the State. Should the expropriation of large uncultivated farmlands affect private owners, it shall be carried out in compliance with the provision of Article 44 of this Constitution. The Agrarian Reform shall eliminate any form of exploitation of the peasants, the indigenous communities of the country and shall promote forms of ownership compatible with the economic and social objectives of the country, established in this Constitution. The land ownership system of indigenous communities shall be regulated according to the law on this matter.

Article 108 –

Land ownership is guaranteed to all owners who work it productively and efficiently. The law shall establish specific regulations and exceptions in conformity with the goals and objectives of the agrarian reform.

Article 109 –

The State shall promote the voluntary association of peasants in agricultural cooperatives, without discrimination based on sex, and in accordance with its resources, shall facilitate the material means necessary to increase their technical and productive capacity in order to improve the living conditions of the peasants.

Article 110 –

The State shall promote the voluntary incorporation of small and medium agricultural producers, into the economic and social development plans of the country, both under associative and individual forms.

Article 111 –

The peasants and other productive sectors have the right to participate in defining the policies of agricultural transformation through their own organizations.

As per Article 44 of the individual land rights from the Political Constitution of Nicaragua, President Ortega sometimes sell or gift lands to Sandinistas revolutionaries when the original landlords of these lands were outside the country due to fleeing away from the violence caused in civil war. In addition, sometimes the revolutionaries would sell these lands for short-term economics, thus, the creation of multiple landownerships disputes in Nicaragua.

In 1979, after the Sandinista National Liberation Front (FSLN) overthrew the Somoza dictatorship, the Sandinista government started the agrarian reform that carried out until 1989 to solve the problems of uneven distribution of wealth and the disparity between the rich and the poor. The agricultural countries have to solve their problems of land reform, but adoption of socialism in Nicaragua is the main reason why the land reform was not as successful as the way it should work like in Taiwan and Vietnam. In addition to the domestic community not support the agrarian reform implemented by the Sandinistas and the United States interference to the country, the reform did not go as smooth as planned.

Land, people, and sovereignty are the three major elements that constitute a country, and are the elements of founding of a country. They are the root of all wealth. Economically, land, labor, capital, and entrepreneurs are the four major contributing factors of production. As the famous expression of Sir William Petty, “Labor is the Father and active principle of Wealth, as lands are the Mother.” Economically developed land is capital goods similar to commodities, and land use is complex and requires planning to maximize its benefits.

Land has the dual characteristics of resources and assets. Land resources refer to land as a factor of production and environment. Land assets mean that the land can be used as property, or property sold to obtain income. Land resources are converted into land assets. After privatization of land, land assets can be converted into land capital. Under the market economy, all land has the dual characteristics of resources and assets. Ownership of private land can be freely bought and sold, and land reform will transfer private capital from land to capital and invest in production to drive the industrial development.

To briefly explain and analyze the land policy:

Land transactions in Nicaragua include activities such as the sale of land, transfer of land, land mortgage, leasing of land, and other activities.

1. The sale of land rights of state-owned land in Nicaragua allows the state to act as the landowner, monopolizing and controlling its market, to assign land rights with a prescribed service life to the developers in accordance with the investment plan of the government. The government has control over the construction scale, the development plan, the area and location of the land, and the use method. For instance, the establishments of the free trade zones are state-owned.
2. The transfer of land rights of state-owned lands in the country require the developers to act accordingly to relevant government regulations and contract requirements of the land, carrying out specific development and construction plans designed by the government. The developers then have the right to transfer, lease or mortgage the land and the constructions above the ground to potential buyers and users in accordance with the intended uses discussed in the government's development plan. The transfer of land rights and development of the land is regulated by the government to develop necessary facilities in the open market.

3. Private properties and lands can be sold freely by the general public. The prices are negotiated by both parties according to supply and demand system, thus, the prices of properties and lands may vary depending on the demand, quality, location, and are determined by the market.

In some cases, the first two land rights still have the possibility of being manipulated by political leaders, officials, and their relatives. They have gained leverage through illegal interests by purchasing lands cheaply, receiving transfer of land without actual payment, and have always been criticized by the public. Not much can be done against the discovery of certain politicians and developers holding a number of land property rights, luxury compound, holiday villas, etc. These land speculations are one of the reasons for the widening gap between the rich and the poor in Nicaragua.

To construct a unified, open, competitive and orderly land market system under the free market economy model, the government should strengthen and legitimize the legal sale, lease or mortgage of land according to market-based mechanism. The land market is the transaction market for land property rights. Generally, there are three types of property rights: land ownership, land rights, and contractual management rights, as well as other laws, such as the priority purchase rights and the land rights to foreign enterprise. There is also land acquired for public construction, and peasants whose lands have been requisitioned must be compensated fairly and completely, without them having to suffer any losses. Compensation includes loss of land ownership and loss of labor rights.

State-owned land rights in Nicaragua are assigned to land users within a certain period of time, and require them to pay the land right transfer fee to the state. The maximum service life of the transfer of land rights is determined by law. Land users can apply for renewal of the land

rights after the expiry, and do it through agreement, bidding and auction. Generally, lands with better locations, better investment environment, and those that are evaluated with high return on investments will use bidding or auction methods. For ordinary lands, agreement methods are commonly used to realize the use of land resources for production or construction, and other production and living needs to meet their needs for land resources.

The state-owned free trade zones in Nicaragua is only rented and not sold. Currently, the monthly rent per square meter of the factory is about 2 to 4 US dollars. As for the private free zones area, the cost of setting up factories according to the needs of manufacturers is higher, and the monthly rent per square meter is about 4 to 6 US dollars. Investment companies can also set up factories in free zone industrial parks or self-purchased the land according to their investment needs, and can also apply preferential conditions in free trade zones. The enterprises and manufacturers that invest in these zones and areas will provide the fiscal revenues for the government, in which it could later invest in the development of public infrastructure and development programs.

In terms of land, the land prices vary greatly depending on the region. For example, in the capital city Managua, business area is about 150 to 300 US dollars per square meter, and the prime lot is about 450 US dollars per square meter. Residential area is about 70 to 200 US dollars per square meter; other urban land is about 30 to 50 US dollars per square meter; rural lands are about 30 US dollars per square meter. Due to the social and economic crisis in April 2018, the price of land sold or leased so far largely encountered a downward trend. As for foreign investment, except for the protected areas, land and real estate can be purchased freely without any restrictions. However, because of the nationalization policy implemented by the Nicaraguan government after the revolution, the land has problem with multiple ownerships, resulting into land disputes and conflicts, where some lands were granted to the revolutionaries

of the civil war. When buying land and housing property rights, one must ask lawyers to carefully check the purchase history of the land, so as not to encounter property rights disputes and even lose money.

