

Timor-Leste Population and Housing Census 2010

Analytical Report on Migration and Urbanization

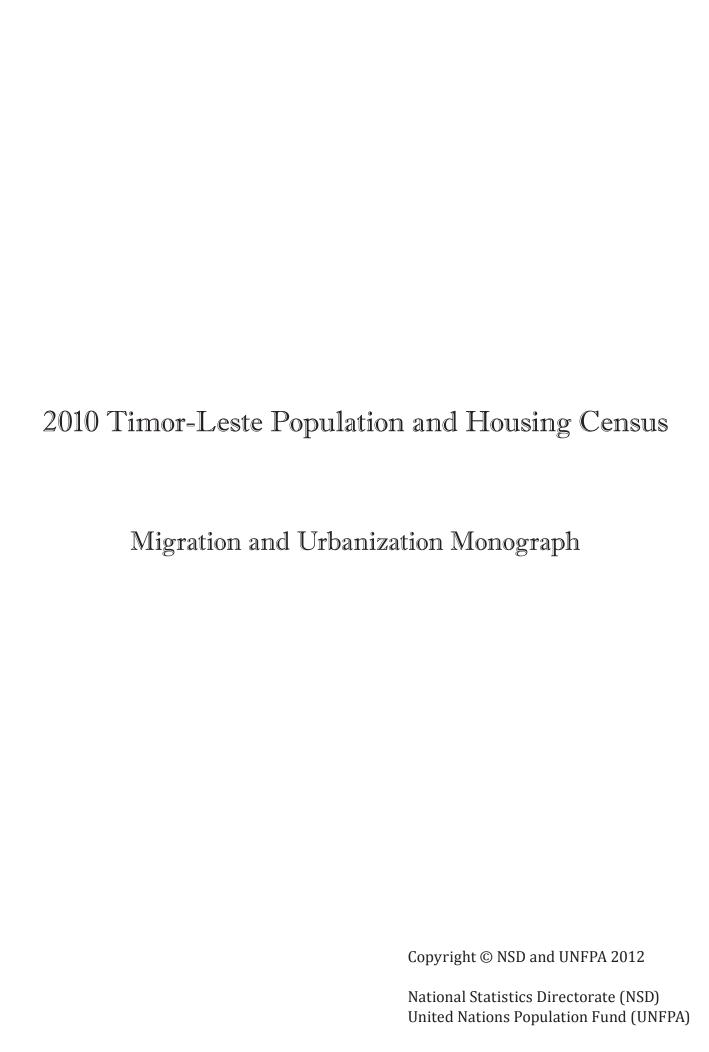
Volume 7



Timor-Leste 2010 Population and Housing Census

Series of Analytical Reports

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Acronyms

EA Enumeration Area

HDR Human Development Report

ILO International Labour Organization

NSD-TLS National Statistics Directorate - Timor-Leste

POB Place of Birth
TLS Timor-Leste

UNDP United Nations Development Programme

UNFPA United Nations Population Fund

UNMIT The United Nations Integrated Mission in Timor-Lest

Foreword

The 2010 Timor-Leste Population and Housing Census with the theme "**Our Census, Our Future: Be part of it**" was conducted in July 2010 on a *de facto* basis by the National Statistics Directorate. The 2010 census is the second after the one conducted in 2004 (post independent Timor-Leste) and fourth after the 1980 and 1990, both taken under the Indonesian forced occupation. This census was undertaken within the provision of the Statistics Decree Law No. 17/2003 and the 2010 Population and Housing Census Law of April 2010.

The main objective of the census was to collect, analyze and effectively disseminate demographic and socio-economic information required for policy and programme formulation, decision making in planning and administrative processes, and research. The census preliminary results were published in Volume 1 and launched by His Excellency the President of the Republic of Timor-Leste in October 2010. The main results were published in Volumes 2, 3 and 4 and launched by the Vice-Prime Minister in July 2011. After that an ambitious "Sensus Fo Fila Fali" project was undertaken by the MDG Secretariat (Ministry of Finance) in partnership with the Census Project Office that culminated in a Census report for each of the 442 sucos in the country. These reports were launched by the Prime Minister in November 2011, followed by a series of nationwide dissemination workshops held at national, district level and in each of the 442 sucos.

This fourth phase comprises of twelve analytical reports covering census thematic topics: Fertility and Nuptiality, Mortality, Migration and Urbanization, Population Projections, Education, Labour Force, Housing, Disability, Agriculture, Gender, Youth and the Atlas. The preparation of these reports was a collaborative effort between the Government of Timor-Leste and United Nations Population Fund (UNFPA); it involved local and international experts. The reports were authored under the supervision and guidance of the Chief Technical Adviser from UNFPA. The authors were recruited on competitive basis, ensuring that they had adequate knowledge of the topic they were to analyse.

The Government of Timor-Leste wishes to extend its sincere gratitude and thanks to UNFPA for providing technical, financial and administrative support throughout the census process. Further gratitude is extended to the authors of the analytical reports, the Director of NSD and his team, the Chief Technical Advisor – Census Project, technical staff for their commitment and tireless efforts to successfully undertake the thematic analysis exercise.

Last but not least, all Timorese deserve special praise for their patience and willingness to provide the requisite information which forms the basis of these reports and hence benchmark information for development. We in the Ministry of Finance and Government as a whole hope that the data contained in these twelve monographs will be fully utilized in national development planning process by all stakeholders for the welfare of the Timorese people.

Ms. Emilia Pires,

Minister of Finance

The Democratic Republic of Timor-Leste (RDTL)

Executive Summary

Urbanization usually accompanies social and economic development, but rapid urban growth on today's scale strains the capacity of local and national governments to provide even the most basic services such as water, electricity and sewerage. Squatter settlements and over-crowded slums are homes to tens of millions, like the favelas that cling to the hillsides of Rio de Janeiro and the tombs used as homes by tens of thousands in Cairo's "City of the Dead". In some developing countries, notably in Africa and Asia, this growth reflects rural crisis rather than urban-based development.

Migration, both internal and international, and urbanization are important not only as a demographic process but also as an instrumental factor for socio-economic development in Timor-Leste. An analysis of the volume, patterns and main features of migration and the process of urbanization are beneficial for policy makers as well as planners to formulate better policies on socio-economic and political development in the country for the future.

The inter districts migratory movements in Timor-Leste were well pronounced by 2010. Most of the resident population in the districts had moved out due to education, occupation and followed family. In 2010, fourteen percent (14%) or 120,969 persons had left their districts of birth to take up residence in other districts (excluding returned migrants). In terms of current levels of migration, a small fraction of 12.2 per cent (internal migration rate) of the population or 128,142 persons have moved from one district to another. An international migration component is also discernible in Timor-Leste since the time before independence. In 2010, the foreign-born population constituted 1.1 per cent of the total population and has slightly increased from 11,345 in 2004 to 11,537 though the proportion to the total population has decreased from 1.2 per cent (2004) to 1.1 per cent (2010). Indonesians, Filipinos and Portuguese have dominated the international migrants' scene.

The magnitude of in-migration into Dili had several socio-economic and environmental impacts. A considerable number and proportion of in-migrants into Dili were recorded as the highest net intake district in which there were 85,194 in-migrants or 36.4 per cent of its resident population.

The lifetime as well as recent migratory movements mostly appear in Dili district. The majority of migrants to Dili district were not only from adjoining or neighbouring districts but also from districts like Lautem, Baucau and Viqueque. A remarkable increase of in-migrants discerned in Dili district has amounted to 37 per cent from 2004 to 2010. Baucau, Bobonaro, Ermera, Lautem and Ainaro are the districts where the people moved out mostly to Dili district.

The heavy influx of migration into Dili has resulted in its increased population and structure, and to social economic and environmental sectors. Dili population has increased at an average annual growth rate of 4.6 per cent which is much higher than the national average annual growth rate of 2.4 per cent during 2004 -2010.

There are apparent migration streams in all districts. According to the 2010 Census, three largest migration streams such as largest, second largest and third largest are identified in the process of in-migration and out-migration in the districts. For instance, Covalima and Bobonaro received 83.2 per cent and 81 per cent of their in-migrants from the adjacent districts of Dili, and Ainaro respectively.

The pattern of rural-urban migration remains high in Timor-Leste. Inter rural migration occurs due to marriage, followed by family whilst inter-urban especially in Dili occurs due to search for employment or employment mobility. The considerable proportion of 40-54 aged peoples' movements confirms this migratory movement.

Among other reasons for internal migration in Timor-Leste; following family and education were cited as the key underlying factors for internal movements. In the case of rural areas, the migratory movements take place due to reasons of marriage whilst in the case of urban; employment and search for employment are important factors influencing the migratory movements.

Selectivity of migrants could be seen through demographic and socio-economic characteristics of in-migrants who are differentiated from non-migrants at destination. The motivational factors for migration were reflected in those characteristics. Migrants in Timor-Leste were mostly young, catholics, educated up to secondary level and employed. The unemployment rate of migrants was of high magnitude.

The majority of the overseas-born persons have moved to Dili district followed by Covalima and Oecusse for employment purposes. From policy perspective, it is important to receive international migrants who are educated and skilled for the future development of the country.

Rapid urbanization is a unique feature in Timor-Leste. The growth rate of urbanization is much faster than that of the total population. The proportion of urban population is growing much faster due to heavy influx of population from all districts to Dili. As a result of rural urban migration and due to natural growth of population, the growth of other cities in the districts is also discerned.

Thus the migration and urbanization should be considered as an important phenomenon not only from a demographic perspective but also in policy and social economic perspectives for the well-being of the Timorese. Policy makers as well as policy planners have formulated several policy options to alleviate the existing poverty level and other socio-economic issues such as unemployment and livelihood difficulties which reflect the migratory movements and urbanization in Timor-Leste.

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CHAPTER 1

INTRODUCTION

1.1. Introduction

Migration is increasingly being accepted as a demographic, economic and social factor to change demographic parameters such as size, growth, composition and the geographical distribution of population as well as to either increase or decrease economic development and social transformation. In the last few decades, migration, both internal and international, has emerged as one of the main factors in development and social transformation in all regions of the world (Castles, 2000; IOM, 2005). The volume, types, flows (directions) into and out of a country, district or sub-district within a country and causes and consequences of migration have changed over the last decades with the transformations in global economic, social and political processes (Skeldon, 1997, 2003; Hass et al., 2010; Castles, 2000).

Migration, both internal and international, has a multifaceted impact on the demographic and socio-economic aspects. As a demographic component, migration affects the size, growth, distribution and composition of population. International migration, as well as internal migration, induces the advancement of economic growth and development. Social changes, social adaptability and social integration are also influenced by migratory movements. The migratory movements within the country towards urban places indeed lead to a degree of urbanization. Thus it is important to analyze the migratory movements in a country. The main focus of this monograph is to provide an in-depth analysis of the 2010 Census data pertaining to internal migration and international migration and patterns and pace of urbanization in comparison to the 2004 Census data in Timor-Leste.

1.2. Census Background for the Analysis

A population census is "the total process of collecting, compiling, evaluating, analyzing and publishing or otherwise disseminating demographic, economic, and social data pertaining at a specified time, to all persons in a country or in a well delimited part of a country". Thus the census statistics provide a set of benchmark data on population characteristics which is indispensable for effective national development planning and policy decisions. In particular, the most common and reliable source of data on population mobility is the census which basically collects the information on place of birth, place of residence at enumeration, duration of residence and previous residence. This migration data in a census is amply beneficial not only for socio-economic development planning but also useful to understand future demographic dynamics and population projection. As recommended by the United Nations (2002) the national censuses can be undertaken on a de-jure (enumeration at the place of usual residence) or/and de-facto (the place people found at the census night) basis and for regular intervals (named periodicity – intervals of ten or five years).

The 2010 Timor-Leste Population and Housing Census was the second census conducted since the country gained with independence in 2002. After the first census of 2004, the second census was conducted with the night of 11th/12th July 2010 being Census Night on a *de-facto* basis, though

the questionnaire also allowed for de-jure enumeration. The 2010 Census was conducted in accordance to the 2010 Population and Housing Census Law of April 2010 and the Statistics Decree Law No. 17/2003.

The main objective of the 2010 Census was to collect detailed statistics on the size, the spatial distribution and characteristics of population. One of the specific objectives was to ascertain the numbers and characteristics of internal migrants and international migrants (foreign born population). The census statistics revealed facts about urbanization and the population in cities as well. The 2010 Census was able to collect a wider spectrum of information on the patterns of internal migration and the socio economic characteristics of migrants and the distribution of population in urban versus rural areas by using a long questionnaire. As practiced in 2004 Census, the 2010 Census also used a short questionnaire to collect information from the people who spent the census night in hotels, hospitals, and outdoor-sleepers, and also from those living in institutions. However, the aspects of migratory movements of the people were not enquired in the short questionnaire. Hence this monograph concentrated only on the long questionnaire which collected the household characteristics and the information on the people who resided in conventional households in Timor-Leste during the time of the census.

1.3. Aim of the Monograph

The primary aim is to describe the main features of internal and international migration revealed in 2010. As migration is a multifaceted human activity and its implications are so numerous that this monograph is limited to a statistical analysis of migration and urbanization, avoiding substantive description of implications of migratory movements. More focus of this Monograph is given to explore details on internal migration and the characteristics of migrants compared to non-migrants and the volume and some characteristics of international migrants. The Monograph provides detailed information of patterns and volume of migration flows within Timor-Leste; into and out of districts, into and out of sub-districts; into and out of Dili; types of migration flows such as into rural-urban and urban-urban (inter-urban); characteristics of migrants such as age, sex, marital status, education, selected mother-tongue and occupation. This study also focuses on identifying indirectly push and pull factors in analyzing the causes of migration. Finally, the Monograph explores the population size of towns and the urbanization process in the country.

1.4. Importance of Thematic Analysis of Migration

An analysis of volume, patterns, streams and characteristics of internal and international migration, and the salient features on urbanization and growth of cities and towns in Timor-Leste are of paramount importance for several reasons as follows:

- Although the same basic information on migration and urbanization were collected in 2004 Census, a substantial analysis or comprehensive publication, which would have been beneficial for policy makers, was not undertaken therefore, this analysis for the 2010 Census will fill the gaps.
- The volume and patterns of migration and urbanization based on 2004 Census does not even reveal an accurate milieu on internal migration in Timor-Leste as there were so many return migrants and sudden influx of people to Dili soon after independence from Indonesia in 2002. Hence, the analysis based on 2010 Census, provides the migratory movements of people who clearly settled down in districts as well as in sub-districts.

