



St. Mary's **ቅድስት ማርያም**  
University **የኢክርስቲ**  
*Committed to Excellence*

**SCHOOL OF GRADUATE STUDIES GENERAL MBA– PROGRAM**

***DETERMINANTS ON LONG TERM INSURANCE DEMAND;  
IN THE CASE OF ETHIOPIA***

***A THESIS SUBMITTED TO ST. MARY'S UNIVERSITY IN  
PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR  
THE DEGREE OF MASTER OF BUSINESS ADMINISTRATION***

**BY:**

**GETAHUN KIBRET GEBREAB**

**ADVISOR: SIMON TAREKE (Ass. Professor)**

**December, 2016**

**Addis Ababa, Ethiopia**

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**ENDORSEMENT**

*This thesis has been submitted to St. Mary's University, School of Graduate Studies for examination with my approval as a university advisor.*

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Advisor

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Signature & Date



## **DECLARATION**

*I, the undersigned, declare that this thesis is my work; prepared under the guidance of my advisor. All sources of materials used for the thesis have been duly acknowledged. I further confirm that the thesis has not been submitted either in part or in full to any other higher learning institution for the purpose of earning any degree.*

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*Name*

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*Signature & Date*

## **ABSTRACT**

*The main aim of this thesis was to assess the issue of factors affecting demand for long term insurance in Ethiopia. The motive behind making this research lies on the low emphasis given to the factors affecting long term insurance consumption in Ethiopia. Particularly no research was specifically made to assess the effect of religion, income, and awareness on long term insurance demand. The study is basically a survey that used both qualitative and quantitative approaches. For the purpose of data collection self administered questionnaire was adopted, pre-tested and personally administered to the target population by following the appropriate ethical procedures. Out of the distributed four hundred three hundred ninety one questionnaires are found error free and used for this study purpose. That means above 97.75% return rate was achieved from the questionnaires distributed to all religious groups. Therefore, the entire analysis given in this study is based on the actual questionnaires returned.*

*The finding proves that there is a strong positive correlation between awareness and long term insurance demand in Ethiopia. The correlation between income and long term insurance demand was found to be negative but with moderate strength.*

*Based on this, it's recommended that what is needed from long term insurance companies is teaching people and creating awareness of the role and benefit of long term insurance. Finally, the researcher believes that the result of this assessment contributes to the growth of long term insurance business in relation to the economic development of the country at large through provision of valuable information to the society and future interested researchers in the area as well as decision makers in the insurance industry stressing the factors actually affecting the demand for long term insurance in the future.*

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## *Acronyms*

*NBE* – National Bank of Ethiopia

*EIC* – Ethiopian Insurance Corporation

*GDP* – Gross Domestic Product

*GWP* – Gross Written Premium

*NGO* – Non Governmental Organization

*LTI* – Long Term Insurance

## **CHAPTER ONE**

### **INTRODUCTION**

---

#### **1.1. BACKGROUND OF THE STUDY**

Insurance has a real effect on the global economy through the sheer number of people that the sector employs. But it also acts in a complementary fashion with the banking sector, offering easier access to credit, channeling savings into long-term investments and providing greater transparency and liquidity to the markets, thus providing further support and growth to the economy.

Currently, Seventeen insurance companies are performing business in the Ethiopian insurance financial service sector. Despite the increasing number of the companies, the performance of long term insurance sales is unattractive unlike the general insurance service sector. According to reports by National Bank of Ethiopia, (Appendix I) from a total of insurance premium in the country, long term insurance constitutes only about 6% and the rest 94% constitutes general insurance premium income. The GWP of long term insurance premium for the year 2016 was 333,008,000 while the premium from General insurance was birr 6,426,685,000 showing only a ratio of 5.18%. As of June 30 2016, the long term insurance penetration (premium/GDP) and density of Ethiopia was very low (0.00028) and significant proportion of the total population has no access to insurance service with business contributing only 0.043% for the country's GDP (Update on Ethiopia's macroeconomic and financial sector development, 2016).

The report also shows that only a ratio of the number of insured individual under long term insurance is around 0.00979% as at June 2016. But this figure, in addition to individuals who personally bought long term insurance policy by willing, includes individuals who are covered under long term insurance by their employers, individuals who are advised to buy long term insurance by Banks for loan purpose, NGO and individuals who have bought long

term insurance policy as a legal requirement by the government Travel Insurance. There is no evidence showing the percentage of each long term insurance owner based on the above buying criteria.

The current figure on long term insurance sales shows the unattractiveness of the sector taking the ratio of long term insurance business to General Insurance business in to consideration. The figure for June 2016 shows that the share of the long term insurance premium from the total premium is only 5.18% and the rest is from General insurance.