In 2013, the requisition of land for the construction of the canal plan in Nicaragua estimated that as many as 120,000 people could be relocated, and the amount of compensation for them was not enough. Individual real estate evaluated separately with the owner, and the amount of compensation calculated was based on the lower range of the taxable value or market value of the property, so the landowners were worried that the future compensation will not meet the actual value of the property, which will be insufficient for them and their families to find suitable relocation. Among them were mainly local peasants and indigenous people, passing through the tropical rainforest of at least 40 villages, threatening to affect the environment and the people residing there, but the government pledged that the canal plan would yield prosperous profits for economic development, so it must be imposed. In the process of land acquisition by the family members of Ortega, the public were very dissatisfied with the blatant manipulation of land acquisition since land price evaluation was largely influenced by the government.

The liberalization of the land market should not allow the government any administrative pricing power and implementation of market pricing of lands. A complete market system should include consumer markets, capital goods markets, financial markets, land markets, real estate markets, labor markets, technology markets and other market mechanisms to be fully effective. Land is the basic production factor of mankind, and only by realizing its uses according to the supplies and demands of the market can it attract foreign investment for economic development in a free market system. Land development is an investment activity with a huge investment and a long payback period. The development of the real estate industry

is inseparable from the support of the financial industry. Most land investors do not rely on personal capital for land development. They must rely bank funds to provide bank finance, land mortgages, land bonds and other forms of land finance, so that the land market can gain more traction. Leading the healthy development of the land market requires the establishment of supporting land laws and regulations, and the basis for the operation of the land market to attract more capital.

4.2.5. Other relevant examples relating to land

Nicaragua is abundant in forestry resources. In 2003, Nicaragua announced the “Forestry Conservation and Sustainable Development Law” to provide about 3.5 million hectares of land with “forestry tax concessions”, which are preferential property tax rates and income tax exemptions, to encourage nationals and foreigners – a total of 16 manufacturers – to invest in planting trees, of which 22,000 hectares were used to plant high economic value trees such as mahogany, teak, cedar, etc. The investment in artificial forests to produce high-quality timber can be legally logged, bought and sold as resources by the investors. However, after 2006, the government lost 1.9 million hectares of natural forest in Nicaragua because of illegal logging, and it is estimated that about 80,000 hectares of forest land were lost each year. Therefore, the government issued a ban on forest harvesting for 10 years since 2006. The government resumed harvesting period for few months per year since 2009, but later imposed the prohibition of harvesting, transporting, and exporting the forest resources again in 2016. The prohibition affected the rights and interests of legal plantation investors, especially, foreign investors; hence the government was under pressure to protect the legal rights of the investors so as not to have negative impacts toward attracting foreign investment.

In 2007, under the guidance of the International Cooperation and Development Fund (ICDF) from Taiwan, Nicaragua established the “Seeds of Hope International”. Martínez, director of the Nicaraguan Technological Institute of Agriculture (INTA), pointed out that this plan helps women to become the main body of production instead of hired workers. The fruits are sold in supermarkets. Although the cultivated lands are leased, they can obtain profits to improve the quality of life. In the future, the Nicaraguan government will likely establish a policy for banks to provide land so that these women can grow crops on their own land without having to pay the cost of using the land.

The agricultural land reform realizes farmers' land ownership and privatization of agricultural land. The ownership of agricultural land can be freely transferred to expand the scale of agricultural land management. A Taiwanese businessman in Sébaco, Nicaragua has a lot of agricultural land to grow rice and engage in rice milling, for example. Ownership of property in agricultural land can encourage greater and more efficient production than leased property. In addition, after the Sandinista Party came into power, the land restructuring and sale of public land were granted to landless peasants. The government supported the establishment of cooperatives in Sébaco to collectively work on rice production and rice supplies domestically in order to reduce food demand from rice imports. Sébaco is a relatively special area in the land system of Nicaragua. The indigenous commission only provides the right to use the land for sale without permanent ownership. It has a ten-year lease with option to extend the contract via the permission of the commission, and the owner has to pay rent to the committee each year. There are also private lands that can be held permanently, freely traded and paid annual tax to the municipal government.

4.3 The Social Security Reform under Ortega administration

International organizations such as IMF, Moody's, Standard & Poor's and others have issued an annual reform that alerted Nicaragua in 2017, recommending that the Nicaraguan Social Security Institute (INSS) conduct a research on its social security system as soon as possible. In addition to reforms initially requested by IMF in the energy sector and the central bank of Nicaragua in 2007, the future options to develop social security was already warned by the international organization in order to facilitate the poverty reduction strategy and improve productivity.¹⁴⁹ Proposals, such as reducing the retirement benefits and delaying retirement age were suggested to avoid national bankruptcy. If the pension system did not change, the liquid assets in the reserve fund of the INSS will be fully exhausted by 2019 according to its report and the IMF's, which may cause a national financial crisis. In order to improve the urgency of the financial deficit, the Nicaraguan government discussed with enterprises, labor unions, and the IMF about necessary steps to avoid the bankruptcy of the social security system from 2017 to 2021. As a result, in January 2013, it prepared a "retirement reform plan" and submitted it to Congress for review.

The main contents of the retirement reform are as follows:

1. The current pension eligibility age is increased from 60 to 65 years old.
2. The insurance premium is extended from 750 weeks to 1,500 weeks.
3. The insurance premium rates for old age, disability and death is increased from the current 11 percent to 24.7 percent.
4. The premium sharing ratio of labor and employer is increased from the current 4 and 7 percent to 9 and 15.7 percent.

¹⁴⁹ Nicaragua: Letter of Intent, Memorandum of Economic and Financial Policies, and Technical Memorandum of Understanding. August 24, 2007. <https://www.imf.org/external/np/loi/2007/nic/082407.pdf>

As a result of the social security reform, 68 percent of the people opposed the new retirement reform system, and criticized it as an annual reform plan that costs more and receives less; therefore, it was not successful.

As of April 2018, the Ortega administration issued a decree to revise the social security system without communicating with labor and enterprises. According to the INSS, this new reform is divided into three parts:

1. The labor contribution rates have increased from the original 6.25 to 7 percent, and the contribution rate of employers has been raised from 19 to 21 percent, which will gradually increase to 22.5 percent in 2020.
2. Calculated according to the actual salary, impacting the local senior executive class.
3. For retirees, 5 percent of pension benefits deduction will be used to pay for medical plans and share of the “senior health insurance”.

The Nicaraguan retired population and the aging population is increasing, while the workforce of 3.2 million is in the country, only 760,000 workers have been insured by social security system, coupled with the stagnation of the economic development of the country, INSS has suffered losses for many years since 2013. Without the reform, the system would be directly absorbed by the government, which will definitely affect the public finances of the government; hence, the social security must be reformed. Countries around the world are under pressure to reform the pension system. It is necessary to ensure the economic security of the elderly while taking into account the financial health of the pension fund and not leaving debts to future generations.

The pension reform scheme of each country often include – increasing premiums, reducing benefits, and delaying retirement. This issue is very difficult to be fair, and it tries to

be fair for every citizen in order to satisfy the different occupations, different ethnic groups, and different classes. The major shortcomings of the social insurance and pension systems are the high payments, low return rates, and coverage of multiple old-age pensions for the increasing life expectancy of the people, resulting in dissatisfaction because salary earners have to pay more premiums while the pension receivers are given less money. The Nicaraguan citizens believed that the Ortega administration caused the pension system to go bankrupt due to his pursuit for private investments for personal gains and improper management practices under his long tenure, plus enduring suppression and dissatisfaction suffered by the masses, which resulted into a large-scale protests and outbreaks within the nation.