- The analysis of migration, both internal and international migration and urbanization on recent years will be beneficial for technical people, as well as for policy makers to formulate better policies on socio-economic development as there is a strong link between migration and development in a country (such as for areas of education, housing, electricity, job markets etc.).
- Current status of internal and international migration and urbanization in Timor-Leste will particularly benefit to make a proper Population Projection and Labour Force Projection for future period that will enhance policy formulations.

1.5. An Overview of Migration: Definition and Concepts

It is necessary to study migration in a country to get a clear clarification for the meaning of internal migration and to point out the limitations imposed by the nature of census figures (Rowland, 1979).

Migration is a movement from one geographical area to another, crossing the administrative boundaries for permanent or semi permanent residence. The United Nations (1970:2) has defined internal migration as "a movement from one migration-defining area to another or a move of some specified minimum distance that was made during a given migration interval and that involved a change of residence". According to this definition it is clear that any country can decide the migration defining area in a study on migration. Timor-Leste considers the boundaries or migration-defining areas as district and sub-districts. Shryock and Siegel (1976:349) also clearly pinpoint the importance of clearly defined geographic units in the definition of internal migration: "a form of geographical or spatial mobility involving a change of usual residence between clearly defined geographic units". International Organization of Migration (IOM, 2004:32) has defined internal migration as "a movement of people from one area of a country to another for the purpose or with the effect of establishing a new residence". The idea of purpose can be varied and depicts temporary and permanent migration. However, all such movement cannot be considered as internal migration because people move for the purpose of visiting, vacation or business or work even cross administrative boundaries are temporary and it is identified as 'commuting' rather than internal; migration (changes in usual residence) (UN, 1970; Shryock and Siegel, 1976). Thus a clear understanding of internal migration as any geographic movement within the country for the purpose of changing residence and crossing the administrative boundaries, excluding 'commuting' between home and work place, home and school which do not qualify as migration (Shryock and Siegel, 1976; UN, 1970). According to such definition, origin and destination can be identified clearly and the starting point is known as "place of origin" whilst the ending point is referred to as "place of destination".

1.6. Historical and Global Trends of Migration

Migration has emerged as an important phenomenon in most regions in the world since the settlements of civilizations of ancient world embarked on the cities and countries around the Mediterranean Sea and along the coasts of Arabia, India, China, and the continents of Europe and Asia (www. Pacific island travel, 2012). In the 3rd century BC, Nomadic Tribes such as Huns invaded various parts of interior Eurasia. In the 5th and 6th centuries, Angles, Saxons, and Jutes, sailed from northwest Germany and invaded southern Britain, whilst from 7th to 10th centuries various areas of Northern Europe were captured by Norwegian, Swedish and Icelandic groups (www. Pacific Island travel, 2012). In the 7th and 8th Centuries, Arab tribes flue eastward to Chinese Turkestan and to northwest India through Persia (Iran). These movements subsequently spread westward through Egypt and across northern Africa into Spain and southern France, and northwestward through

Syria into Asia Minor. There was a striking military migration that occurred in the 13th century AD that of Mongolian tribes who captured China, Southern Russia, Turkistan, Afghanistan, Iran, Mesopotamia, Syria, Asia Minor, and some parts of Eastern Europe. Thus, international migration had taken place in most part of the world since the initiation of the civilization itself. However, migration has become a prominent human movement process since 15th century basically where many groups and individuals have migrated involuntarily or for invasion of African and many parts of Asian regions especially in South and South-east regions by Europeans (Portuguese, Dutch, and Englishman). The involuntary voyage across the Atlantic Ocean made by Christopher Columbus (1451 – 1506), a colonizer, and navigator, who discovered the "New World" (American continents in the Western Hemisphere) and Vasco De Gama (1460–1524) who sailed directly from Europe through Africa to India in 1498 are landmarks that have increased the importance of international migration. Its significance accelerated from mid-20th century especially due to international labour migration in eastern and south eastern Asia. International migration has now emerged as one of the factors in social transformation and development in all regions of the world particularly from the second half of the twentieth century (Castles, 2000).

The United Nations and the International Organization for Migration estimate that the number of global migrants has increased remarkably from 155 million in 1990 to 213 million in 2010, at a 1.6 per cent average annual increase (United Nations, 2010). In other words, one out of every 33 persons in the world today is a migrant, whereas in 1990 one out of every 27 persons was a migrant. Of these 213 million or 3.1 per cent of the World population in 2010, majority live either temporarily or permanently outside their countries of origin. The salient feature in the global trend of migration is of those who migrate, 60 per cent move to a developed nation, and 40 per cent to developing nations especially for employment purposes. Most of those who move to a developed country, originated from a developed country (www.justinlong.org/2011/7). Of the 40 per cent of migrants who migrate to developing nations, majority of them are migrant workers and family members. Since the early 1970s international labour migration has become a significant human migration process in the several labour surplus countries in Asia. Large-scale and multi-directional migration within Asia has attributed to the oil boom of the mid 1970s in the Middle Eastern countries, and emergence of so-called Asian Tiger economies, namely South Korea, Singapore, Thailand, Taiwan, Hong Kong and Malaysia (Cruz, 2004).

Although refugees are not directly considered as international migrants, about 12 million are estimated as refugees outside their countries. Refugees and asylum seekers have migrated largely to Canada, Australia, New Zealand, UK and USA as a result of internal strife in many parts of Asian regions. These countries have opened new avenues for permanent migration to their countries, opening their doors to all types of migrants and paving the way for thousands of professionally and technically qualified persons. Such induced migration has caused a fairly massive brain drain (brain gain for the receiving country) from the third world countries. As one might expect, with globalization, numbers of migrants are increasing (Castles, 2000).

In the 20th century, the global trend of international migration has also been characterized by increasing feminization and a transnational perspective of migration (Abella, 2005; Asis, 2005; UNFPA and IOM, 2006; Cruz, 2005; Levitt and Jarworsky, 2007). It is estimated that 49 per cent of migrants worldwide are women (UN DESA, 2008). Most of Asian migrants are engaged in gender-specific jobs like nursing, domestic work and entertainment. This inequity has caused a gendered labour market which is exacerbated by their marginalization in the host countries. On the other hand, economic and political transformations have induced the diversities of transnational perspective of migration (Levitt and Jarworsky, 2007).

In the global trend of migration, internal migration has also emerged worldwide. According to UN estimates, about 740 million internal migrants have emerged in many parts of the world and it is nearly four times as many as those who move between countries (www.justinlong.org/2011/7). In many parts of the world, people spontaneously and freely move to and from the province/districts/sub-districts or other smaller administrative units, as well as within those administrative units for purpose of job, education and other push-pull factors in the country. Timor-Leste is no exception to cite this kind of internal migration. On the other hand, the largest kind of migration also transpires between countries within regions, than between countries in different regions. In this respect, Asia's 35 million internal migrants appear to be the largest such movement in the world. Thus the global trend of international, as well as internal migration, and their salient features are revitalized in the migration status in Timor-Leste.

1.7. Preview of Migration levels and Trends in Timor-Leste

A significant movement of population within Timor-Leste, as well as into the country from abroad, began in the early 20th century and a considerable population moved to Dili from the countryside, and it still takes place, for trade purposes in Dili (Guterres, 2003). Internal movements and the abroad population has therefore contributed to increase Dili's population from 6,000 in the beginning of 20th century to 12,000 people by the eve of the World War II and it subsequently grew to 30,000 in 1975 and 100,000 during the Indonesian regime. A conspicuous movement within the country had emerged especially from 1975 to 1999 (Guterres, 2003). In the 1990s 150,000 people (20 per cent of population of Timor's population) lived in Dili and a great extent of this growth was due to rural to urban migration. In the 2004 Census, 67 per cent of the population aged 5 years and over reported that they had been residing in Dili since January 1999. Of the remaining 33 per cent of the population aged 5 years and over, 5.7 per cent were reported as residing abroad and another 6.5 per cent reported as residing in another district in January 1999 (UNFPA, 2007). Noticeably, 21 per cent of the population did not state their place of residence in four districts (viz., Ermera, Manatuto, Bobonaro and Viqueque) in 1999 and this accounted for 38-60 per cent of the population (Table 1.1). This fact hinders the disclosure of migration trends particularly in those four districts. This is an anomalous situation when compared to reporting of place of usual residence in the 2004 Census, which may have been a reporting error. Nevertheless, all people aged 5 and above have distinctly stated their place of residence in the 2010 Census as revealed in Table 1.1.

Furthermore, the percentage of people who reside in another district has increased, except Covalima and Oecusse, from 2004 to 2010, which indicates that the movement of people between districts has soared during this period. Noticeably, the number of people who were born and moved into various districts (foreign born or international migrants) has also considerably decreased from 2004 to 2010.

According to definitive responses, the proportion of in-migrants in 2004 was highest in Dili, followed by Liquiça; a coastal town adjacent to Dili and a centre for economic activity in fishing and salt production. Liquiça is recorded as the most attractive district for international migrants (27.6%) at the census of 2004 and (Table 1.1).

Table 1.1: Distribution of Population 5 years and older by place of residence and district - 2004 and 2010

		2010					
District	Same District	Another District	Abroad	Unknown	Same District	Another District	Abroad
Ainaro	91.9	7.2	0.2	0.8	96.5	3.3	0.2
Aileu	82.7	15.5	0.3	1.5	87.3	12.6	0.2
Baucau	93.9	4.6	0.3	1.2	95.2	4.5	0.3
Bobonaro	93.8	4.3	1.1	0.8	94.9	4.3	0.8
Covalima	89.4	7.2	2.2	1.1	93.8	4.7	1.5
Dili	47.3	44.9	3.4	4.4	50.6	46.0	3.4
Ermera	93.7	4.1	0.3	2.0	96.3	3.3	0.4
Liquiça	92.7	5.4	0.7	1.2	93.7	5.6	0.7
Lautem	96.4	2.4	0.5	0.7	97.1	2.4	0.5
Manufahi	88.2	10.2	0.8	0.8	92.8	6.5	0.7
Manatuto	91.3	7.3	0.4	1.0	94.4	5.1	0.4
Oecusse	94.5	2.2	2.2	1.1	97.1	1.5	1.4
Viqueque	93.9	5.2	0.2	0.6	96.9	2.9	0.3
Total	88.4	9.3	1.0	1.3	91.3	7.9	1.8

Source: RDTL, 2006. Timor-Leste 2004 Census, Table 9.07

Timor-Leste 2010 Census, Table 7.1

The trend of people's movements between districts is significantly discernible during the two year prior to the 2004 and 2010 Censuses. The people who reside outside the district, particularly in Dili district, has remarkably increased in the inter-censal period of 2004 - 2010, which indicates the occurrence of heavy inter-district migration trends during 2002-2010 (Table 1.2).

Table 1.2: Distribution of Population 2 years and older by place of residence and district -2004 and 2010

		2010					
District	Same District	Another District	Abroad	Unknown	Same District	Another District	Abroad
Ainaro	92.0	6.8	0.4	0.9	96.7	3.1	0.2
Aileu	83.4	14.8	0.3	1.5	87.7	12.2	0.0
Baucau	94.0	4.4	0.3	1.2	95.4	4.3	0.0
Bobonaro	93.9	4.1	1.3	0.8	95.1	4.1	0.0
Covalima	90.0	6.7	2.2	1.1	94.2	4.4	0.0
Dili	51.0	41.4	3.4	4.2	53.6	43.1	0.0
Ermera	93.8	3.9	0.4	2.0	96.5	3.2	0.0
Liquiça	92.7	5.2	0.8	1.3	94.1	5.3	0.0
Lautem	96.5	2.3	0.5	0.7	97.2	2.4	0.0
Manufahi	88.5	9.7	1.0	0.8	93.2	6.1	0.0
Manatuto	91.5	7.1	0.4	1.0	94.8	4.8	0.0
Oecusse	94.5	2.1	2.3	1.1	97.3	1.4	0.0
Viqueque	94.1	5.0	0.3	0.7	97.0	2.8	0.0
Total	88.9	8.7	1.0	1.3	91.7	7.5	0.5

Source: RDTL, 2006, Timor-Leste 2004 Census, Table 9.07

Timor-Leste 2010 Census, Table 7.1

The above scenarios of migration trends prior to the 2010 Census suggest reviewing detail information on volume, patterns, causes and characteristics of migration and migrants as revealed in the 2010 Census. The following chapters will further analyze the thematic lines discussed above.

1.8. Organization of the monograph

This report consists of seven chapters. The background of the indepth analyses of migration and urbanization globally and in Timor-Leste is highlighted in chapter 1.

Chapter 2 discusses the data and methodology used in the thematic analysis on migration and urbanization. In this chapter the importance of census data and their limitations are discussed focusing on the 2010 Census in Timor-Leste. The next three chapters discuss the volume, streams, patterns and the characteristics of lifetime migration/migrants, causes of migration and the profile of overseas-born population (international migrants) and their characteristics. The sixth chapter discuses the trends and salient features of urbanization and growth of cities in Timor-Leste. The final chapter concludes with the main analysis of the 2010 Census results focusing on migration and urbanization, and policy recommendations. In addition, the limitations and future improvements to be considered in the census exercise with regard to Migration and Urbanization in Timor-Leste are also discussed at the end of the report.

CHAPTER 2

DATA COLLECTION, ASSESMENT AND METHODOLOGY

2.1 Data collection procedures and analysis

This monograph is based on the data collected on migration and population distribution in rural and urban areas including cities during the 2010 Census of Timor–Leste. In addition, the 2004 Census data on migration and urbanization is used to compare with the migration trends and flows at the time of the 2010 Census. The topics on which information on migration were collected in the 2010 census are as follows:

- 1. Place of birth: If born in the district or sub-district or country (if born outside TLS) was recorded. (The question -P15- Asked where wasborn? (Sub-district code or country if born outside TLS)
- 2. Place of usual residence: Although the place of usual residence was not a direct question in the Migration section of the 2010 Census of TLS, the place of enumeration which specified a usual member in the household was considered as a place of usual residence as the census was de-jure basis. (Census followed a de facto approach with a one question to get a de-jure population). The place of enumeration as district/sub-district was recorded.
- 3. Period of stay in the district or sub-district of usual residence: It was ascertained whether the person was born in the district or sub-district in which he/she usually resided and had been living there since birth. Otherwise the duration of usual residence was entered. (The question –P16- was: How long has ...been living in this sub-district?). The duration of stay was recorded in completed years, if less than 1 year was recorded "00".
- 4. Reasons for movement: If ... moved from other sub-district/country, reasons for movement were recorded –P17-
- 5. District of previous residence: Whether the previous residence before the move was in the same sub-district or district or country if outside TLS, the district/sub-district/ country code was entered. (The question –P 18- was: in which sub-district was....living before moving here?).
- 6. Citizenship/nationality: This question (P19) was asked to obtain information on foreign born persons who moved into sub-district/district of the TLS. This accounts for the international migrants to TLS.