Long term insurance penetration rate is the rate at which long term insurance is purchased in various countries varies. It is commonly used to measure purchase of long term insurance in a particular country and, represented by the percentage share of the gross domestic service (GDP) spent on long term insurance premiums. The penetration rate ranges from 0.01 in Saudi Arabia and Ukraine, 15.19 in South Africa. The world average LIPR is 4.68 (Eck & Dimitri, 2014). The figure 0.00028 for Ethiopia is very far from the world average (4.68). Reports by NBE also repeatedly shows that the insurance industry in a long term insurance sector is not growing as expected by insurance companies and the trend shows very low promising long term insurance business as compared to the General Insurance class of business.

Compared to the growth and importance of long term insurance business worldwide, the growth trend in Ethiopia is not promising. So many different factors might be responsible for the low growth of long term insurance business in Ethiopia. However the number of research works in Ethiopia on this area is very limited compared to the social and economical benefit of long term insurance.

## **1.2. STATEMENT OF THE PROBLEM**

In spite of the growth trend of non long term class of insurance business, the long term insurance business is not attractive in Ethiopia. The increasing population growth of the country is also an attractive opportunity for this business. However the industry is almost stagnant in this sector. From an international context, so many factors might contribute for the slow growth of long term insurance business. Some of the factors rose by different writers and researchers at different time in different countries are lack of knowledge about long term insurance service, lower disposable income, and impact of religion.

Regarding the low demand of long term insurance in Ethiopia, the researcher has made an exploratory/ personal investigation using field interviews on a limited scale with concerned insurance company managers in Ethiopian Insurance Corporation (EIC), with a view to secure greater insight into the practical aspects of the problem. The interviewed insurance company managers raised many reasons like the above factors but they repeatedly focus on three demand side factors namely low disposable income of individuals, low awareness level, and the religion of individuals.

In spite of the large number of research on factors affecting the demand for long term insurance worldwide, the efforts made in our country is very low. The motive behind making this research lies on the low emphasis given to the factors affecting long term insurance consumption in Ethiopia. Especially no research was specifically made to assess the effect of religion, income, and awareness on long term insurance demand. Because of the dominant of religious thinking in the country and its sensitivity, researchers failed to deeply assess its effect on long term insurance.

The issue of factors affecting demand for long term insurance in Ethiopia is one of the untouched areas in finance sector for many years. Though very few researcher use various social, demographic and economic variables in their analysis to reveal determinants of demand for long term insurance. The growth of long term insurance is crucial to most governments and financial institutions among other parties, because it is an important tool of mobilizing funds which support investment and growth of the national economy.

### **1.3. RESEARCH QUESTIONS**

This study was designed to provide answers to the following research questions:

- ❖ To what extent religious belief affect demand for long term insurance in Ethiopia?
- ❖ To what extent the awareness affect demand for long term insurance in Ethiopia?
- ❖ To what extent the income of an individual affect demand for long term insurance in Ethiopia?

### **1.4. OBJECTIVES OF THE STUDY**

#### 1.4.1. General objective

- ❖ To make an assessment on factors affecting long term insurance demand in Ethiopia.

#### 1.4.2. The specific objectives include:

- ❖ To study whether the income of an individual affect demand for long term assurance.
- ❖ To study whether the awareness affect demand for long term assurance
- ❖ To study whether religious beliefs affect demand for long term assurance

### **1.5. RESEARCH HYPOTHESIS**

From the research objectives, the following hypotheses are developed.

- ❖ Hypothesis 1- HA: Income has significant effect on demand for long term insurance in Ethiopia.
- ❖ Hypothesis 2- HA: Awareness has significant effect on demand for long term insurance in Ethiopia.
- ❖ Hypothesis 3- HA: Christianity belief has significant effect on demand for long term assurance in Ethiopia.
- ❖ Hypothesis 4- HA: Islamic belief has significant effect on demand for long term assurance in Ethiopia.
- ❖ Hypothesis 5- HA: Other beliefs have significant effect on demand for long term assurance in Ethiopia.