The violent crackdown by the authorities resulted in more than 300 deaths and more than 2,000 injuries. The government and civilians both committed crimes against each other, causing social unrest where police and civilians were wounded and some demonstrators arrested. Eventually, Ortega announced the withdrawal of the annual reform plan, but it was too late, the Nicaraguan civilians were upset and demanded for his removal from office. But the fact is, the reform is justified – for individuals to enjoy the benefits of social welfare, one must pay the price first, and only if the pension reform succeeds, it would solve the many subsequent problems related to political, economic, and social reforms across generations and social classes. In view of the serious loss of INSS, Ortega wanted to launch the reform plan in 2018, but it was cancelled due to public demonstration. All sectors expected INSS to re-launch the new plan, and hopes that the contribution rate of the social security reform plan will be set according to the consensus reached by the people, the business community and the government across the country.

The INSS announced on January 28, 2019 that it would amend the rules of the Nicaragua Social Security system. The reform is as follows, starting February 1, 2019:

1. The contribution rates of the employers, of the ministers of any religious group and of the state will be increased.
2. According to the new calculation of the system, the employer contribution rates will be increased from 18.25 to 21.5 percent or 22.5 percent (with more than 50 employees).
3. The employee contribution rates will also be raised from 6.25 to 7 percent.
4. Revision of the retirement benefit system - reduce the basic retirement benefit rates and the maximum retirement benefit rates to reduce pension expense.

In particular, increasing of cost on companies that employ more than 50 people can easily lead to disagreements between the business community and the government. If the operation cost of a company is heavy, there will be less incentive to hire and to attract foreign investments, which will increase labor unemployment in Nicaragua.

On September 21, 2016, the United States passed the Nicaragua Investment Conditionality Act (NICA Act), which prevented the Nicaraguan government from obtaining or using loans from international organizations. The U.S. has veto power in the IMF, but not in the World Bank and IADB. The main source of loans for Nicaragua has gradually shifted from these international organizations to the Central American Bank for Economic Integration (CABEI) in recent years, where the U.S. has no leverage since it is not a member, so that it cannot affect Nicaragua. This bill will limit and reduce its sources of debt finance, and donations and foreign aid from developed countries, which will affect the overall economic and financial plan of the country. Fortunately, foreign investment has increased in Nicaragua in recent years. The IMF released the Global Economic Outlook in 2018, which estimated that Nicaragua's economic growth rate in 2018 was 4.7 percent, but the socio-economic crisis that broke out due to the social security reform case caused an economic loss of US\$600

million. The government debt has expanded sharply, and the Central Bank of Nicaragua estimated that the government debt at the end of 2018 reached to US\$6.885 billion, an increase of 6.13 percent from the 6.487 billion at the end of 2017, and the newly added foreign debt was up to US\$561 million.

The main source of loans for Nicaragua in 2019 was from CABEL, amounting to about US\$585.34 million in infrastructure loans to ensure the financial stability of the government and to strengthen the competitiveness in the country. The loans were in separated in two parts to solve the urgent needs in the major cities, such as Managua, Masaya, Chinandega, León, Jinotepe, and Matagalpa. First, about US\$333.87 million to finance roads, highways, and expansion program to connect cities and facilitate the transportation of production, trade and tourism. The second, about US\$251.47 million was assigned to improve the drinking water and sanitation systems of the cities.¹⁵⁰ The loans also target to strengthen the public administration, airports, hydropower projects, the living conditions of the rural areas, and so on. The U.S. is a major trading and investment partner of Nicaragua, but since the NICA Act has caused the deterioration of the relations between the two sides, Nicaragua should seek to reconcile with the U.S. for the sake of its economy and the people.

The purpose of the establishment of the IMF is to help stabilize the global economy, ensure financial stability, and promote international trade. However, the slow response of the IMF to the crisis, often when a country has been deeply affected by the economy, is when the IMF lends a helping hand, such as the financial situations in Argentina and Kenya, which have worsen and going into financial crisis. Due to the Nicaraguan socio-political and economic crisis in 2018, investment, consumption, and access to credit have all been negatively affected.

¹⁵⁰ “Nicaragua: \$585 Million for Public Infrastructure.” *CentralAmericaData*, 18 Oct. 2019, www.centralamericadata.com/en/article/home/Nicaragua_585_Million_for_Public_Infrastructure.

With the subsequent impact of the coronavirus pandemic in 2020, the IMF predicted that the Nicaraguan economy will decline by 4.3 percent, but should resume growth by 1.9 percent in the year 2021 according to its preliminary calculations.

External debt has always been a big problem for the Nicaraguan government. As Nicaragua is a diplomatic ally of Taiwan, it has donated US\$3 million to the National Police and provided a 20-year loan of US\$100 million to the Nicaraguan government at the end of 2019 as a commercial loan for business reconstruction, and assistance based on humanitarian considerations, to help the people of Nicaragua, and hope that the local people's life and social order may be on the right track as soon as possible. Pension reform is not an easy task to accomplish; as Taiwan had faced a similar problem, and hope that the Nicaraguan government will utilize the economic aid properly. If a country has money, it can invest in public construction to promote economic development and create job opportunities, where money can be invested in insurance and social security, companies can afford to share insurance premiums, and the government can afford to pay the national insurance premiums through the received taxes. This concept can also be regarded as a model of circular economy where the money cycles within the economy of a nation.

4.4 Summary and Discussion of Chapter 4

The policy reforms are inspected in this chapter to further understand the economic atmosphere President Ortega tried to accomplish. Although the food security policy were quite successful, the U.S. has repeatedly criticized the Ortega administration for lack of transparency regarding the use of ALBA funds via Venezuelan bilateral assistance to the government's fiscal spending toward the social programs, which would often be guided

through its state-run enterprises¹⁵¹ According to IMF (2011), there were 58 complaints made by its citizen that reported any illegal actions, misuse of public funds, or lack of transparency in the public administration of the government. Due to doubts of fiscal transparency, the IMF suspended temporarily its loan disbursements of the PRGF arrangement to Nicaragua on September 10, 2008, for instance, but later entered another round of negotiations in July 2009 to reinstate the discussed disbursements.¹⁵² The action of suspending funds by the IMF would become a trend where international donors, including investments from Europe would also suspend direct budget support to Nicaragua, leaving the government vulnerable with the tight budget to work with, therefore adjusting the Social Security of its nation.