During the 2004 Census of Timor-Leste, data on the above topics was also collected. However, much of the data was neither analyzed nor published. Therefore in order to compare the migration status of 2010, the 2004 data was also analyzed and referred to in this study.

2.2. Methodology

Three prominent methods are used in this analysis to understand the volume, pattern and flows of internal and international migration. The three methods are:

- 1. Lifetime migration and number of lifetime migrants are estimated using first method of place of birth and place of usual residence.
- 2. The second method uses the district of usual residence cross classified by district of previous residence and duration of residence to estimate recent migrants within specific time periods.
- 3. The volume, patterns and characteristics of international migrants during the inter censal period 2004-2010 are estimated from the method of exploring citizenship/nationality and cross classifying by socio-economic variables.

Details of each of these methods and definitions are given in the proceeding sections in the following chapters and Appendix A.

2.3. Assessment of Data Quality

The quality of migration and urbanization data depends on many factors at the pre-enumeration, enumeration and post-enumeration stages. At the pre enumeration stage, it is essential to define the enumeration areas, demarcate the administrative boundaries, proper definition of place of usual residence, identification and proper definition of urban and rural areas and definition of the cities. As migration involves a change in usual residence by crossing an administrative boundary, the concept of usual residence should be defined well. However, in some countries the usual residence is frequently not well defined though it generally involves some reference to duration of residence or to an intention to stay for a minimum period of time (Willekens, 1982). In this regard, the administrative boundary, viz. district or sub-district should be defined well to consider the change of usual residence. In such a case the consideration of change of place of usual residence within the geographical unit does not count as internal migration. However, in the case of Timor-Leste, the sub-district as well as district is clearly defined and hence those problems are not accounted for in the 2010 census data on migration. As the duration of residence was also enquired in the 2010 census, the idea of the time of migration can also be collected properly. At the enumeration stage, the measurement of migration in Place of Birth (POB) method should be correctly accounted for at district and sub-district level.

In the Timor-Leste 2010 Census, a question on the place of usual residence was clearly asked from each and every member of the household. However in some of the countries, for example in Sri Lanka, usual place of residence is asked with other questions asked in the migration section. If migration is estimated according to the place of birth and place of residence, then there will be a somewhat under enumeration of migration occurrence because at the time of count, people may return to their place of birth after movements. Hence, the volume of migration can be estimated using indirect measurements such as vital statistics method or forward survival ratio method. The quality of the data can also be assessed by using the above indirect methods that are employed in this study. However, according to vital statistics method, the accuracy of the volume of migrants cannot be estimated in case of Timor-Leste due to unavailability of vital statistics or administrative records in the country. Currently, the vital registration system and administrative records offer

very limited demographic data because they are not yet fully operational and therefore their coverage is low (NSD, 2010).

According to the forward survival ratio method (Appendix A), the expected number of migrants and their age structure in 2010 are estimated when compared with the enumerated number of migrants and age distribution. Although the number of migrants does not exactly tally with enumerated figures due to assumption of survival ratios, the similarity of age structure of migrants with expected estimates proves the authenticity of data collection to some extent. However, the reporting of non-responses for the place of residence and for some characteristics does not appear in the tabulations. This is due to editing of the data which was done before the analysis. All non-responses for most variables were imputed based on the edit rules discussed by the subject matter specialists. The level of imputations is available at the statistics office for further reference.

CHAPTER 3

VOLUME AND PATTERNS OF MIGRATION

3.1. Introduction

The volume, as well as the pattern of migration such as urban to urban or urban to rural provides a snapshot of the people's mobility in a country. It is indeed useful for policy makers to acquire an idea about the resources and the facilities available and also to know where there are excesses and shortages. Therefore the volume and pattern suggest the redistribution of population in a country. This chapter focuses on identifying the volume of migration at district and inter-district level, as well as major migration patterns such as rural-urban and urban-urban in Timor Leste. A person whose place of residence at the time of census differs from his/her place of birth is a life time migrant. The number of such persons or movements in a population is generally referred to as "lifetime migration" (United Nations, 1970). In contrast, a non-migrant refers to a person whose usual residence is the same as the place of birth. In the 2010 Census the district and sub-district of birth was recorded, not the town or village. Thus only life-time inter-district and inter sub-district migrants could be traced; i.e. those who have migrated from district or sub-district of birth to a usual place of residence in another district or sub-district.

The estimation of life-time migrants according to the place of birth is somewhat marginal due to several factors. Although in most cases the question on "Place of Birth" asked at the census was seemingly easy to understand and would be answered accurately, data on place of birth are overwhelmed with many problems. Due to deliberate misreporting and ignorance, the misstatement of place of birth occurs. Deliberate misreporting occurs regularly due to a tendency to state the name of a 'Suco' which is better known to them than a sub-district or district due to their knowledge. Sometimes misreporting could occur due to reporting the answers to the census' questions given by one member of the household who may not know the birth place of others, particularly of visitors and relatives who reside in the household. In these circumstances, the records on place of birth would be guesses.

Another major problem in estimating the lifetime migration by "using place of birth method" is that, it excludes all migratory movements that intervened between departure from the place of birth and arrival at the place of residence as reported at the date of census, and it does not count migrants as persons who moved away from and subsequently returned to their respective places of birth before the census date (United Nations, 1970). Moreover, the lifetime migration estimation does not cover the migration of persons who died before the census date. Thus the lifetime migrants and the amount of migration could be a gross under-statement because it excludes those migrants who had returned to the place of birth after one or several intervening moves referred to as "return migrants" and the migrants who died before the census time.

3.2. Volume of Lifetime Migration

According to the place of birth method, the volume of lifetime migration and inter-district migration pattern in Timor-Leste in 2010 are shown in Figure 1 and more details are given in Table B-1 and B-2 in Appendix B. In 2010, fourteen percent ((13.9%) or 120,969 persons of Timorese had left their place of birth to take up residence in another district (excluding returned migrants). In terms of current levels of migration, a small fraction of 12.2 per cent (internal migration rate) of the population or 128,142 persons had moved from one district to another.

Net Migration Life Time (-13735) - (-12,103) (-12,102) - (-8,953) (-8,952) - (-8,005) (-8,004) - (-1) 0-85,194

Figure 1: Volume of net-Migration by district, Timor-Leste 2010

Table B-1 in the appendix provides the Timor-Leste born population classified by district of usual residence by district of birth. The rows of this table represent the total population born in each district according to where they were usually residing as on the date of 2010 census. The columns represent the usual resident population in each district by their district of birth. The diagonal cell in the table which shows the person's whose place of residence and the place of birth are the same is called the non-migrant in each district of Timor-Leste. Thus the in-migrant into district is the total corresponding rows less the diagonal cell (i.e. non-migrants), whilst the out-migrants from a particular district is the total of the corresponding columns excluding the diagonal cell. The difference between the number of in-migrants and out-migrants in a given district or sub-district indicates the net migration. A negative number indicates that the district is losing population and a positive number that the district is gaining population. Based on these in and out-migration, the migration rates can be calculated by dividing the number of in-, out- or net-migrants by the respective population. The foreign born category (1.09 percent out of total residents) was excluded in the estimation of lifetime migrants. The detailed information on foreign born population is discussed under the section on international migration, chapter five.

As revealed from Table 3.1 which is summarized from Table 1 in Appendix-B, there have been considerable internal movements of persons in their lifetime within Timor-Leste. A conspicuous migratory movement is confined to Dili district (+85,194). There are more in-migrants than out-migrants in Dili and the net migration rate indicates Dili as a heavy in-migration district (36.4% to the resident population –Table 3.1). About 94,349 persons have moved into Dili not only from adjoining or neighbouring districts, but also from distant districts like Lautem, Baucau and Viqueque. The volume of in-migrants to Dili increased from 68,887 in 2004 to 94,349 in 2010 or 25,462 increase and it amounts to about 37 per cent increase during the period 2004 –2010 (Table 3.1). Thus the average annual growth of in-migration to Dili was 5.2 per cent. As a result, the population of Dili has increased from 173,541 (2004) to 228,564 (2010) with an average annual growth rate of 4.6 per cent which was much higher than that of national growth rate of 2.4 per cent during the same period.

Table 3.1: Lifetime In-Migration, Out Migration and Net Migration: estimated according to place of birth by place of residence, 2010

District	In Migration*	Out migration	Volume of Net Migration	Net migration Rate			
Ainaro	1,742	10,695	-8,953	-15.4			
Aileu	5,229	7,229	-2,000	-4.58			
Baucau	4,637	18,372	-13,735	-12.47			
Bobonaro	3,708	16,353	-12,645	-13.87			
Covalima	2,535	6,936	-4,401	-7.45			
Dili	94,349	9,155	85,194	37.27			
Ermera	3,614	11,947	-8,333	-7.13			
Liquiça	3,266	6,461	-3,195	-5.06			
Lautem	1,427	9,432	-8,005	-13.39			
Manufahi	2,893	6,051	-3,158	-6.5			
Manatuto	1,971	6,920	-4,949	-11.87			
Oecusse	891	4,608	-3,717	-5.85			
Viqueque	1,880	13,983	-12,103	-17.42			
*Excluded Foreign Born Population							

Table 3.1 shows that people in all districts in Timor-Leste, except Dili, have moved out in their life time. Among negative net-migration rates, very little movement has taken place to and from the districts of Liquiça (net migration rate -4.58%), Aileu (-5.06%), Oecusse (-5.85%) and Manufahi (-6.50%) (Figure 2).

LAUTEM VIQUEQUE MANATUTO MANUFAHI AINARG COVALIMA BOBONARO

Figure 2: Net-Migration Rates by district, Timor-Leste 2010

Table 3.2 provides information on net migration of population aged 5 years and older based on the 2010 Census for each district. The data clearly indicates that only Dili district has experienced a net intake of migrants, whilst there were net outflows of population in all other districts. The highest net outflow of population aged 5 years and above was reported in Viqueque whilst a considerable net outflow were also recorded in Ainaro (-18.0), Bobonaro (-16.0) and Lautem (-15.4).

Table 3.2: In-migration, out-migration and net migration of population, 5 years and older-2010

District	Total Population	Not Migrated	In Migration	Out migration	Net migration	Net migration Rate	In migration rate	Out Migration rate
Ainaro	48,608	46,896	1,606	10,357	-8,751	-18.0	3.3	21.3
Aileu	37,774	32,973	4,742	6,986	-2,244	-5.9	12.6	18.5
Baucau	94,647	90,088	4,234	17,516	-13,282	-14.0	4.5	18.5
Bobonaro	77,594	73,615	3,347	15,739	-12,392	-16.0	4.3	20.3
Covalima	51,321	48,143	2,398	6,489	-4,091	-8.0	4.7	12.6
Dili	198,616	100,518	91,291	7,770	83,521	42.1	46.0	3.9
Ermera	98,883	95,189	3,302	11,651	-8,349	-8.4	3.3	11.8
Liquiça	53,852	50,459	3,032	6,141	-3,109	-5.8	5.6	11.4
Lautem	50,904	49,423	1,238	9,052	-7,814	-15.4	2.4	17.8
Manufahi	41,599	38,586	2,707	5,855	-3,148	-7.6	6.5	14.1
Manatuto	35,665	33,677	1,831	6,714	-4,883	-13.7	5.1	18.8
0ecusse	52,769	51,242	777	4,404	-3,627	-6.9	1.5	8.3
Viqueque	59,095	57,247	1,688	13,519	-11,831	-20.0	2.9	22.9
Total Residence	901,327	768,056	122,193	122,193	0	-97.6	102.7	15.4

3.2.1. Lifetime net migration to Dili

Although in-migration flows to Dili are from all districts, the prominent district of origin sending about over 7,000 migrants to Dili are Baucau (15,904 or 17.5 per cent out of total in-migrants), Bobonaro (12,291 or 13.5%), Ermera (9,167 or 10.1%), Lautem (8,304 or 9.1%) and Ainaro (7,629 or 8.4%) as shown in Table 3.3. This indicates that the distance to migration does not matter because people had moved from the western part (Bobonaro and Ermera), as well as eastern part (Baucau) or even Far-Eastern Part (Lautem) to Dili due to push and pull factors; a clear picture of net life migration as shown in Figure 3.

Table 3.3: Net Lifetime Migration to Dili- 2004 and 2010

District	In-migration	Out-migration	Net-migration	Net-Migration
District	to Dili -2010	from Dili-2010	to Dili-2010	to Dili-2004
Ainaro	7,629	283	7,346	4,713
Aileu	5,829	2,634	3,195	2,370
Baucau	15,904	1,240	14,664	11,938
Bobonaro	12,291	606	11,685	7,558
Covalima	4,691	247	4,444	2,610
Ermera	9,167	677	8,490	5,967
Liquiça	5,030	951	4,079	3,234
Lautem	8,304	505	7,799	5,144
Manufahi	4,674	621	4,053	2,815
Manatuto	5,654	549	5,105	3,435
Oecusse	3,846	259	3,587	1,834
Viqueque`	11,330	583	10,747	8,880
Total	94,349	9,155	85,194	60,498

Note: Streams less than 500 are not Shawn LAUTEM BAUCAU OECUSSE

Figure 3: Net lifetime Migration to between districts, Timor-Leste 2010

The volume of migration to Dili in 2004 is higher than in 2010, although there was the same pattern of the influx of population to Dili as a result of the majority who returned from abroad to Dili after independence (Figure 4).

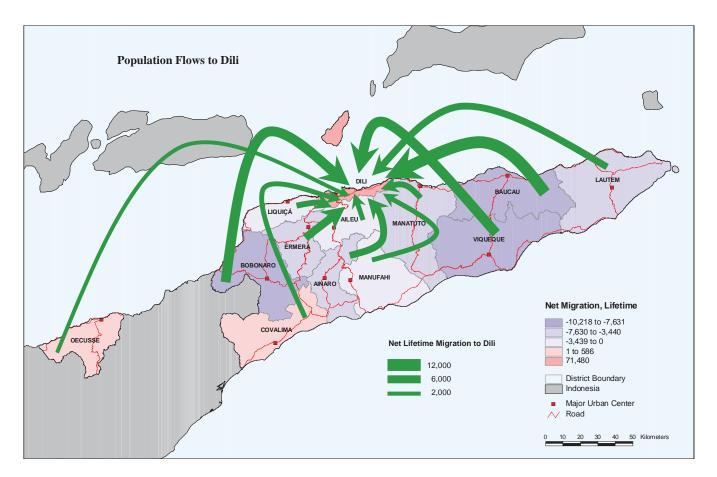


Figure 4: Population flows to Dili, 2004

3.2.2. Streams of Lifetime Migration

The three largest streams of lifetime in-migrants to each district are presented in Table 3.4. The conspicuous feature in the three largest streams of lifetime in-migrants is that most districts received the in-migrants from their major sending districts for more than half their migrants. For instance, Covalima and Bobonaro received 83.2 per cent and 81 per cent respectively of their in-migrants from the adjacent districts of Dili (9.7 %) and Ainaro (6.7 %) and particularly Bobonaro (66.8%) to Covalima, whilst the in-migrants to Bobonaro received from Covalima (39.6%), Ermera (25.1%) and Dili (16.3%). Dili is an exception in that it received only 42 per cent of migrants from the three largest streams from Baucau (16.9%), Bobonaro (13%) and Viqueque (12%).

Table 3.4: The Three largest streams of Lifetime In-Migrants to each district, 2010

		The three largest Streams					Total of	
District of	Total in	Largest		Second Largest		Third Largest		three
Residence	migrants	District	Dawaantaga	District	Davaantaga	District	Dawaantara	Largest
		District	Percentage	District	Percentage	District	Percentage	streams
Ainaro	1,742	Manufahi	26.9	Dili	16.2	Aileu	15.4	58.5
Aileu	5,229	Dili	50.4	Ainaro	18.3	Ermera	9.5	78.2
Baucau	4,637	Viqueque	34.0	Dili	26.7	Lautem	13.5	74.2
Bobonaro	3,708	Covalima	39.6	Ermera	25.1	Dili	16.3	81.0
Covalima	2,535	Bobonaro	66.8	Dili	9.7	Ainaro	6.7	83.2
Dili	94,349	Baucau	16.9	Bobonaro	13.0	Viqueque	12.0	41.9
Ermera	3,614	Bobonaro	23.3	Liquiça	20.3	Dili	18.7	62.4
Liquiça	3,266	Dili	29.1	Ermera	22.6	Bobonaro	17.8	69.5
Lautem	1,427	Dili	35.4	Baucau	25.1	Liquiça	7.9	68.4
Manufahi	2,893	Ainaro	33.1	Dili	21.5	Manatuto	12.0	66.6
Manatuto	1,971	Dili	27.9	Baucau	17.7	Viqueque	17.4	62.9
Oecusse	891	Dili	29.1	Manufahi	12.6	Bobonaro	9.4	51.1
Viqueque	1,880	Baucau	39.8	Dili	31.0	Lautem	5.3	76.2

Table 3.5 depicts the three largest streams of lifetime out-migration from each district. The remarkable feature in the three largest streams of lifetime out-migrants from most districts is the movement of out-migrants to one of the three largest receiving districts which accounts for more than 80 per cent, except Dili (53%). It is evident that more than 70 per cent of migrants from all 12 districts moved out to Dili district. Thus Dili has been a prominent district of destination, while from Dili, considerable migrants moved out to Aileu (29%), Baucau (14%) and Liquica (10.4%). The second largest attractive districts that migrants moved out to is Bobonaro (21%) whilst the third highest out-migrant district is Liquica (10% see, Table 3.5).

Table 3.5: The Three largest Streams of Lifetime Out Migrants from each district, 2010

		The three largest Streams						Total of
Thuas	Total in migrants	Largest		Second Largest		Third Largest		three
Three		District	Percentage	District	Percentage	District	Percentage	Largest
								streams
Ainaro	10,695	Dili	71.3	Manufahi	9.0	Aileu	8.9	89.2
Aileu	7,229	Dili	80.6	Ermera	5.0	Ainaro	3.7	89.3
Baucau	18,372	Dili	86.6	Viqueque	4.1	Aileu	1.9	92.5
Bobonaro	16,353	Dili	75.2	Covalima	10.4	Ermera	5.1	90.7
Covalima	6,936	Dili	67.6	Bobonaro	21.2	Ainaro	2.5	91.3
Dili	9,155	Aileu	28.8	Baucau	13.5	Liquiça	10.4	52.7
Ermera	11,947	Dili	76.7	Bobonaro	7.8	Liquiça	6.2	90.7
Liquiça	6,461	Dili	77.9	Ermera	11.4	Bobonaro	2.6	91.8
Lautem	9,432	Dili	88.0	Baucau	6.6	Viqueque	1.1	95.7
Manufahi	6,051	Dili	77.2	Ainaro	7.7	Aileu	3.5	88.5
Manatuto	6,920	Dili	81.7	Manufahi	5.0	Baucau	3.7	90.4
0ecusse	4,608	Dili	83.5	Liquiça	4.1	Baucau	3.0	90.5
Viqueque	13,983	Dili	81.0	Baucau	11.3	Manatuto	2.4	94.8

Rural-urban migration levels remain high, with resultant widespread unemployment amongst the country's substantial young population. To deal with these levels of unemployment, there is a vital need to develop the non-oil economy in a sustainable way. This requires facilitating investment and substantial improvements in the country's infrastructure (UNDP, HDR, 2011).

3.2.3. Lifetime Migration by sub-districts

The volume of lifetime in-migration, out-migration and net-migration for sub-districts are estimated and given in the Appendix Table 4 and it is clearly depicted in Figure 5. According to the estimates of net-migration by sub-districts, it is remarkable that 82% of the sub-districts (53 out of 65 sub-districts) had negative volume of net-migration which indicates that majority of sub-districts lose their resident population being more out-migrants than in-migrants. The absolute volume of migrants into or out of a sub-district, since it does not relate to the sub-district's own resident population, does not provide a suitable measure for inter sub-district comparison. Thus an appropriate measure is the number of migrants per 100 resident population (net-migration rate) of the sub-district. Accordingly, most notable sub-districts which had more out-migrants than in-migrants relative to own resident population (negative net-migration rates) are Bobonaro (-36.3%) in Bobonaro district, Maukatar (-35.7%), Forohem (-31.4%), Fatumean (-30.8%) in Covalima district and Luro (-50.5%) in Lautem district which show more than 30 per cent (Figure 5). The higher negative rates of net-migration are found in some sub-district with a relatively small population (eg. Fatumean, Forohem and Luro).

All sub-districts, except Atauro in Dili district which is the most populous district in Timor-Leste, ranks a relatively high positive migration rate that gained a number of migrants relative to their resident population. Out of five sub-districts in the Dili district, Cristo Rei recorded the highest gained migrants (54%) followed by Vera Cruz (31.3%). The highest attraction of migrants to Cristo Rei and Vera Cruz may be due to the many recreational facilities in the vicinity of the beach area and most diplomatic and residential sites in the area. In addition, Baucau sub-district in Baucau district, Maliana in Bobonaro district, Suai and Tilomar in Covalima district, Railaco in Ermera district and Pante Macasar in Oecussi district have also gained more in-migrants than out-migrants, though the absolute volume of migrants is relatively small.

NET_MIGRATION 12423 - 56006 TUTUALA -8613 - -3708 144 - 12422 -3707 - -41 40 - 143 LAUTEM ILIOMAR LURO BAGUIA MATUCARBA QUELICAI PANTE MACASAR BAUCAU PASSABE /ENILALE VIQUEQUE OSSO VIQUEQUE BAUCAU VEMASE NITIBE LACLUTA LALEIA MANATUTO MANATÚTO LACLUBAR FATUBERLIU LACLO ALAS MANUFAHI LIQUIDOE REMEXIO HATU-UDO AILEÙ ATAURO AILEU VILA ATU-BUILIC AINARO RAILACO COVALIMA BAZARTETE ERMERALETEFOHO ZUMALAI ATSABE SUAI HATOLIA LIQUIÇÂ MAUKATAR LOLOTOE LIQUICA BOBONARO TILOMAR ATABAE BALIBO z

Figure 5: Volume of Net-migration by Sub-district, 2010

3.3. Volume and Patterns of Recent Migration

As discussed earlier, migration information according to the "place of birth method" (POB method) does not provide the number of migratory movements and therefore place of current residence versus place of previous residence provides the residence at the time of the last move. Thus, the data provided identification of persons as recent migrants whenever their place of last residence differed from their current place of residence. However, these migrants include all lifetime migrants, plus return migrants before the census date. The current usual place of residence by previous residence provides the origins and the destination of the last move.

The persons who changed their previous residence of district to move to Dili are 82,968 or 83.9 per cent of the total recent migrant population in Dili (Table 3.6). Prominent previous resident districts to Dili are Baucau (13,811 or 17.3% out of total recent in-migrants), Bobonaro (11,162 or 14%), Viqueque (9,596 or 12%), Ermera (8,174 or 10.2%) and Lautem (7,211 or 9%) (Appendix, Table 3).

Table 3.6: In and Out Recent Migrants	. 2010

Total	Total recent migrant*	non migrants	In-migrant	out -migrant	net-migrant	
Ainaro	2,831	1,328	1,503	9,090	-7,587	
Aileu	4,396	1,383	3,013	6,103	-3,090	
Baucau	11,008	7,041	3,967	15,748	-11,781	
Bobonaro	6,946	4,527	2,419	14,369	-11,950	
Covalima	5,214	3,123	2,091	5,173	-3,082	
Dili	98,906	15,938	82,968	8,286	74,682	
Ermera	6,755	3,947	2,808	10,473	-7,665	
Liquiça	4,875	1,965	2,910	5,562	-2,652	
Lautem	5,847	4,453	1,394	8,126	-6,732	
Manufahi	4,228	1,752	2,476	5,192	-2,716	
Manatuto	3,444	1,738	1,706	5,960	-4,254	
0ecusse	5,248	4,458	790	4,163	-3,373	
Viqueque	4,023	2,262	1,761	11,561	-9,800	
Total	163,721	53,915	109,806	109,806	0	

^{*}Excluding foreign born population

3.4. Migration by duration of current residence

Duration of current residence provides how long a person lives in the current place of residence after migrating to that place. If a person says that he/she had stayed in current place of residence since birth, then it provides an idea that he/she is a non-migrant and otherwise the people who state any duration of residence are migrants. In general, the information on duration of current residence can provide the timing of migration and the cohorts as well.

The responses on duration of residence and previous residence may also have their own problems. As one member of a household usually responds for all others, both previous residence and duration of current residence may be erroneously reported. In some instances this may be totally excluded. In the 2010 census, the proportion of migrants who did not state their previous residence and duration of current residence were zero. This is because the data was edited to remove all not reported cases. The editing, however, did not change the distribution and pattern of reporting.

Table 3.7 (A and B) provide the information on duration of residence for males and females in 2010. The majority of migrants, both males and females, moved to Dili from the place of previous residence since the last ten years period. In all other districts, both males and females of in-migrants have lived in the current place of residence for 1-4 years. Some people also responded that they have lived longer than 10 years (Table 3.7 A and B). This provides different cohorts who have in migrated to each district.

Table 3.7:Migration by duration of previous residence, 2010

A: Internal migration in percentage (male)								
lutamal miduation	Total	N	Total In	Du	ration of reside	nce in migrant		
Internal migration	Total	Non migrant	migrant	Under 1	1-4	5-9	10 +	
Average	100	92.17	7.13	0.93	1.92	1.08	3.20	
Ainaro	100	97.12	2.68	0.42	0.60	0.39	1.27	
Aileu	100	89.20	10.70	1.15	2.13	1.58	5.84	
Baucau	100	96.02	3.67	0.50	1.35	0.52	1.29	
Bobonaro	100	95.11	4.25	0.59	0.81	0.65	2.20	
Covalima	100	93.81	4.74	0.39	0.91	0.66	2.79	
Dili	100	54.39	42.42	5.04	12.42	6.75	18.21	
Ermera	100	97.29	2.43	0.47	0.51	0.33	1.13	
Liquiça	100	95.15	4.36	0.90	1.24	0.81	1.41	
Lautem	100	97.34	2.28	0.27	0.66	0.32	1.04	
Manufahi	100	93.27	6.03	1.09	1.44	0.73	2.77	
Manatuto	100	94.51	5.08	0.74	1.71	0.65	1.97	
Oecusse	100	97.63	1.58	0.20	0.40	0.23	0.76	
Viqueque	100	97.31	2.43	0.35	0.73	0.42	0.93	

B: Internal migration in percentage (female)								
Internal migration	Takal	None	Total In	In Duration of residence in migrant				
Internal migration	Total	Non migrant	migrant	Under 1	1-4	5-9	10 +	
Average	100	91.85	7.37	0.91	1.91	1.15	3.40	
Ainaro	100	96.50	3.32	0.35	0.75	0.56	1.66	
Aileu	100	86.48	13.33	1.04	2.47	2.12	7.71	
Baucau	100	94.94	4.76	0.59	1.58	0.78	1.80	
Bobonaro	100	95.30	3.88	0.48	0.79	0.62	1.99	
Covalima	100	94.93	3.84	0.33	0.68	0.52	2.30	
Dili	100	56.96	40.00	5.04	11.70	6.38	16.87	
Ermera	100	95.83	3.76	0.42	0.71	0.49	2.14	
Liquiça	100	93.30	6.01	0.83	1.50	1.00	2.67	
Lautem	100	97.06	2.49	0.33	0.76	0.41	0.99	
Manufahi	100	93.55	5.86	0.85	1.47	0.94	2.60	
Manatuto	100	95.28	4.36	1.00	1.20	0.44	1.72	
0ecusse	100	97.12	1.23	0.15	0.44	0.16	0.48	
Viqueque	99	96.78	2.98	0.34	0.82	0.55	1.27	

3.4.1. Reasons for Internal Migration

People take decisions to move due to several reasons. These are explained by several migration theories. The reasons may be personal, economic, social, environmental or political. Unlike the 2004 Census, the 2010 Census of Timor-Leste asked reasons for their internal migration. The question was close-ended with eight responses, including six definite responses: for education, employment/ in search of employment, marriage, followed family and due to conflict or for other reasons. Two indefinite responses were either did not move or don't know.

As shown in Table 3.8, the majority of migrants (30.7%) move for the purpose of following family and almost the same proportion of migrants in urban and rural areas had also moved for the identical purpose. The next highest reason for movement is education (30%) and this reason is obviously more evident in urban areas (33.7%) than rural areas (19%). The other prominent reasons for movements are marriage and search for employment, whilst in the urban areas search for employment is a discerned factor compared to the rural areas. Thus the 2010 Census revealed education, followed family and employment as the main reasons for migration in urban areas in Timor-Leste.