Even though falling short in the economic, social, and political aspects, there are still possibilities for improvement of the Nicaraguan government to help stabilize the social circumstances in order to boost its economy. The land reforms, for instance, the IMF (2011) has identified that the Nicaraguan government seek reconciliation and national unity to ensuring security of property ownership, but it's accomplished with the purpose to increase production level for exports and attracting foreign investments. The Nicaraguan government has worked with the regional governments of the Caribbean coast, its autonomous region, to design appropriate legal framework that is able to be implemented nationwide via property regularization plan to contribute to comprehensive property titling in order to put an end to land ownership and use disputes (IMF, 2011). As many properties in Nicaragua were not registered appropriately since prior the Somoza dictatorship and in the revolutionary period in 1980s to the democratic transition in 1990s, the estimates and localization of the state lands are not available. There was an estimated 1.98 million hectares of land reformed under the Sandinista agrarian reform in the 1980s, expropriated about 35 percent of land held by large

¹⁵¹ "Nicaragua (07/09)." *U.S. Department of State, 2009-2017.state.gov/outofdate/bgn/nicaragua/126431.htm*

¹⁵² *ibid.*

landowners, which was a total of 450,000 hectares, and then redistributed 40 percent of it to cooperatives, 34 percent to formed state-owned agro-industrial companies, and 26 percent to landless farmers.¹⁵³ Most importantly, in accordance with the Political Constitution of Nicaragua, the law guaranteed the right to private land ownership when referring to Article 44 mentioned in the chapter four under Relevant Articles regarding Agrarian Reform in section two. In addition to Article 108 that certified private land ownership to all owners that use their land productively.



¹⁵³ <http://land-links.org/country-profile/nicaragua/#summary>

Chapter 5 – Conclusion and Suggestions

This thesis explores the impacts of the policies implemented and pursued by President Daniel Ortega from his second term in 2007 to his fourth term in 2020 to understand the magnitude to which the decisions made under the Ortega administration have contributed to the economic trends of Nicaragua in relations to the market economy that he insisted to maintain in order to attract foreign direct investment and loans from the international organizations and businesses around the world. In the first chapter the background information of Nicaragua is provided, as well as concepts relating to market economy, transition of planned economy (or socialism) to a market economy, which depends on financial and managerial assistance from western international companies, such as the IMF and the World Bank, and concepts of CE that could potentially be implemented partially in the already established market economy of Nicaragua.

In addition to providing a background of the issue that is being studied regarding to the effect to the economic development in Nicaragua, the first chapter listed the research questions that will analyzed addressed in this thesis:

1. Why President Daniel Ortega maintained the free market reforms previously implemented by his political oppositions?
2. Why was Nicaragua unable to overcome its economic status or succeed in terms of achieving an economic development under the Ortega administration?

In short, President Ortega wanted to attract capitals via FDI and economic assistance through the implementation of free market strategy, its free trade zones and free zone industrial parks to help boost the economic development in Nicaragua, but due to the political

instability of implementing reforms, such as land reform and social security reform, as well as pursuit of short-term oriented goals of favoring larger projects, such as the expropriation of land to the proposed Nicaragua Canal and the lack of countermeasure systems to protect domestic production from the maintenance of the free trade agreements, led to economic vulnerabilities.

In 2007, President Ortega of the Sandinista Party governed for the second time, abandoning the extreme socialism of the 1980s, devoting to attract foreign investment, opening the market, creating jobs, eradicating poverty, and promoting the Zero Hunger program and the provision of credit via bonds from “Production Bank”, known as Banco Produzcamos, that administered the low-interest, micro-loan program which provided small loans. The policy shifted to more moderate social and economic reforms, and through economic and social development strategies that improve the lives of the middle and lower classes, mass support of the people was quickly expanded.

President Ortega adopted pragmatic diplomacy and substantially adjusted its foreign policy to attract foreign investment and formulate the public investment and FDI programs for economic development. However, Ortega went ahead to strengthen the diplomatic and economic relations with Russia, Iran, Cuba, Venezuela, and other socialist Latin American countries, as well as with African countries, effectively reversing the efforts of pro-American policy the rightist government established over the past seventeen years. The country in 2007 had the highest inflation rates in Central America, and the annual inflation rate reached 11.1 percent, while the economy experienced a 5.1 percent growth, and the per capita income reached US\$1,327.

The world situation is met with uncertainty, the global financial crisis in 2008 and the impact of the global economic recession in 2009, the Nicaraguan economic growth rate fell from 3.4 percent growth to an economic contraction of minus 3.3 percent, respectively. As for the per capita income, it slightly decline from US\$ 1,498 to US\$ 1,445. Fortunately, most industries in Nicaragua recovered in 2010. The export volume exceeded US\$2 billion for the first time in 2011, the economic growth rate was 6.3 percent, and the GDP was over US\$9.6 billion, while the per capita income reached US\$1,630.

In November 2011, by amending the constitution, Ortega was re-elected again with 62 percent of the votes to serve for a third term. On January 28, 2014, the National Assembly of Nicaragua passed a constitutional amendment to abolish the restriction on the presidential term, which will allow the current President Ortega to be re-elected indefinitely. The opposition criticized this constitutional amendment and stated that it would endanger the democracy and the development of the country, saying that the constitutional amendment only served purpose to satisfy the interests of the current president. During this term, the Sandinista government insisted on maintaining the relationship with the socialist multilateralism of ALBA advocated by Venezuela since 2007, and continued to promote protection of labor, eradication of poverty, market liberalization, expansion of exports, and economic policies that attract foreign investment and increase employment. In 2012, the economic growth rate grew to 6.5 percent due to the mild recovery of the major markets in the United States and Latin America, which helped create jobs and improve poverty, and both consumer and business confidence indexes rose, reaching to the highest level over the years. However, according to a World Bank research in 2015 reported that 37 percent of the population in Nicaragua in 2012 was still suffering from chronic poverty.¹⁵⁴

¹⁵⁴ Vakis et al. (2015). *Left behind: Chronic Poverty in Latin America and the Caribbean*

The main foreign exchange income of Nicaragua came from the export and tourism sector, international donations and foreign direct investment. Remittances accounted for an important proportion of the national GDP, in 2012, the national overseas remittance income reached a new record of about US\$ 1.014 billion, indicating that the country lacked job opportunities since many citizens crossed to neighboring countries seeking for better opportunities, such as in Costa Rica, in order to make a living abroad and remit their income to provide for their families. The Nicaraguan government used international donations to formulate the 2013-2016 “Financial and Economic Plan” in hope to eliminate gap between the rich and the poor, and improve the lives of the poor as the upmost goal of the decade. After that, in November 2016, the total amount of the “Strengthening Investment Development Policy and Plan” for 2017 to 2021 was about US\$5.2 billion, and the economic development policies promoted by the Nicaraguan government in the next five years included infrastructure construction, energy and airport expansion and other 33 projects to welcome financing from countries and enterprises.

- According to statistical analysis, the 5-year average of Nicaraguan economic growth rate from 2013 to 2017 was about 4.8 percent.
- In 2008-2012, foreign direct investment industries accounted for the largest 26.4 percent of energy investment in the five years, followed by telecommunications 17.3 percent, plus 13.4 percent in export zones.
- In 2012, the proportion of total FDI with the highest amount came from the United States, 17.5 percent, followed by Mexico, 15.8 percent, Canada, 15.2 percent, and Venezuela, 14.8 percent, which helped improve the overall development of the economy in Nicaragua.
- In 2012, FDI increased by 32.7 percent compared with 2011, with Venezuela accounting for the most with 16.4 percent, which increased many job opportunities. The Nicaraguan

economic growth will be greatly improved, if the living standards of Nicaraguan residents can be improved by provision of these opportunities.