Table 3.8: Reasons for migration, 2010

Reasons for in-migration	Number	Total (%)	Urban (%)	Rural (%)
Education	38,455	30.0	33.7	19.0
Employment/in search of employment	22,269	17.4	19.8	10.1
Marriage	20,394	15.9	10.7	31.7
Followed family	39,359	30.7	30.6	31.1
Conflict	5,873	4.6	4.0	6.3
Other	1,792	1.4	1.3	1.8
Total	128,142	100	100	100

CHAPTER 4

CHARACTERISTICS OF MIGRANTS

4.1. Introduction

This chapter deals with the basic demographic and socio-economic characteristics of internal migrants in Timor-Leste. Studies on migration have consistently found that the demographic and socio-economic characteristics of migrants differ from the non-migrants and in-migrants from out migrants (Rose, 1966). Thus the specific characteristics of migrants suggest the selectivity of migrants at origin, as well as destination. Ravenstein (1885) and Lee (1966:56-57) developed a hypothesis about the characteristics of migrants, emphasizing that "Migration is selective and the migrants are not a representative cross section of the population or not a random sample of the population at the point of origin". Most studies on migration have concluded that the migrants come from the segment of population which has different socio-economic characteristics from the people who are in the place of destination and place of origin. In most cases a migrant is able to change one or more components of his socio-economic status during or after migration. For instance, occupational status can often be changed after migration. Therefore, it is important to examine the socio-economic characteristics of migrants at both places of origin and destination in order to understand not only the socio-economic status of the individuals, but also the influence of the socio-economic conditions of both places. However, due to limited data in the 2010 Census, it is only possible to examine the socio-economic characteristics of migrants at the place of destination.

4.2. Demographic Characteristics of lifetime migrants

The age and sex composition of migrants is important because it is related to many other characteristics and has recognized effects upon the socio-economic development of the community. In developing countries especially, the socio-economic differences between age cohorts are often great. Therefore, it is important to know to what extent age and sex factors operate in the selectivity of migrants in Timor-Leste.

Two types of age distribution of migrants are important in the analysis of migration. One is the age distribution of migrants at the time of migration and the other is the age distribution at enumeration. However, Timor-Leste's both censuses of 2004 and 2010 never included a question about age at the time of migration. Assuming that there has only been one movement, it is still possible to estimate the age cohort from responses about duration of residence. This analysis is based on this assumption of a single move and on data for age at enumeration in 2010.

The age segments generally represent life cycle stages. For instance, the first three age groups of net migrants (0-14) contain children who tend to migrate with their parents whilst the next three age groups (15-29) are the youths who are mostly active in the labour force and the majority of males in this age group are single and tend to move because of employment prospects. Moreover, in the subsequent age groups (30-44) most men and women are married and raising children; therefore, the women tend to move with husbands to help them. Whilst in the rest of the age groups (45-59) people are still in the labour force and tend to move, especially in the government sector, for employment promotional prospects. In the last segment of the age distribution (60+ years) a

large proportion of men are retired, therefore, after retirement they either return to their home district or sub-district or come to major urban areas for business or work in the private sector where the age limit is not considered.

The age distribution of net migrants in Timor-Leste also represents the above facts. As revealed from Figure 6, the majority of lifetime net migrants (40.8%) in Timor-Leste are young (15-29). Out of total lifetime net migrants, about 13 per cent are in the age group 5-14 who may move for educational purpose. Moreover, 24 per cent of the net migrants are in 30-44 age groups which represent the migrants who followed the family. It is clear that the age selectivity of migrants is different when compared with the age pyramid of non-migrants (Figure 7). As similar to total population, a small proportion (6.6%) out of total net migrants is in the old age 60+ (Figure 7). Thus, as consistently found in the internal migration studies, the young are more prone to migrate even in Timor-Leste.

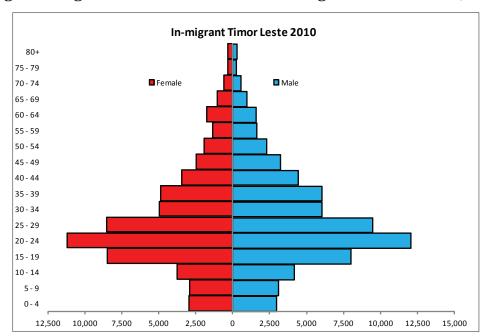


Figure 6: Age-sex distribution of Internal Migrants Timor-Leste, 2010



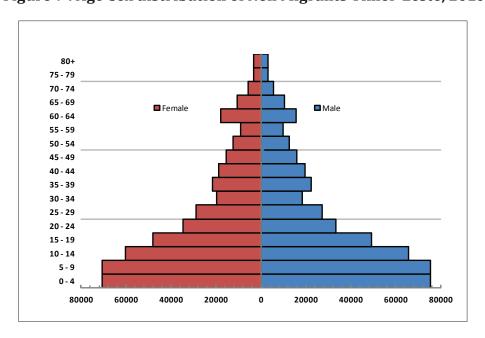


Table 4.1 shows the age-sex distribution of recent migrants who migrated less than 5 years prior to census enumeration. The overall sex ratio clearly reveals that male migrants were dominant as of 105 male per every 100 female migrants in Timor-Leste in 2010. Noticeably, there are more males than females in most age groups, except 15-19 and ages 60 years and above (Table 4.1). The highest sex ratio was found in the ages between 40-59 years where the males highly dominated in the 2010 census. As discussed earlier, people aged 40-59 who tend to move for higher job aspirations may contribute to the male dominance.

Table 4.1: Age-sex distribution of Recent Migrants, 2010

Age	Male (%)	Females (%)	Total	Sex Ratio
0 - 4	2.8	2.7	5.5	103.1
5-9	3	2.8	5.8	107.7
10-14	3.7	3.4	7.2	109.3
15 - 19	6.2	6.6	12.7	94.1
20 - 24	7.9	7.6	15.5	103.7
25 - 29	6.4	6.2	12.6	102.3
30 - 34	4.4	4.2	8.6	104.8
35 - 39	4.5	4.1	8.7	109.1
40 - 44	3.5	2.9	6.4	119.3
45 - 49	2.6	2.1	4.7	125.1
50 - 54	1.8	1.6	3.4	115.5
55 - 59	1.3	1.1	2.4	117.8
60 - 64	1.3	1.5	2.8	87.4
65 - 69	0.8	0.9	1.7	91.5
70 - 74	0.5	0.5	1	91.4
75-79	0.2	0.3	0.5	82.5
80-841	0.1	0.1	0.3	83.8
85+	0.3	0.1	0.3	100.4
Total	51.2	48.8	100	104.9

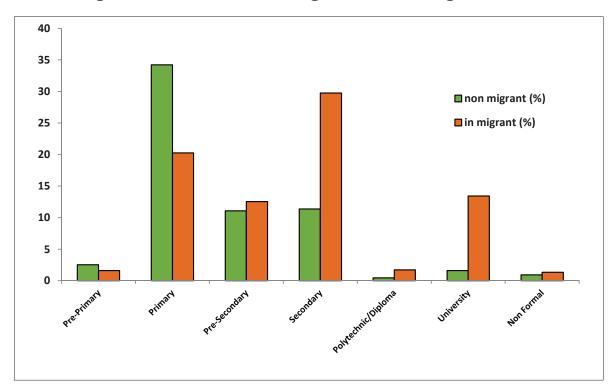
4.3. Socio-economic characteristics of lifetime migrants

There are several socio-economic characteristics which differentiate the migrants at the origin and destination, migrants and non-migrants and in- and out- migrants. However, this analysis is limited to examining the major social characteristics such as education, marital status and religion, as well as economic characteristics such as labour-force and occupation in order to understand the specificities of lifetime migration.

4.3.1 Education

A major factor to be considered is the relationship between educational attainment and migration because the aspirations and expectations of migrants vary according to their level of education. For instance, a migrant who is well educated tends to migrate to a major urban area in order to find a white- or blue- collar job. Therefore, educational attainment is one of the best available indicators of both the socio-economic status of migrants and the qualification of migrants for work at the destination. However, as revealed from the educational attainment of migrants in Timor-Leste in 2010, it does not seem a strong case to prove evidence for educational status because the majority of total in-migrants had primary (20.8%) or secondary level education (40.4%) whilst only 13 per cent had a higher level of education (Figure 8 and Table B-6 in Appendix B).

Figure 8: Education level of Migrants and Non migrants, 2010



In comparison to non-migrants, the migrants had secondary and higher educational status. On the other hand, the high proportion of non-migrants who had below secondary level of education suggest that they were not motivated to move to other districts or urban areas because they can find a job or they are comfortable to live in rural areas according to their educational status. This discloses the fact that education variable is an important motivational factor for internal migration in Timor-Leste.

There is a clear gender disparity of educational attainment of migrants when compared to non-migrants. As revealed from Table 4.2 among the migrants, more male migrants have higher level of educational attainment (Secondary, Polytechnic/Diploma and University) than that of female migrants. On the other hand, the migrants as well as non-migrants have similar gender disparity among persons who do not attend school (Table 4.2).

Table 4.2: Educational Level of In-migrants and Non-migrants by sex, 2010

Educational level	In-m	nigrants	Non-Migrants	
Educational level	Male	Female	Male	Female
Pre-Primary	1.5	1.6	2.2	2.1
Primary	20.2	18.4	30.4	27.1
Pre-Secondary	11.5	12.5	9.3	9.3
Secondary	29	27.7	10.2	8.9
Polytechnic/Diploma	1.9	1.4	0.5	0.3
University	15.2	10.2	1.7	1
Non Formal	1.3	1.3	0.8	0.8
N.A.	19.4	26.9	44.9	50.5
Total	100	100	100	100

4.3.2 Marital Status

The earlier studies suggest that migrants tend to be single, particularly if younger, though there is no uniformity in marital status condition. However, recent studies have found that the adult population in a region or country can be expected to be married, and as married generally move together; there is a considerable higher proportion of married migrants than single, widowed or divorced. In Timor-Leste's context, 51.1 percent of the internal migrants aged 10 years and above are married and a considerable proportion (45%) of migrants are single (Table 4.3). However, it is discernible that the migrants to Dili are mostly single (64.2%), compared to 33.2 per cent who are married. This discloses that single persons were more prone to move than the married in Timor-Leste. However, the migrants who move to Dili district which is the capital district of Timor-Leste are mostly single persons because of pull factors such as jobs availability and educational facilities. Among the migrants, widowed are slightly less, compared to non-migrants.

Table 4.3: Percentage distribution of 10 year and above by marital status of Migrants and Non migrants, 2010

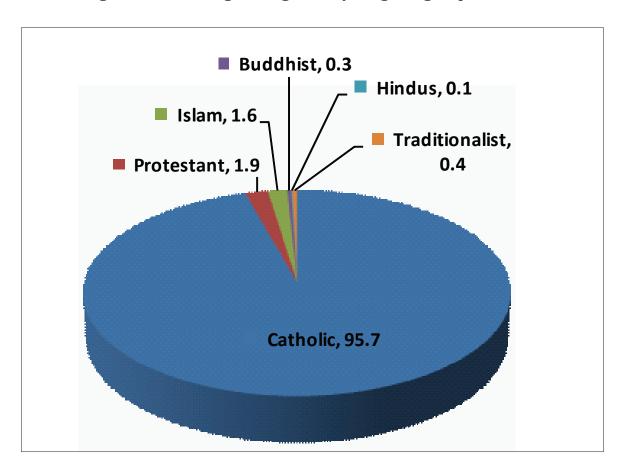
Marital Status	Non migrants	In-migrants	Internal migrants
Single/Never married	48.7	47.1	48.4
Married	45.3	49.5	46.0
Widowed	5.4	3.0	5.0
Divorced	0.3	0.2	0.3
Separated	0.2	0.1	0.2
Total	622,026	116,180	738,206

The selectivity of marital status in relation to migration varies according to the time of migration and the time of enumeration. The present analysis considers the marital status of migrants at the time of enumeration because census does not provide such information at time of migration.

4.3.3 Religion

In most countries it is found that not only socio-economic factors, but cultural factors are related to migration as well. Religion and migration has a clear relationship, as the population in the predominant religious group tends to move more than the other religious groups. This is confirmed in the case of Timorese as revealed from the 2010 Census. There was a higher tendency of movement predominantly among Catholics (95.7%), who are major religious group than the other minor religious groups such as Protestant/Evangelical (1.9%), Islam (1.6%), Buddhist (0.3%), Hindus (0.1%) and Traditional and other faith groups (0.4%) (Figure 9).

Figure 9: Percentage of migrants by religious groups 2010



4.3.4 Labour Force

It is expected that labour force participation is higher among the migrants than non-migrants, perhaps due to the principal reason for migration being employment. The difference between migrants and non migrants is more evident at the time of enumeration than at the time of migration. In the 2010 Census of Timor-Leste, the only data available are the labour force characteristics of migrants at the place of destination which give some evidence about economic motivations of the migrants. Among the migrants in Timor-Leste, 45 percent of the migrants are in the labour force (employed and unemployed). Of the labour force 86 per cent are employed. It is important to note that as people; especially youth move for employment. However, due to the unavailability of jobs, 14 per cent of migrants who are in the labour force were unemployed (Table 4.4).

Table 4.4: Labour Force Status of Migrants, 2010

Labour force status	Migrants (%)		
Active Population	45.1		
In-Active Population	54.9		
Employment Rate	86		
Un-Employment Rate	14		

The above characteristics of migrants disclose that they are different from the non-migrants and they have specific motivational factors to make decisions to move. Therefore, these migrants were prone to move internally in the country.

4.3.5 Occupation

The occupational composition of the migrants is important because it reveals the allocation of employed migrants among the different categories of occupation. For purpose of the analysis, the major occupational categories were considered. As seen in Table 4.5, most migrants are engaged in non-agricultural activities compared to non-migrants, and among them 27 per cent are service and sales workers whilst 23 per cent are in agricultural, forestry and fishery related occupations.

A considerable proportion of migrants are managers (5.2%), senior officials, legislators and professionals (4.8%) when compared to non migrants (Table 4.5).

The 2010 Census further reveals that among working migrants in professional, administrative and management related jobs category and in production related category, the proportion of males was greater (sex ratio is 104-106 males per 100 females) than that of females in those occupational categories. Among the non-migrants, females are preponderance in agriculture and fishing related occupation category.

Table 4.5: Percentage Distribution of In-migrants and Non-migrants (aged 15+ years) by Occupational Category, 2010

Major Occupational Categories	In- Migrants (%)	Non-Migrants (%)
Managers, senior officials and legislators	5.2	1.7
Professionals	4.8	1.3
Technicians and associate professionals	3.6	1.0
Clerks and clerical support workers	12.3	3.9
Service and sales workers	26.8	8.4
Agricultural, forestry and fishery workers	23.4	75.3
Craft and related trades workers	8.0	3.4
Plant and machine operators, and assemblers	6.8	1.8
Elementary occupations	8.1	3.1
I Armed forces occupations and workers not classified by occupations	1.0	0.1
Total	100	100

In general, the high proportion of migrants are in professional, clerical and related work, administrative and service and sale related occupations. This reflects the selectivity of migration when compared to non-migrants.

CHAPTER 5

OVERSEAS BORN POPULATIONS

5.1. International migration

International migration is a significant component in the migratory movement, as well as a major factor in Timor-Leste, especially concerning population growth of Dili. A considerable proportion of Timorese population are former immigrants from overseas such as Portugal and Netherlands who had lived there during colonial rules in Timor-Leste for about 450 years and from Indonesia who ruled for 27 years before its independence of 2002. The other nationalities who were reported at the 2010 Census as foreign born are the immigrants to Timor-Leste. Their patterns and rates of movement differed from those of Timorese population, partly because of occupational and other socio-economic differences, and also due to security conditions that prevailed in Timor-Leste after civil instability conditions experienced in 2006.

5.2. Volume and pattern of movements

In 2010, overseas-born people comprised 1.08 per cent of the total population. The number of immigrants slightly increased from 11, 345 in 2004 to 11,537 in 2010, although the proportion of foreign born population to the total population decreased from 1.23 per cent to 1.08 per cent, respectively. As revealed from the 2010 Census, out of the international migrants, the majority (78.8%) were from Indonesia, whilst second and third largest group of immigrants were from China (5.1%) and Philippines (4%), respectively (Table 5.1). Of the overseas-born population, 2.1 per cent represent the Australians who have the relative advantage of being in close proximity to Timor-Leste.

Table 5.1: Number and Percentage distribution of International Migrants by Country of Origin, 2010

Country of origin	Number	Percentage	Country of origin	Number	Percentage
Australia	248	2.1	Singapore	26	0.2
Bangladesh	45	0.4	Thailand	57	0.5
Brazil	88	0.8	USA	47	0.4
China	586	5.1	Vietnam	75	0.7
Cuba	39	0.3	Other African	106	0.9
Indonesia	9, 091	78.8	Other American	9	0.1
Malaysia	110	1.0	Other Asian	116	1.0
New Zealand	24	0.2	Other European	83	0.7
Pakistan	34	0.3	Other Pacific	13	0.1
Philippines	467	4.0	Other	134	1.2
Portugal	139	1.2	Total	11537	100

During the struggle for independence in Timor-Leste, more than a quarter of a million people who left to other countries, (greater number to Indonesia and lesser number to Australia and Portugal), mostly returned to the country after the formal declaration of independence in 2002 (Hamilton, 2004). Some returnees appeared as overseas-born population in 2010, as well as in 2004. Due to political instability in the country, the current UN Mission was established since the 2006 riots and as a result, a small number of other nations also moved to Timor-Leste for the specific occupation assigned by the UN Mission. However, it would be expected that this volume of foreignborn population will decrease to some extent after the closure of the UN mission by end of December, 2012.

According to previous investigations, there were about 28,000 refugees living outside the country (Hamilton, 2004), whilst Australian Bureau of Statistics reported that approximately 9,000 people from Timor-Leste were living in Australia (ABS, 2006). Moreover, many young Timorese have moved, particularly to Ireland and UK, via Portugal to seek for jobs overseas due to economic stagnation, poverty and unemployment (Shuaib, appear in www.ausaid.gov.au/publications/pdf/etimor_study.pdf). However, these refugees and the youths will be expected to decrease in future as the country is moving towards peace and socio-economic development.

As revealed from the 2010 Census, the bulge of the overseas-born people (61.8%) are in Dili district because the capital city is located in this district where more employment opportunities exist in the commercial and administrative sectors (Figure 10 and Table 5 in Appendix B). The other two districts attracted by the overseas-born people are Covalima (6.9%) and Oecusse (6.7%), which are coastal areas and regional hubs

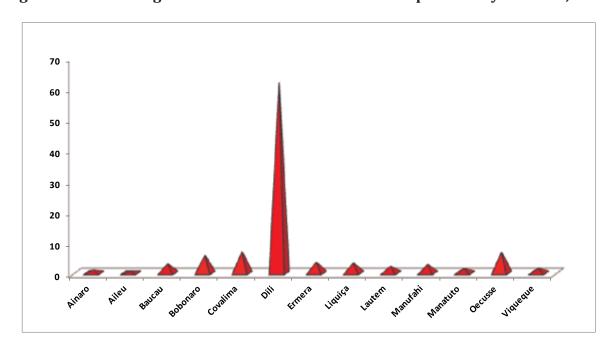


Figure 10: Percentage distribution of Overseas-Born Population by districts, 2010

5.3. Demographic and selected socio-economic characteristics

In the 2010 Census, the immigrants who had moved from twenty one countries, who reported in the census as foreign-born are not homogeneous population. They differ from each other by education, religion, ethnicity, culture and other socio-cultural aspects compared to Timorese. However, the attempt here is to examine basic characteristics of them as a whole group in order to highlight the characteristics of international migrants.

5.3.1. Age-Sex composition

The majority of immigrants (74.1%), both males and females, who moved to Timor-Leste are between the ages of 20-54 years which is represented in the working environment. Of these immigrants, 38 per cent are in the age group of 30-39 (Figure 11), which is the most economically active ages. As revealed from the age-sex pyramid based on 2010 Census, international migration is male dominated; in 2010 there were about 103 overseas born males in Timor-Leste per hundred overseas-born females in all ages. In 2010, the sex ratio (males per 100 females) was highest as of 117 overseas-born males per 100 that of females especially in Dili district. This suggests that there are more job and other opportunities for males than females in Dili District. However, in view of over representation of males and under representation of children, especially in the age group of 5-19 years (schooling ages), the age-sex structure of foreign born population substantially differ from the native population in Timor-Leste. Political instability and unemployment may have led to persons moving to Timor-Leste leaving behind female spouses. Therefore there is an apparent sex imbalance in the sex structure, especially in the working ages.

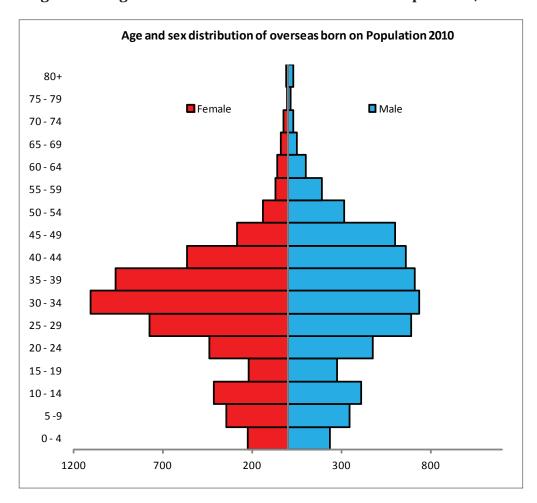


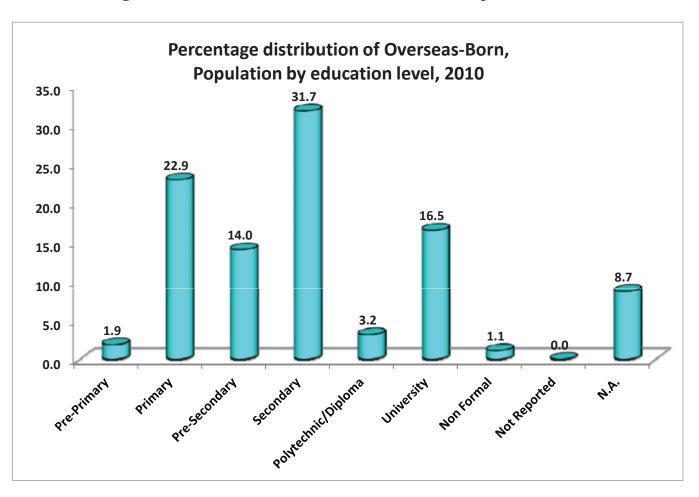
Figure 11: Age-sex distribution of Overseas-Born Population, 2010

5.3.2. Socio-economic characteristics

As revealed from Figure 12, in 2010, the majority of overseas-born population (30.4%) had secondary level education. Twenty four per cent had primary education, whilst 16 per cent had education at university level.

This educational level is reflected by their engagement in the level of occupation. Moreover, Census results show that males are more educated than females among the overseas-born population.

Figure 12: Educational Status of Overseas-Born Population, 2010



The occupational status of the total, as well as, the three sequential highest overseas-born populations aged 15 years and above in 2010, is provided in the Table 5.2. Noticeably, the majority of the overseas-born population aged 15 and above are engaged in service and sales occupations (30%), whilst this proportion is relatively high among the Chinese (57%) followed by Indonesians (33%). There is a considerable foreign-born population, in total, as well as immigrants from three other selected countries of Indonesia, China and Philippines who are also engaged in occupations of skilled agricultural sector and craft and related trades (Table 5.2). Among these three giant immigrants, considerable proportions of Philippinos are engaged in clerical (17%) and managerial (11%) occupations. It is also noteworthy to mention that, all three selected immigrant groups are engaged in elementary occupation, though it is not clearly stated among overseas-born population as a whole. These findings suggest that there are no substantial differences among the overseas-born population with regard to occupation and the majority of them are not engaged in professional, technical or highly skilled occupations.

Table 5.2: Overseas-Born Population by Occupation (15 years and above), 2010

	Total Ove	rseas-Born	Selected overseas-born people				
Type of Occupation	No	Percent		Percent			
	No.	Percent	Indonesia	Chinese	Philippines		
Armed Forces	5	0.1	0	0	0		
Managers	405	8.1	5.1	7.6	11.0		
Professionals	326	6.5	4.4	0.9	9.4		
Technicians	267	5.4	5.2	2.3	8.4		
Clerical	343	6.4	4.0	2.3	17.0		
Service and sales	1494	30.5	33.4	57.3	13.8		
Skilled agricultural workers	928	18.6	17.9	7.2	10.7		
Craft and related trades	607	12.2	15.4	9.7	15.4		
Machine operators	126	2.5	3.4	1.1	1.6		
Elementary Occupations	436	8.8	10.6	10.6	10.2		
Not Stated	45	0.9	0.6	1.0	2.5		
Total (N)	4982	100	2911	445	383		

The UN Mission staff working under International Stabilization Force were captured using short questionnaries and are therefore not included in this table, so are UN staff who lived in guest houses and hotels.

CHAPTER 6

URBANIZATION TRENDS AND PATTERNS

6.1. Introduction

Urbanization is an important behavioral process in the demographic and social phenomena. It is a determinant as well as a consequence of socio-economic development in a country (Siddhisena et. al., 1994). The settlement of population in urban areas and those who enjoy urban amenities are a conspicuous milieu in a country where there is socio-economic development. In fact, if job opportunities through industries or expansion of service sector are available, education and other social developments exist, the influx to the cities and other urban areas are obvious. The Timor-Leste case is no exception to this general pattern for the general phenomena. Populous areas in Dili have proven this inevitable result of the above mentioned conditions.

Urbanization has a long history and this process became more significant with the industrial revolution. During the period of industrial revolution people moved to urban areas from rural areas to find employment opportunities and in search for high living standards. New employment opportunities have been generated in the industrial sector with higher benefits, instead of traditional agricultural farming. During the 18^{th} and 19^{th} centuries, a large number of rural population moved to urban areas and this situation became more significant in the latter part of the 20^{th} century.

6.2. Definitions of Urbanization

Urbanization usually refers to a process whereby a proportion of the total population inhabits "urban" places. The term "urban" itself has various definitions based on several criteria. United Nations (1971) has identified five main criteria to distinguish between urban and rural areas, namely;- 1) administrative status, 2) population size, 3) local government areas, 4) urban characteristics, and 5) predominant economic activities. Generally, countries have adopted one or more of the above criteria to define an urban area. Some countries use criterion of population concentration where it varies from 100 to 50,000. Some other countries define urban areas by gazetted townships or local government units identified from their administrative structures (Siddhisena et. al., 1994). According to the 1990 Demographic Year Book, of the 115 countries in the world, 25 per cent define the urban status as the population ranging from 1000-2500, whilst another 25 per cent use the gazetted town classified on the administrative structures as urban. Various other types of definitions were used by another 25 per cent of referenced countries. A fair number of countries have not defined the legal status of the urban areas.

In the case of 2010 Census of Timor-Leste, the 'urban' or 'rural' status was conferred on an area by the government purely for local administration or the size of population. During census mapping field exercise, all areas were either classified as rural or urban. The criteria for urban classifications were as follows:

- 1. All district headquarters were considered as urban areas. The built up areas of the district headquarters and all residential areas within these towns were considered urban.
- 2. Areas not covered under the above classification, but possess the following characteristics qualified as urban i.e.
 - a. Had a population of about 2,000 people or more;
 - b. Had less than 50% of its population employed in agricultural/fisheries activities and the remaining people employed in modern sector; and
 - c. Had electricity, piped water, had access to schools, medical care and recreational facilities.

6.3. Degree of Urbanization

The global rural-urban balance of population has tipped irreversibly in favour of cities and the global urban trends are not uniform. Timor-Leste's urbanization process has more disparity. Within Timor-Leste the rate of urban growth has varied from district to district. In 2004, the total urban population in Timor-Leste was 26.1 per cent and within a six years period, it increased to 29.5 per cent with an average annual growth rate of 4.2 per cent which is much faster than the total population growth rate of 2.4 per cent during the same period (Table 6.1).

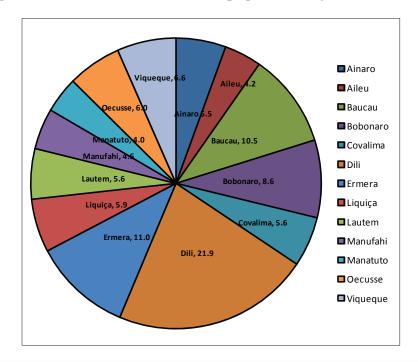
Table 6.1: Urban-Rural Population, 2004 and 2010

Census Years	Total Population	Urban Population	Percent	Rural Population	Percent	Urban growth rate (%)* 2004-2010	Total Pop. Growth rate* (%) 2004-2010
2010	1,066,409	310,086	29.1	750,323	70.4	4.18	2.4
2004	923,198	241,332	26.1	681,866	73.9	-	-

Exponential growth rate

The district of Dili, where the country's capital (Dili) is situated, accommodates more people in the nation and according to 2010 census it has 21.95 per cent of country's total population. Following Dili, district of Ermera and Baucau are sharing 21 percent of country's urban population. (Figure 13)

Figure 13: Distribution of urban population by districts, 2010



Internal migration towards Dili city from within the district and from other districts is playing a significant role in the rapid urbanization process of Dili. The Census of 2010 showed that 42.6 per cent of the total population in Dili was not born in Dili, but they have migrated to the capital and among the migrants teenagers and young adults are comparatively higher than others (Figure, 14). The age category 20-24 is the peak age group which is dominant amongst the male and female migrants towards the capital Dili (Figure 14). As mentioned earlier, the teenagers and young adults of age 15-29 were a more influenced category, moving to the capital due to various reasons. It is lucid that the age selectivity of migrants is different when compared with the age pyramid of non-migrants (Figure 15).