The United States, Venezuela, Canada and Central American countries are the main markets for Nicaraguan exports. The preferential treatment of the CAFTA-DR between the United States and Central American countries is very beneficial to the foreign trade of Nicaragua. Because of its historical origins and geographical location, Nicaragua has always taken the United States as the main export target, where other Central American countries accounted for 9.6 percent of the total, indicating that the Nicaraguan export market is excessively concentrated in and depended on the neighboring American countries.

According to the special and differential treatment (SDT) clauses for the least-developed countries, the 4th WTO Doha Ministerial Conference allowed Nicaragua to maintain the existence of free trade zones after 2008. There are no restrictions on trade subsidies, which helped it continue to attract foreign investment. In 2012, Nicaragua actively pursue for the developed of renewable energy, renewable energy accounted for 47 percent of the domestic power generation (hydropower plants: 9%, geothermal plants: 14%, wind power plants: 6%, biomass power plants: 6%, solar energy: 12%). In 2014, it increases to more than 50 percent (geothermal: 16%, wind: 15%, hydropower: 12%, biomass power: 7%),¹⁵⁵ and the government has set to reach the target of at least generating 74 percent from renewable resources by 2018 and 90 percent¹⁵⁶ by 2020 (IABD, 2015). In addition, due to the tax exemption benefits to provide incentives to invest in the renewable energy of Nicaragua, the initial investment cost of Nicaraguan renewable energy manufacturers can be reduced by 15 to 20 percent, effectively attracting international companies to settle in, creating about 6,000 direct employment

¹⁵⁵ International Renewable Energy Agency (2015). "Nicaragua Renewables Readiness Assessment", p. 3

¹⁵⁶ Also mentioned in the World Bank's news in 2013, available at:
<http://worldbank.org/en/news/feature/2013/10/25/energias-renovables-nicaragua>

opportunities, and driving economic growth. In order to save oil imports and consumption, Nicaraguan economic development and the protection of the environment is driven by the efforts of building the one of the largest solar park in Central America, with millions of capital investment coming from Israel,¹⁵⁷ and actively invest in the “Sustainable Electrification and Renewable Energy”¹⁵⁸ program to increase the domestic penetration rate of renewable resources, or percentage of renewable resources used into the electricity supply mix.

In 2018, Fitch downgraded the country's long-term foreign currency rating from B+ to B, and then to B-. The April 2019 and April 2020 ratings stayed the same, at B-. Mood's downgraded the long-term foreign currency rating of the Nicaraguan government from a B2 to a B3 on February 14, 2020. Credit ratings all believe that the future outlook is negative and is due to the experience the country is facing via social, political and economic crisis. The social unrests have serious negative impacts on the overall economy, the Nicaraguan economy is an investment-driven site, and when the investment environment deteriorates, the potential for economic growth will decline significantly. In 2019, the Nicaraguan government increased wage, reduce expenditures, but the U.S. passed the 2016 NICA Act, and due to the nature of the bill, it reduced the much needed external financing to the country, thus shifting to multilateral countries for non-concessional loans to combat fiscal austerity and other policies. If political stability, financial stability, good social security, and corruption are not serious, the future outlook for Nicaragua may change from negative to a more stable growth. The economic environment in Nicaragua is expected to recover in 2020 according to experts and officials, and the international oil price will rebound. It is projected that the annual increase rate of the consumer price index will rise to 5.39 percent. However, the spread of the new coronavirus

¹⁵⁷ Nicaragua will have the largest solar plant in Central America. *El 19 Digital*. June 18, 2019 <https://www.el19digital.com/articulos/ver/titulo:91296-nicaragua-tendra-la-planta-solar-mas-grande-de-centroamerica>

¹⁵⁸ Sustainable Electrification and Renewable Energy Program. *Nordic Development Fund*. November 22, 2019 Available at: <https://www.ndf.fi/node/31>

pandemic has lost control and worsened; causing the not only caused the global economy to halt, but labor force decreased due to severe risk to national health. How negative is the economic impact going to be is the question Nicaragua is facing right now amid combat of the pandemic and the unresolved social unrest against the Ortega administration.

Based on the following economic indicators for 2012 and 2017 collected through the research, the economy of Nicaragua did not improve much after five years:

- Imports were greater than exports, resulting into a trade deficit of an average US\$5,879 million in imports versus US\$2,496 million in exports
- In 2017, the import value was greater by nearly US\$240 million compared to 2012
- The export volume in 2017 decreased by nearly US\$124 million compared to 2012
- In 2017, GDP increased by US\$3,306 million compared to 2012
- In 2017, per capita income was \$421 higher than in 2012
- Consumer price index increased by 43.5 points, meaning purchasing power decreased

There is still much room for improvement in Nicaragua's overall economy.

Economic overview and important economic indicators for 2012:

The exchange rates of 1 U.S. dollar yielded 24.13 córdobas.

- Economic growth rate: 6.5 percent
- Unemployment rate:¹⁵⁹ 5.9 percent
- Average national income per capita: \$1,760
- Foreign exchange deposit: \$1.887.2 billion
- External debt balance: US\$8.6 billion
- Inflation rate: 6.62 percent

¹⁵⁹ Retrieved from IMF, available at:

<https://www.imf.org/external/pubs/ft/weo/2020/01/weodata/weorept.aspx?sy=2012&ey=2020&scsm=1&ssd=1&sort=country&ds=.&br=1&pr1.x=86&pr1.y=10&c=278&s=LUR&grp=0&a=>

- Export value: US\$2,671.9 million (excluding free trade zones)
- Import value: US\$5,854.1 million
- Consumer price index: 161.1 (increased by 6.6 percent from previous year)
- The scale of GDP expanded to US\$10,508 million
- FDI, net inflows grew 7.29 percent

Economic overview and important economic indicators for 2017:

The exchange rates of 1 US dollar yielded 30.78 córdobas:

- Economic growth rate: 4.7 percent (up from the 4.6 percent in 2016)
- Unemployment rate: 3.7 percent (down from 4.5 percent in 2016) (5.9 percent in 2015)
- Average national income per capita: US\$2,160.6
- Foreign exchange deposit: \$2.76 billion
- External debt balance: \$11.46 billion
- Inflation rate: 3.9 percent (down 7.2 percent from ten years ago in 2007)
- Export value: US\$2,548.3 million (excluding free trade zones)
(main exporting country was the United States, accounting for 44.2 percent)
- Import value: US\$6,092.3 million (main importing country was also the United States, accounting for at least 20.8 percent)
- Consumer Price Index: 204.6 (increased by 5.68 percent)
- GDP: US\$13,814 million
- Total FDI: US\$1,462.6 million (down 1.16 percent from 2016)

Wherever President Daniel Ortega walks will leave traces behind, how much does the ruling party think of the people and of its nation? How much was done against them under the Ortega administration? By examining the improvement of the people's living standards, the answer can be known. The Nicaraguan government is stepping forward in improving the policy for economic development. For instance, in March 2020, the CNZF and the Nicaraguan

Ministry of Health agreed taking measures to mitigate and combat the global crisis caused by the effects of COVID-19 on companies working in the free trade zones, and protect the health and safety conditions for workers with the obligations to temporary close their companies.¹⁶⁰ All decisions made today will help pave the way for a better tomorrow, especially in face of the COVID-19 pandemic hitting the world, and so the subsequent post-epidemic economic policies are of importance for the nation and the global economy.

Last but not least, the people of Nicaragua expect to be able to reform the corruption, strengthen the independence of the judicial and the prosecution system, improve the openness and transparency of voting mechanisms to elect government officials, and hope that corruption and impunity can be eliminated. The incidents of bribery of the officials in the enterprises of Nicaragua must be reformed. People from all walks of life in Nicaragua hope that the president will end his term as soon as possible, so that the new political parties and the new candidates will bring incorruptible practices, and let the national economy take off as a truly democratically developed country. The U.S. Treasury Department announced sanctions against Rafael Antonio Ortega Murillo, the son of the Nicaraguan President Ortega, who was suspected of money laundering and corruption through the private oil enterprise Albanisa. Rafael is used to launder money and fund the two companies of the Ortega government, and a third company owned by the Ortega family. Rafael is the main person in charge of the money behind the illegal financial tactics of the Ortega family.

The United States criticizes the Nicaraguan government that the power was highly concentrated in the hands of President Daniel Ortega and his First Lady and Vice President Rosario Murillo. The Nicaraguan government, Murillo and other Nicaraguan officials have

¹⁶⁰ New Tripartite Agreement on Free Zones. *National Free Zone Commission* (CNZF). March 24, 2020. <https://cnzf.gob.ni/es/noticias/nuevo-acuerdo-tripartito-de-zonas-francas>

the sole authority to crack down on the anti-government protests, human rights violations, illegal killings, arbitrary detention, political persecution and widespread corruption. The United States has blacklisted the illegal money laundering and corruption found, and finally can apply for justice. The Nicaraguan government refers to U.S. sanctions against Nicaraguan officials as a continuation of the return of the “Somoza”-like empire conspiracy. But the fact that the amount of evidence to prove the truth is not robust, the people of Nicaragua can only witness it in their eyes and take it out on the streets to demonstrate their frustration.

5.1 Suggestions

Trade liberalization refers to the free movement of materials, goods, capital and labor between countries under the conditions of tariff reduction and removal of tariff barrier to trade, opening its market opening and receiving national treatment. In response to the development of trade liberalization, skills training and labor investment is necessary and important in order to enhance the country’s competitiveness, the government has to take into account the country’s economic structure that is dominated by small and medium-sized enterprises, and improve the quality of human resources through education and vocational training as the focus of its policy goals. Whether a country can attract foreign direct investment depends on the technical capabilities and expertise of its labor force. Although Nicaragua has a large number of workers and low wages, the quality of the workers is low. According to the International Labor Organization, in response to the economic recession and the impact of industrial reform on labor, the promotion of green or circular economy should be the next principles and directions followed by countries in the world.

The advantages of Nicaragua:

- Nicaragua has vast land, cheap labor, and geographical and climatic conditions suitable for planting soybeans in large quantities. Soybeans are highest economic crops. The feasibility assessment of large-scale planting of soybeans in Nicaragua or small farmers has a good return on investment.
- The United States and Central America and the Dominican Republic Free Trade Agreement (CAFTA-DR) provide a protection period of up to 18 years for rice in Nicaragua starting from 2005, and the annual tax reduction starts from the 11th year after CAFTA-DR takes effect. Domestic rice is still quite competitive, however.
- It is close to the U.S. market, land and labor costs are relatively low in the Americas region, and products can be resold to the European and American markets nearby.

The following are suggestions the author has for Nicaragua:

1. The Nicaraguan government should first improve the national masses from poverty. The primary goal is to increase national employment opportunities. National development depends on enterprises, and the development of such enterprises depends on the talents and skillsets of the workers. Only with the development of skillful talents via functions of training and the arrival of the globalization era of facilitated access to multiple sources of knowledge, the government should invest in education to allow citizens to have unlimited cross-disciplinary learning opportunities. The 21st century network technology era belongs to the development of 5G, faster access of internet, and of artificial intelligence, which facilitates the level of productivity. Therefore, it is necessary for the government to improve the national education level, the lack of technical and vocational education, and the lack of technical professionals. It is necessary to establish a manpower training system, set up various vocational training courses and counsel employment, and increase the

employment rate. Nicaragua has been playing the game of catch up, and it should not be left behind forever. The gradual improvement of infrastructure, education, society, health, etc. can only enhance the overall competitiveness of the nation.

2. The country has the advantages of vast land and low labor. The country has rich natural resources such as agriculture, forestry, fishery, animal husbandry and minerals. It is suitable for agricultural investment and planting, encourages outsiders to invest, and refers to the advanced country's new agricultural innovation thinking to expand cooperation space across fields. Improve the operating efficiency of people, land, water resources, and equipment, and enhance agricultural competitiveness.
3. Attract foreigners to invest directly through FDI, the first priority is to re-stabilize the socio-political environment and grant an improved social security system, which can increase the numbers of foreign exchange income and employment opportunities, as well as attracting migrants back from to Nicaragua. In addition, improve the administrative efficiency and shorten the application process in a timely manner. For example, the application process of getting licenses is as high as 18 stages, which takes up to 225 days, a long process that is unfavorable to foreign investors.
4. Observe for favorable export markets and develop other regions to increase foreign exchange income in addition to the neighboring American markets. It should not limit itself since it is working under market economy but must tread lightly upon negotiating agreements where it can enjoy the benefits while safeguarding its domestic production.
5. Make good use of other free trade agreements in the country to innovate and create import and export schemes and businesses opportunities.

6. Nicaragua should be in line with the world in terms of developing its economy in order to eradicate poverty. It should learn from the circular economy development model of advanced countries, and be sustainable, environmentally friendly, and green economy. It is expected to create a regenerative economy that last for generations
7. The country is rich natural resources and the most suitable article for investment is in renewable energy. The UK Financial Times selected the Americas as the second largest site for investment other than Montreal and Toronto, the third most creditable site for foreign direct investment, thus, there is still a lot of investment space for Nicaragua.
8. The Nicaraguan economy and finance rely too much on external funds to maintain debt, and the debt volume is relatively high. The government should strive to improve it to avoid political turmoil and economic continuity like Argentina, the second largest country in South America, but also the world's grain storage and meat storehouse. Amid facing the bankruptcy crisis and the financial crisis in Greece and Venezuela, Nicaragua should take the warning as steps to avoid making.
9. If the Nicaraguan government insists on acting arbitrarily and raising concerns at a domestic and international level, foreign aid will inevitably be reduced. The government wants to enjoy the use of unlimited financial operation. In one sentence, it should be transparent and work well in respect to public opinions and realize a truly democratic transition where the government is progressive in terms of procuring a national consensus on matters of social, political, and economic development.