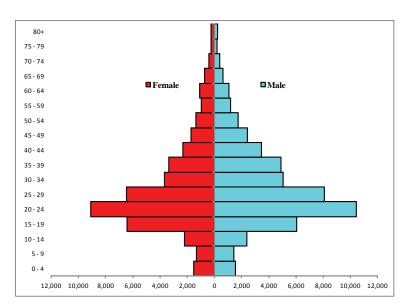
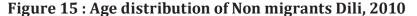
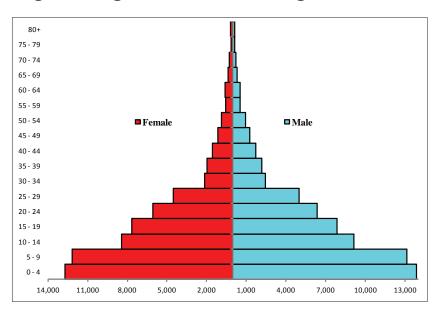


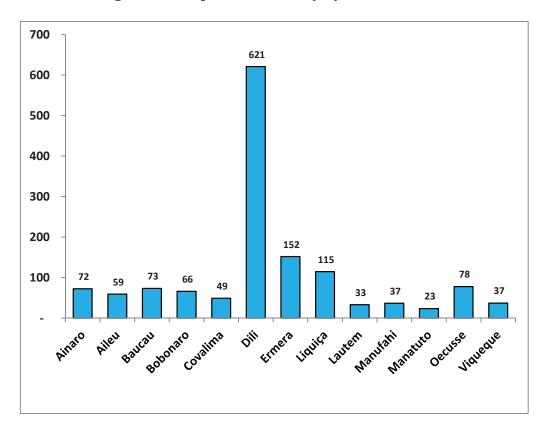
Figure 14: Age distribution of In migrants to Dili, 2010





Geographically, Dili is the smallest district in Timor-Leste. It has 368 square kilometers and it is only 2.46 percent of country's total area. However, this is a leading population district in the country. Therefore, Dili has the highest density district in Timor-Leste. About 621 people live per square kilo meter (Figure 16). Territorially, though the highest extent of land area is Viqueque which has 12.57 per cent of country's total area, density is only 37. The lowest density district in Timor-Leste is Manatuto at 23.

Figure 16: Population density by districts, 2010



6.4. Urbanization process in Timor-Leste

Table 6.2 shows the urban-rural ratios which represent the urbanization process that measure urban to the rural population in Timor-Leste. Net urban-rural ratio in Timor-Leste is 42 which represent 42 urban dwellers for each person living in rural areas (Table 6.2). However, the district Dili is significantly varied when compared to other districts in Timor-Leste. It shows the urban rural ratio of 465 which indicates the highest concentration of urban dwellers against rural dwellers. Next to Dili district isManufahi with 31. Noticeably, the lowest urban-rural ratio district is Ermera. Thus, the urban-rural disparity is very high in the district of Dili, while the rest of the districts in the country maintain lower urban-rural ratio from the national average.

Table 6.2: Urban - Rural Ratio by District, 2010

Name	Total	Urban	Rural	urban-rural ratio
Timor Leste	1,066,409	316,086	750,323	42
Ainaro	59,175	13,121	46,054	29
Aileu	44,325	3,576	40,749	9
Baucau	111,694	20,852	90,842	23
Bobonaro	92,049	16,688	75,361	22
Covalima	59,455	8,123	51,332	16
Dili	234,026	192,652	41,374	465
Ermera	117,064	7,780	109,284	7
Liquiça	63,403	5,081	58,322	9
Lautem	59,787	12,946	46,841	28
Manufahi	48,628	11,504	37,124	31
Manatuto	42,742	9,096	33,646	27
Oecusse	64,025	8,638	55,387	16
Viqueque	70,036	6,029	64,007	9

6.5. Volume of City Population

The city of Dili shares 61 per cent of total urban population in Timor-Leste while the rest of the other 12 cities are sharing 39 per cent (Figure 17). Next to Dili, the town of Baucau has 6.6 per cent of total urban population in the country. The disparity of population between the capital city of Dili and rest of cities is immense. Further, the town of "Maliana" (5.4%), "Laspalos" (4.2%) and "Same" (3.7%) are also sharing the urban population.

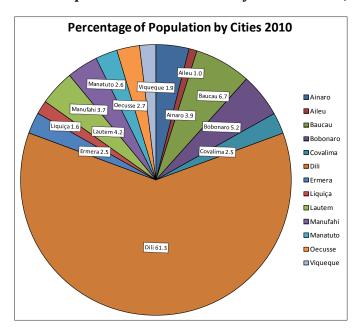


Figure 17: Population distribution by urban areas, 2010

Sex ratio in Timor-Leste shows that the number of males is more compared to females in all cities (Table 6.3). The number of males for each female is significantly high, except Lospalos, which has equal share of males and females. Based on the 2010 census, there were 114 males per 100 females who live in the capital city of Dili. Besides Dili, the other male dominant cities are Aileu (115), Ocecusse (111), Ainaro (110) and Glenno (110). If this trend continues, it will affect future marriage and fertility patterns. Eventually, it could cause unrest among young adult males who are unable to find partners.

	Table 6.3	: Maie-Femaie popul	ation distribution by	Cities 2010		
District	City	Total	Male	Female	Percent	Sex ratio
Ainaro	Ainaro	6,937	3,640	3,297	2.2	110
Ainaro	Maubisse	6,184	3,186	2,998	2.0	106
Aileu	Aileu	3,576	1,898	1,678	1.1	113
Baucau	Baucau	20,852	10,516	10,336	6.6	102
Bobonaro	Maliana	16,688	8,504	8,184	5.3	104
Covalima	Suai	8,123	4,108	4,015	2.6	102
Dili	Dili	192,652	102,901	89,751	60.9	115
Ermera	Gleno	7,780	4,073	3,707	2.5	110
Liquiça	Liquiça	5,081	2,607	2,474	1.6	105
Lautem	Lospalos	12,946	6,481	6,465	4.1	100
Manufahi	Same	11,504	5,916	5,588	3.6	106
Manatuto	Manatuto	9,096	4,754	4,342	2.9	109
0ecusse	0ecusse	8,638	4,541	4,097	2.7	111
Viqueque	Viqueque	6,029	3,041	2,988	1.9	102
Total		316,086	166,166	149,920	100	

Table 6.3: Male-Female population distribution by Cities 2010

6.6. Urban versus Rural Population

Many cities in the world face overwhelming challenges; others have the potential to bring the benefits of urban life to their residents (UNFPA, 2011). The common trend of urban-rural population in Timor-Leste is that the majority of people are living in rural areas than urban areas in almost every district (Figure 18).

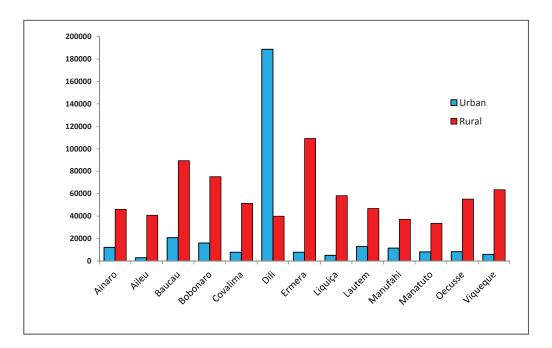


Figure 18: Urban-Rural Population by district, 2010

The national urban population rate in 2010 is 29.5 per cent. But the district of Dili is an exception to this trend. In Dili, the majority of its population around 82.3 per cent live in urban areas. The rural population in this district is only 17.7 per cent whilst the national rural population rate in 2010 is 70.4 per cent. This disparity of distribution in the capital district may cause many environmental issues, such as water and noise pollution; housing problem; traffic congestion, wastage problem, social and economic inequalities in future, if the Government does not implement collective measures to control the overwhelming population growth rate in urban areas. Further still, increasing disparities between rural and urban areas will be a major challenge for the promotion of pro-poor policies for Timor-Leste in future. Special attention and urgent priority has to focus on the rural economy while developing some policies on internal movements and promoting urban centres or hubs in the most populous districts or regions.

CHAPTER 7

CONCLUSIONS AND RECOMMENDATIONS

Migration, both internal and international, and the process of urbanization are factors of paramount importance in the socio-economic development of Timor-Leste. Examination of the volume, pattern of migration and the characteristics of migrants (both internal and international), and the process of urbanization is therefore beneficial for policy makers, as well as planners to formulate better policies on socio-economic and political development of the country for future intervention.

7.1. Key Findings and Conclusions

Migration in Timor-Leste has been basically on a small scale, short term and mostly towards Dili. In 2010 only a small proportion of 13.9 per cent (120,969) of the Timorese had left their places of birth to take up residence in other districts (excluding returned migrants). In terms of current levels of migration, a small fraction of 12.2 per cent (internal migration rate) of the population or 128,142 persons have moved from one district to another. The number of international migrants has slightly increased from 11,345 in 2004 to 11,537 in 2010, though the proportion has decreased from 1.2 per cent (2004) to 1.1 per cent (2010). The Indonesians, Chinese and Filipinos dominate among the international migrants.

The migratory movement in Timor-Leste is heavily confined in Dili District (+85,194). More in-migrants than out-migrants are discernible in this district and therefore Dili district recorded the highest net intake of migrants (36.4%). The lifetime as well as recent migratory movements mostly appears in Dili district. The majority of migrants to Dili district were not only from adjoining or neighbouring districts but also from other districts like Lautem, Baucau and Viqueque. A remarkable increase of in-migrants who discerned to Dili district equate to 37 per cent from 2004 to 2010. People from Baucau, Bobonaro, Ermera, Lautem and Ainaro moved mostly to Dili district. This resulted in a striking growth of in-migration which represents 5.2 per cent of growth in Dili district. Consequently, its population has increased annually by 4.6 per cent which is much higher than the national growth rate of 2.4 per cent during 2004 -2010. From the other 12 districts there was a net outflow of resident population aged 5 and above.

There were apparent migration streams in all districts. According to the 2010 Census, the three largest migration streams such as largest, second largest and third largest are identified in the process of in-migration and out-migration in the district. For instance, Covalima which is adjacent to Ainaro and Bobonaro, received 83.2 per cent and 81 per cent respectively of their in-migrants. The pattern of rural-urban migration remains high especially in the case of Dili district. Inter rural migration occurs due to the reasons of marriage and followed family.

The main reason for internal migration in Timor-Leste was due to following family. Education was the next highest reason for movement. In the case of rural areas, migratory movements take place due to the reason of marriage, whilst in the case of urban, education and following family are important reasons for the movements.

The bulge of overseas-born persons has moved to Dili district followed by Covalima and Oecusse for employment purposes. On the policy perspective, it is important to attract international migrants who are educated and skilled for future development of the country.

The demographic and socio-economic characteristics of in-migrants differed from non-migrants. In a way, these characteristics of migrants represent the information on selectivity of migrants at the destination and on another hand, the characteristics of migrants reveal the motivational factors for migration. Migrants in Timor-Leste were mostly young, educated upto secondary level and employed. Of these migrants, the unemployment rate was still on a high magnitude.

The rapid urbanization process is a unique feature in Timor-Leste. The growth rate of urbanization is much faster than that of the total population. Due to the heavy influx of population from all districts to Dili, the proportion of urban population is enormous. As a result of rural urban migration and due to natural growth of population, the growth of other towns in the districts is also discerned.

Thus migration and urbanization should be considered as important phenomenon not only in the demographic perspective but from policy and social economic perspectives as well as in the process of uplifting the well-being of the Timorese.

7.2. Policy Recommendations

- As migration and urbanization are crucial factors in the socio-economic development of the country, these factors should be taken into consideration in the formulation and implementation of social, economic and political policies.
- Since the substantial influx of population to Dili district deteriorates the livelihood of the population in other districts, several social, economic and environmental policy options have to be considered to overcome these issues. The main concentration should be on elimination of urban poverty.
- As the pattern of rural-urban migration remains high especially in the case of Dili, it is
 prudent to take policy options to develop city hubs like Dili in populous districts or regions
 to provide social services, amenities and raise hopes for employment.
- The substantial movements to Dili and other cities in search for employment have caused
 widespread unemployment amongst the country's substantial young population. About 14
 per cent of the migrants are unemployed and therefore to deal with these levels of
 unemployment, the policy makers have to formulate strategies and avenues to develop
 the non-oil economy in a sustainable way.

- As high disparity of population distribution occurs in urban than in rural areas, population redistribution policies have to be formulated to balance the distribution to some extent. Rural development strategies like irrigation projects, infrastructure development, education and manpower resources have to be considered now and in future.
- Education facilities especially secondary school, higher level (vocational or technical) education should be widespread in rural and urban areas to mitigate migratory movements to the urban areas. The human resource and manpower development are necessary for the country's future development.

7.3. Further development in census data on migration

Of the referrence sources for migration and urbanization data, the census data has been and is still the best source of information on internal migration and urbanization in most countries of the world. The importance of census data on internal migration and urbanization is vital, particularly in countries where independent sources of data, such as good vital registration systems, demographic sample surveys and population registers, are lacking. Timor-Leste is not an exceptional case though some sample surveys have been conducted in the recent past. Enumeration checks were conducted in 2010. However, the main limitation of the census data particularly on internal migration is that censuses do not provide detailed information on the dynamics of the migration process at the origin and destination, as well as information on the time of migration and migration history. Therefore, it is irrational to suggest numerous factors to be in a census on internal migration and urbanization for further and future consideration. In order to overcome this challenge, it is better to conduct a sample survey to collect necessary information on migratory movements at the time of migration at the point of origin and the final destination.