As for the TPL arrangement under the CAFTA-DR with the U.S. that has expired since 2014, the Nicaraguan government should strengthen the following criteria to increase competitiveness of the export sector in contrast to its neighboring countries:

1. Labor force and efficiency, labor quality, and management efficiency.
2. The transportation systems and routes, and reduce transportation import and export costs.
The deep-water port in Bluefields is being studied by Nicaragua to improve its transportation from Nicaragua to the Caribbean. Ports on the Atlantic coast of Nicaragua cannot accommodate large vessels and container ships, which make transport of goods inconvenient, plus the additional transportation fees and port fees increase costs, and therefore, the annual transportation and port fees paid to Honduras and Costa Rica are estimated to be around US\$130 million.
3. The efficiency of customs operations and the prevention of corruption.
4. Differentiation and diversification of products, quick response to market trends, and expansion of mass production when orders grow.
5. The supply chain of the free trade zones. For example, to cut costs and improve competitiveness in the textile industry, the original equipment manufacturer (OEM) companies look for low-cost, high-quality products for yarn, cloth and upstream raw materials to increase investment and innovative opportunities and set up satellite factories in which raw materials and purchased parts are manufactured into components to be sent to the central factory or parent company for the assembly of the final products.
6. Government supporting measures to integrate the upstream, middle and downstream products, and to create or assist in the feasibility of regional integration and boosting collaboration among industries in Central America, allowing countries to consider the niche of a shared market and decide the allocation of its investment.
7. In addition to the U.S. market, it can explore the markets of other countries.

In response to the impact of U.S. rice subsidy to Nicaragua, the cultivation strategy for food crops in Nicaragua can be improved as following:

- 1) Choose appropriate planting area and improve production technology
- 2) Provide training courses for small and medium-sized farmers, training for technical personnel, and hold seminars and workshops, promote cultivation management techniques to increase productivity
- 3) Improve the irrigation system, especially in rural areas
- 4) Nationwide access to supply that boosts production:
 - i) selection and production technology, and
 - ii) research and development of drought-resistant, disease-resistant and pest-resistant varieties and seeds
- 5) Counseling of planting good varieties suitable for local production to help increase the output per unit area and income
- 6) Invest in the main building of agricultural machinery warehouse
- 7) Purchase large-scale agricultural machinery and equipment of dryers and harvesters
- 8) Set up cooperatives and counseling in administration, accounting, and technology to help transition of independent operations for production

5.1.1. Suggestions for Sustainable Development

Human beings living on the earth are facing various challenges. In addition to severe climate change, ecological imbalances, environmental pollution, excessive use of arable land, application of chemical fertilizers and spraying of pesticides, the texture of the soil has changed, resulting in large amounts of land unsuitable for cultivation or reduced numbers in harvest. Air pollution causes greenhouse effect and the virus outbreaks endanger the health of many lives. These factors also affect the global economic development and create barriers to the overall

economic development of Nicaragua. In response to how to create a new opportunity for all mankind, economists and relevant political and economic figures in recent years have advocated green and circular economy thinking and strategies, and hope that countries can recover the benefits of recycling and reusing all resources, unlike manufacturing and producing goods that utilizes resources that goes to waste akin to the “linear economy” of the past.

This study analyzed the economic trends and situation of Nicaragua, and the difficulties it could not break through economically. It is recommended to explore the many sustainable development alternatives that the other countries, cities, and enterprises in the international arena have successfully implemented and practiced. The authorities and policymakers of Nicaragua need to identify what advantages may contribute to the economic development, social progress, environmental protection, increase of employment rates, and move towards sustainable development to protect its land and people.

Strengthening the implementation of the market economy for economic sustainable development should bring tremendous benefits and changes to the country and enterprises. Its applied principles and practices are designed to promote cooperation and competitiveness that should guide the economic development of a country to the next wave of economic miracles without needing drastic transformation. The competitive edge Nicaragua provides in the free trade zones allow lower costs of production and imported materials that yields higher profits in exports. Nevertheless, there is an urgent need to establish a more sustainable material management of the use of resources. In terms of the concepts, practical applications, and policies, it is necessary to analyze and discuss how to improve the utilization efficiency of the advantages Nicaragua provides.

Moving toward sustainable development in a market economy, the main goal is to create opportunities for governments, businesses, and individuals to discover and apply innovative ways to efficiently use all the resources available at their disposal to minimize wastes to accomplish long-lasting sustainability. In the case of textile and garment industries, there should be a focus on the recollection of defective products and old clothes at their respective establishments instead incinerating or sending them to the landfills. For example, “big multinational companies that try to become also circular companies, such as H&M, have begun with processes of exploitation.”¹⁶¹ Allowing consumers to leave clothes that are no longer used to the stores or manufacturing companies should help provide for more raw materials to make new set of clothes and products. The initiative of large companies is recommended to set an example to guide smaller companies and help push for sustainable movement for the domestic community to follow through.

For instance, Nicaragua is known for producing sugar exports in the international market, whereas Taiwan is also known for producing sugar. The author had a chance to visit the Taiwan Sugar Corporation, or Taisugar, in Taiwan via the Circular Economy Workshop organized by the International Cooperation and Development Fund (ICDF) of Taiwan. There, he learned that President Tsai Ing-wen has long discussed the issue of air pollution and requested state-owned enterprises, such as Taiwan Power Company and CPC Corporation (a state-owned petroleum industry in Taiwan) to reduce pollution no matter how much it takes. The Taisugar’s combustion boilers that creates sugar were purchased about 50 years ago, which creates high amount of air pollution, therefore, is seeking for new devices that can extract biomass energy as much as possible for sugar production.

¹⁶¹ “The 7Rs of circular economy”, *PICVISA News Blog*, accessed November 29, 2018, <https://picvisa.com/en/the-7-rs-of-circular-economy/>

For now, Taisugar identified two types of byproducts of sugar production that may be reused into the economy. First, the carbon residue from its gasified fuel rod could be used as biochar,¹⁶² activated carbon,¹⁶³ or to be compressed into graphite¹⁶⁴ for other high-value utilization as a renewable resource. Second, and most importantly, is for Nicaraguan sugar industry to refer to, are the production of sugarcane bagasse¹⁶⁵, which Nicaragua utilizes to some degree for energy consumption. The creation of sugarcane ash from the process of gasification in sugar production is rich in organic potassium and silicon, which can be considered as a carbon-based organic fertilizer used for agriculture. Nicaraguan government may analyze this potential of the sugar industry sector to further increase the productivity of the agricultural sector. The table below is a representation of the amount of sugar produced for exports in Nicaragua, where businesses and industry may use to deduce the amounts of benefit that sugar production may bring to the regeneration of organic fertilizers used on arable lands in Nicaragua to increase productivity.

Table 16. Agricultural production for exports (in thousands)

Agricultural cycle	Harvested area (manzana)¹⁶⁶	Production (tons)
2007/08	70.6	4,928.9
2008/09	70.4	4,735.3
2009/10	85.1	5,434.2
2010/11	71.4	4,921.5
2011/12	85.7	5,986.8
2012/13	96.3	7,416.4

¹⁶² Can improve water quality, reduce soil emissions of greenhouse gases, reduce nutrient leaching, reduce soil acidity, and reduce irrigation and fertilizer requirements.

¹⁶³ Used for air purification, water purification, sewage treatment, medicine, etc.

¹⁶⁴ A good conductor of heat and electricity, which is also found in pencils.

¹⁶⁵ Dry residue left after the extraction of juice from sugar cane that extracts fine sugar

¹⁶⁶ The unit *manzana* is often used in Nicaragua to calculate land sizes. 1 mazana = 0.7 hectares.

2013/14	101.2	7,713.5
2014/15	101.9	7,027.9
2015/16	103.1	6,778.7
2016/17	105.6	7,776.3
2017/18	108.5	8,063.0

Source: BCN.

However, how can it go wrong?

The lack of technology, foreign investment, incentives, or commitment delivered by the government would not help drive by the nation and its people to try and achieve the ambitious sustainable development goals. For instance, in 2016, the U.S. has been investing in green energy, but in 2017, when President Trump was elected, the investment of green energy has stopped, rendering prices of green energy more expensive than before.

What are the desired outcomes?

To sum, it is crucial for the government, business leaders, and individuals to recognize the alternative sustainable development ideas, such as the circular economic model. The idea itself is given by nature and by simply observing it. Ray Dalio described in his book *Principles: Life and Work* that life principles “were given the laws of reality by nature [...] humans did not create them, but we can use them to foster our own evolution and achieve our goals.” The concept of circular economy is similar to the workings of the living systems: operating by constantly reusing their own materials, including resources from disposals, as nutrients for current and future life. Not everyone fully understands the operation of the living systems, but we have the responsibility to design a plan to solve every problem, instead of identifying the issues and rushing for quick solutions.

There is a youth organization in Nicaragua, locally organized and composed of students and professionals, called Net Impact Nicaragua that is part of the global Net Impact network which promotes and develops project of social and environmental impact, such as spreading awareness of circular economy and green economy to Nicaragua. For instance, they launched a program of “Tree Planting Day” on September 21, 2019 to plant trees in León as environmental movement. In March 2020, the author had the opportunity to contact the group about projects regarding the promotion of circular economy in Nicaragua that should have been discussed in May but was postponed due to concerns of spreading the coronavirus. In June 2020, they started to be active on social media, sharing knowledge of circular economy via Facebook, Instagram, and Twitter, as part of their commitment to contribute to the UN Sustainable Development Goals and create positive environmental impacts in Nicaragua. Therefore, it is essential for decision-makers, policy-makers, and businesses to deeply understand, accept, and work with reality as it is, and work within the already established market economy in Nicaragua in order to set standards for everyone to follow and comprehend instead of working against nature for economic development.

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APPENDIX A

The following is a table that goes into detail to the population age structure of Nicaragua in accordance to the number of total population provided by the World Bank in 2019.

Table 17. Population of Nicaragua by age group, 2019.

Age Group	Total ¹⁶⁷	Percent of Population
Total	6,545,502	100%
under 20 years old	2,749,111	42%
20 to 29	1,243,645	19%
30 to 39	981,825	15%
40 to 49	654,550	10%
50 to 59	458,185	7%
over 60 years old	458,185	7%

Source: INIDE, estimated and forecasted statistics (elaborated by author).

¹⁶⁷ Estimates calculated in reference to the data from World Bank. Retrieved in June 2020.

APPENDIX B

The following are questions asked by the author concerning the construction of the Nicaragua Canal and answers given by the Embassy of Nicaragua in Taiwan, which is listed below:

What competitive edge will the Nicaragua Canal bring in comparison to the Panama Canal?

The Grand Canal Project will be the greatest engineering work of this century and its impact on our country will be enormous. It will have the capacity to allow the transit of vessels of 25,000TEU, bulk carriers of 400 deadweight tons and tankers of 320 deadweight tons. It is expected that by 2050 an average of 5,100 ships will transit per year, substantially increasing the country's trade. It is estimated that approximately 5 percent of maritime trade will transit through the Canal, that is, some 900 million tons of products per year. The Canal will respond and adapt to the deepening changes in world trade. The route through Nicaragua is 943 km shorter on a coastal route from the United States. In addition, the dimensions of the Canal will allow larger ships to transit, responding to a growing need that the Panama Canal will not be able to cover even with its expansion.

Mega ships will become the main means of maritime transport of goods. Ships such as the MSC OSCAR, with a capacity of 19,400 TEU, or the MAERSK EEE of 18,800 TEU reduce the costs of transporting goods by 30 percent, as well as CO2 emissions by 50%. The US Army Corps of Engineers estimates that by 2030, 60 to 70 percent of the world's maritime trade will be conducted by these mega ships.

The Nicaragua Canal, in comparison to the Panama Canal, will be able to accept ships of up to 25,000 TEUs, leaving 6,000 TEUs for future expansion. This mega project will cost US\$40-50 billion, approximately 4.2 times the total GDP of Nicaragua in 2014 (US\$11,840 million). The construction is expected to boost the national economy to such an extent that the GDP is portrayed an average growth of 11% each year of construction. This mega project

will allow the national economy to generate a greater number of formal jobs. Only the construction and operation of the Project will generate 50,000 jobs in the construction phase – 25,000 Nicaraguans and 25,000 foreigners – plus 3,700 workers for the operation of the Canal and 12,700 in 2050. In addition, 113,000 jobs in the free trade zone and more than 3,000 in the tourist centers. The multiplying effect of the Interoceanic Grand Canal Project will have a strong positive impact in Nicaragua, at all levels. The national economy will be transformed and will have the necessary resources to face the challenge of achieving full human development. Above all, the work will have a definitive impact on the fight against poverty. Estimates indicate that the economic impact of the Canal will reduce overall poverty by 11.2 percent points and extreme poverty will be reduced by approximately half.

Will the canal increase opportunities of the business sector between Nicaragua and Republic of China (Taiwan)?

As former Ambassador of the Republic of China to Nicaragua, Ingrid Hsing, expressed, there are several Taiwanese companies which are already interested to invest in the Interoceanic Canal together with companies from China and other countries.

“In the case of Taiwan, of course, we are very interested in collaborating. That cannot be a work of two or three countries, it must be a joint work [of many], because many countries of the world have their technology, others have their financial resources, others have their commercial need.”

Taiwanese companies such as Evergreen and Yang Ming, and the construction company OECC, all of which already have a presence in Central America, have shown interest in working together with the Government of Nicaragua in order to explore business opportunities.

- End of interview -