A few suggestions for the future census operation in regard to migration are as follows:

- It is better to properly define the place of birth in the census questionnaire. In some cases the place of birth is the place of occurrence of the event (hospital or urban areas) or place of registration. Place of mother's residence district or sub-district is clear to identify the place of birth rather than place of occurrence.
- Collection of information on migration at the point of origin as well as final destination is important to determine push and pull factors on migration.
- The information on age, occupational and education status before the migratory movement, in addition to those at the enumeration is useful for at least 10 per cent sample of migrants in future censuses to examine the selectivity of migrants and to identify motivational factors on migration.
- Urban areas should be clearly defined and demarcated either administratively or on population size, services or economic activities. It will then be convenient for identification of migration streams such as rural-urban, urban-rural or inter urban movements. It will also be useful to see future scenarios on urbanization and emergence of urban centres.

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Appendix A

DEFINITIONS AND MEASURES OF MIGRATION:

Direct Measures:

In-migration Rate (IR): the number of in-migrants to a administrative area per 1,000 population that areas of destination in a given year.

IR= The number of in-migrants to an area in given year x 1000 Midyear population

Out-migration Rate (OR): the number of out-migrants departing an area of origin, per 1,000 population at that area of origin in a given year.

OR =The number of out-migrants in a given year x 1,000 Midyear population

Net Migration Rate (NMR): the net effect of in-migration and out-migration on an area's population, expressed as increase or decrease per 1,000 population of the area in a given year.

NMR= <u>Number of in migrants-out migrants</u> x 1000 Midyear population

or NRR = IR - OR

Gross Migration Rate: the total number of in-migrants and out-migrants per 1,000 population of the area in a given year

GMR = IR + OR

Indirect Measures

Demographic Balance Equation

Net Migration =
$$(P(t+1)-P(t))+Natural$$
 Increase or

(Immigrants-Emigrants) = (P(t+1)-P(t))+(Births-Deaths)

Formula for forward survival estimates of net migration:

Net M'x+n =
$$P^n$$
 x+n - S x $P0$ x

Where:

Net M'x+n is the estimated net migration for the end-of-period population age x+n n is the interval in years between 2 censuses P0x is the initial population aged x P^n x+n is the end-of-period population aged x+n S is the survival ratio from age x to x+n

or

Formula for reverse survival estimates of net migration is

$$\begin{array}{c}
1 \\
\text{Net M'x} = ---- x P^n x + n - P0x \\
S
\end{array}$$

Where:

Net M'x is the estimated net migration for the initial population age x, obtained by reverse survival

n is the interval in years between 2 censuses

P0x is the initial population aged x

Pⁿ x+n is the end-of-period population aged x+n

1 --- is the reciprocal of the survival ratio from age x to x+n S

Appendix B

Table B-1: Place of birth by place of residence and district Timor-Leste, 2010

Place of						Place	Place of Birth (District)	ict)					
residence	Ainaro	Aileu	Baucau	Bobonaro	Covalima	Dilli	Ermera	Liquica	Lautem	Manufahi	Manatuto	0ecusse	Viqueque
Ainaro	56,297	268	72	195	173	283	141	28	25	468	44	21	24
Aileu	957	38,374	341	119	83	2,634	499	81	35	214	161	45	09
Baucau	151	151	105,185	122	85	1,240	120	95	624	62	254	138	1,578
Bobonaro	111	36	108	86,828	1,467	909	926	168	52	51	49	62	69
Covalima	169	45	29	1,694	55,720	247	101	30	37	45	31	32	45
Dili	7,629	5,829	15,904	12,291	4,691	127,089	9,17	5,030	8,304	4,674	5,654	3,846	11,330
Ermera	413	360	125	842	79	677	112,921	735	38	61	72	105	107
Liquiça	102	86	135	280	93	951	739	59,535	74	73	120	188	113
Lautem	40	38	358	89	31	202	46	113	58,099	40	92	16	107
Manufahi	626	179	96	230	86	621	75	38	20	45,408	348	23	146
Manatuto	82	112	349	72	62	549	49	9/	22	176	39,577	46	342
0ecusse	33	77	92	84	42	259	42	39	36	112	29	61,844	62
Viqueque	23	36	749	99	32	283	39	28	100	28	93	23	67,426
Total	66,992	45,603	123,557	103,181	62,656	136,244	124,868	966'59	67,531	51,459	46,497	66,452	81,409

Table B-2: Lifetime In- Migration, Out Migration and Net Migration: Estimated from data on place of birth Timor-Leste, 2010

+0.15.	Total	Not	드	Out	Net	N S.	Oit Migration	No+ Migration Doto
District	Population	Migration	Migration	Migration	Migration	III Migration rate	Out Migration rate	ivet iviigratioii Kate
Ainaro	58,148	56,297	1,742	10,695	-8,953	8	18.39	-15.4
Aileu	43,665	38,374	5,229	7,229	-2,000	11.98	16.56	-4.58
Baucau	110,160	105,185	4,637	18,372	-13,735	4.21	16.68	-12.47
Bobonaro	91,200	86,828	3,708	16,353	-12,645	4.07	17.93	-13.87
Covalima	59,047	55,720	2,535	6,936	-4,401	4.29	11.75	-7.45
Dili	228,564	127,089	94,349	9,155	85,194	41.28	4.01	37.27
Ermera	116,937	112,921	3,614	11,947	-8,333	3.09	10.22	-7.13
Liquiça	63,172	59,535	3,266	6,461	-3,195	5.17	10.23	-5.06
Lautem	59,776	58,099	1,427	9,432	-8,005	2.39	15.78	-13.39
Manufahi	48,614	45,408	2,893	6,051	-3,158	5.95	12.45	-6.5
Manatuto	41,709	39,577	1,971	6,920	-4,949	4.73	16.59	-11.87
Oecusse	63,514	61,844	891	4,608	-3,717	1.4	7.26	-5.85
Viqueque	69,476	67,426	1,880	13,983	-12,103	2.71	20.13	-17.42
Total	1,053,982	914,303	128,142	128,142				

Table B-3: Place of usual residence by place of previous residence: (Recent migrants), 2010

Ainaro Aileu Baucau I	Bancan			Bobonaro	Covalima	Dilli	Ermera	Liquica	Lautem	Manufahi	Manatuto	0ecusse	Viqueqeu
10,418		7,486	22,789	18,896	8,296	24,224	14,420	7,527	12,579	6,944	7,698	8,621	13,823
1,328		134	55	180	163	253	138	28	21	444	42	22	23
729		1,383	81	81	99	1,168	387	71	23	178	150	43	36
78	∞	77	7,041	105	35	1,497	104	81	503	65	210	126	1,086
69		35	61	4,527	370	269	807	149	37	38	39	92	52
136	9	39	33	1,361	3,123	249	84	22	36	38	24	29	40
38	6,682 5,1	5,156	13,811	11,162	4,169	15,938	8,174	4,566	7,211	4,075	4,904	3,462	9,596
341		250	118	537	22	707	3,947	465	29	99	69	26	84
∞	85	28	124	487	20	986	572	1,965	49	66	108	181	104
7	25	34	338	69	21	655	37	15	4,453	33	29	13	92
2	828	149	84	187	66	579	64	37	40	1,752	237	45	127
נט	58	80	307	65	09	556	41	73	48	115	1,738	41	262
• • •	22	41	20	74	42	320	36	28	36	38	27	4,458	26
1	37	30	999	61	23	619	29	27	93	46	91	39	2,262

 $Table\ B-4: Lifetime\ In-migration, out-migration\ and\ Net-migration\ by\ sub-districts,\ 2010$

	Resident	Non	In	Out	Net	Net
	Population	Migration	Migration	Migration	Migration	Migration Rate
AINARO	58,148	14,480	3,956	12,909	-8,953	-15.4
AINARO	14,588	13,375	1,176	4,984	-3,808	-26.1
HATU-BUILICO	11,933	11,163	742	1,964	-1,222	-10.24
MAUBISSE	21,995	21,446	518	4,226	-3,708	-16.86
HATU-UDO	9,632	8,099	1,520	1,735	-215	-2.23
AILEU	43,665	18,258	6,968	8,968	-2,000	-4.58
AILEU VILA	20,189	17,500	2,650	3,801	-1,151	-5.7
LIQUID0E	6,251	5,180	1,066	1,636	-570	-9.12
REMEXIO	10,055	9,383	662	2,511	-1,849	-18.39
LAULARA	7,170	4,572	2,590	1,020	1,570	21.9
BAUCAU	110,160	38,241	12,310	26,045	-13,735	-12.47
BAUCAU	45,163	37,148	7,777	7,294	483	1.07
LAGA	14,268	13,303	9,40	4,759	-3,819	-26.77
QUELICAI	16,747	15,952	778	5,382	-4,604	-27.49
BAGUIA	9,465	8,791	669	3,392	-2,723	-28.77
VEMASE	8,975	7,970	979	1,495	-516	-5.75
VENILALE	15,542	14,348	1,167	3,723	-2,556	-16.45
BOBONARO	91,200	19,415	9,061	21,706	-12,645	-13.87
MALIANA	24,614	18,923	5,346	3,772	1,574	6.39
CAILACO	9,957	9,360	570	1,552	-982	-9.86
BALIBO	14,777	14,085	558	2,167	-1,609	-10.89
ATABAE	10,974	10,328	593	1,609	-1,016	-9.26
LOLOTOE	7,129	6,805	260	2,259	-1,999	-28.04
BOBONARO	23,749	21,974	1,734	10,347	-8,613	-36.27
COVALIMA	59,047	2,058	7,095	11,496	-4,401	-7.45
FATULULIC	1,894	1,845	34	380	-346	-18.27
FATUMEAN	3,332	3,222	55	1,082	-1,027	-30.82
FOROHEM	4,092	3,935	127	1,413	-1,286	-31.43
MAUKATAR	6,291	5,908	336	2,580	-2,244	-35.67
SUAI	24,776	19,380	4,938	2,927	2,011	8.12
TILOMAR	7,043	5,894	998	855	143	2.03
ZUMALAI	11,619	10,976	607	2,259	-1,652	-14.22
DILI	228,564	19,452	104,391	19,197	85,194	37.27
VERA CRUZ	32,826	17,314	14,118	3,829	10,289	31.34
NAIN FETO	25,563	13,885	10,813	3,740	7,073	27.67
METINARO	4,727	3,514	1,184	611	573	12.12
ATAURO	8,602	8,345	241	1,411	-1,170	-13.6
DOM ALEIXO	103,669	40,430	59,149	3,143	56,006	54.02
CRISTO REI	53,177	33,559	18,886	6,463	12,423	23.36

Continued

 $\label{lem:continuous} \textbf{Table B-4: Lifetime In-migration, out-migration and Net-migration by sub-districts, 2010}$

	Resident	Non	In	Out	Net	Net Migration
	Population	Migration	Migration	Migration	Migration	Rate
ERMERA	11,6937	8,486	8,559	16,892	-8,333	-7.13
RAILACO	10,279	8,266	1,949	1,285	664	6.46
ERMERA	33,528	30,325	3,054	4,600	-1,546	-4.61
LETEF0H0	20,867	19,901	928	3,309	-2,381	-11.41
ATSABE	17,264	16,405	765	3,834	-3,069	-17.78
HATOLIA	34,999	33,079	1,863	3,864	-2,001	-5.72
LIQUIÇA	63,172	21,668	5,754	8,949	-3,195	-5.06
BAZARTETE	23,840	21,061	2,624	3,679	-1,055	-4.43
LIQUIÇA	20,866	18,772	1,998	3,437	-1,439	-6.9
MAUBARA	18,466	17,214	1,132	1,833	-701	-3.8
LAUTEM	59,776	26,530	8,096	16,101	-8,005	-13.39
LOSPALOS	29,227	24,394	4,638	6,387	-1,749	-5.98
LAUTEM	14,147	12,054	2,071	3,842	-1,771	-12.52
ILIOMAR	7,201	6,938	249	1,907	-1,658	-23.02
LURO	5,367	5,007	357	3,068	-2,711	-50.51
TUTUALA	3,834	3,037	781	897	-116	-3.03
MANUFAHI	48,614	25,674	4,711	7,869	-3,158	-6.5
SAME	27,540	25,080	2,263	4,201	-1,938	-7.04
ALAS	7,179	6,409	745	1,229	-484	-6.74
FATUBERLIU	6,902	5,833	989	1,435	-446	-6.46
TURISCAI	6,993	6,268	714	1,004	-290	-4.15
MANATUTO	41,709	10,075	3,630	8,579	-4,949	-11.87
MANATUTO	11,533	9,800	1,639	1,999	-360	-3.12
LALEIA	3,089	2,757	315	874	-559	-18.1
LACLO	7,616	7,264	345	1,448	-1,103	-14.48
SOIBADA	3,030	2,743	279	1,235	-956	-31.55
BARIQUE/NATARBORA	4,766	3,906	836	877	-41	-8.6
LACLUBAR	11,675	11,448	216	2,146	-1930	-16.53
OECUSSI	63,514	30,344	5,584	9,301	-3717	-5.85
PANTE MACASAR	34,715	29,847	4,273	2,745	1,528	4.4
NITIBE	11,366	10,482	782	2,203	-1,421	-12.5
0ESIL0	9,861	9,422	379	2,704	-2,325	-23.58
PASSABE	7,572	7,398	150	1,649	-1,499	-19.8
VIQUEQUE	69,476	7,164	5,567	17,670	-12,103	-17.42
UATUCARBAU	7,212	6,764	432	2,351	-1,919	-2,661
OSSU	15,153	14,643	500	5,113	-4,613	-30.44
WATULARI	16,972	16,276	651	4,691	-4,040	-23.8
VIQUEQUE	24,293	20,861	3,355	3,691	-336	-1.38
LACLUTA	5,846	5,195	629	1,824	-1,195	-20.44

Table B-5: International Migrants by Districts, 2010

District	No	Percent
Ainaro	109	0.94
Aileu	62	0.54
Baucau	338	2.93
Bobonaro	664	5.75
Covalima	792	6.86
Dili	7,126	61.77
Ermera	402	3.48
Liquiça	371	3.22
Lautem	250	2.17
Manufahi	313	2.71
Manatuto	161	1.4
Oecusse	779	6.75
Viqueque	170	1.47
Total	11,537	99.99

Table B-6: Educational level of Migrants and Non-migrants, 2010

Level of Education	In-Migrants %	Non-Migrants %
Pre-Primary	1.5	2.1
Primary	19.3	28.7
Pre-Secondary	12	9.3
Secondary	28.4	9.6
Polytechnic/Diploma	1.6	0.4
University	12.8	1.3
Non Formal	1.3	0.8
N.A.	23.1	47.8

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