## 1.6. DEFINITION OF TERMS

- ❖ **Policy:** The legal contract by which risk is transferred to an insurance company (Williams, 1984).
- ❖ **Premium:** The amount of money charged when a risk is transferred to an insurance company (willies, 1984).
- ❖ **Demand for long term insurance:** customer's interest or desire of having long term insurance.
- ❖ **Long Term Insurance/ LTI /:** (or commonly life assurance, especially in the Common wealth) is a contract between an insured (insurance policy holder) and an insurer or assurer, where the insurer promises to pay a designated beneficiary a sum of money (the "benefits") in exchange for a premium, upon the death of the insured person.
- ❖ **Long Term Insurance:** Actual and expected function of life insurance.
- ❖ **Beneficiary:** The person named on long term insurance policy to receive the death benefit at the death of the insured (Williams, 1984).
- ❖ **Awareness:** knowledge of the benefits, costs, availability, of long term insurance.
- ❖ **Religion:** Beliefs and worship, as Christian, Muslim, or 'any other' (Encarta dictionary, 2009).
- ❖ **Individual:** a specific person, distinct from a group (Encarta dictionary, 2009).
- ❖ **Beneficiary:** The person named on long term insurance policy to receive the death benefit at the death of the insured (Williams, 1984).
- ❖ **Role of long term insurance:** Actual and expected function of long term insurance (operational)

## 1.7. SIGNIFICANCE OF THE STUDY

Different literatures regarding the status of long term insurance in developed countries show its impact on the economic and social development of a country. For companies selling long term insurance, it is also a profitable segment of an insurance business or service. The ever rising population levels in our country provide an attractive opportunity, but still nearly 99.50% of Ethiopians' live is not yet insured. This research will study the factors i.e.

awareness, religious belief, and income affecting peoples' decision towards long term insurance consumption from uninsured point of view.

So the outcome of this research will contribute to the growth of long term insurance business in relation to the economic development of the country at large, by providing valuable information to the society and future researchers as well as to decision makers in particular about the factors really affecting the demand for long term insurance.

Insurance companies also limit their effort on specified factors and save resources employed in selling long term insurance.

### **1.8. SCOPE OF THE STUDY**

According to different research results and materials, many factors affect the demand for long term insurance from both the supply side and the demand side. Some of the major demand side factors are; low per capita income, low awareness/knowledge, Number of dependents, negative attitude toward long term insurance, religious beliefs against long term insurance, health condition of individuals, mortality rate, wealth of individuals, lack of trust in insurance companies, family income, type of job (risky job?), availability of bank credits. Some of the major supply side factors are; availability of better options, low service quality, affordable Price, low Service variety, lack of professionalism, lack of promotion, legal and political factors like investor protection. In spite of this, this study, based on the result of exploratory study, assessed three major factors affecting demand for long term insurance from the demand side of the market only. Adding factors from the supply side may generate different result. As the supply side of the insurance business can easily be managed by exerting full effort from the companies, the researcher believed that the factors assessed are taken as either an opportunity or a threat.

As the study tried to identify the areas in which insurance companies should devote their effort in order to increase long term insurance sales, it has focused on those individuals who do not have long term insurance policy whatsoever.

Geographically, the study areas were Addis Ababa (capital city of Ethiopia), Adama, Hawasa, Dere dawa, Mekele, Jimma, and bahir dar. This is in order to generalize the research

finding to the whole Ethiopia. All of the six cities are selected based on their population size in the city next to Addis Ababa.

In order to avoid misrepresentation of unaware people from the aware ones, the study did not also include employees of insurance companies.

The study also focused on employees (paid workers) having monthly income and those individuals who are running their own business, because employment provides source of income and according to the theory of consumption it is permanent factor which determines level and distribution of income among consumption and saving.

### **1.9.LIMITATIONS OF THE STUDY**

- ❖ Selection of some areas having larger population size is also considered as the geographical limitation.
- ❖ The study was conducted using quantitative technique only. Because the researcher chose this technique in order to gather objective data.
- ❖ The supply side of the long term insurance business was not seen in this investigation
- ❖ The study has focused only on three factors as they are repeatedly rose by managements of insurance companies and other concerned bodies.
- ❖ Samples were taken from those who do not have long term insurance policy because the researcher assumes that those who have any type of long term insurance policy are not affected by the three selected factors.
- ❖ All the finding was based on data gathered by the respondents. Thus it may subject to the potential bias and prejudice of the people to be involved.
- ❖ This study was affected by time limitation and in most cases the participants did not complete the questionnaire on time that probably made the research process time consuming.



## **CHAPTER TWO**

### **LITRATURES REVIEW**

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#### **2.1. INTRODUCTION**

In this section, various writings are organized to describe the theoretical foundations and empirical results of the different factors hypothesized to drive the demand for long term insurance. It begins by defining life value concept and long term insurance, its classifications, and its benefits followed by an analysis of related literatures on empirical as well as theoretical concepts of demand for long term insurance in relation with awareness, religion, and income.

#### **2.2. LONG TERM INSURANCE AND HUMAN LIFE VALUE**

Williams (1984) stated that a human life has value for many reasons. Many of these reasons are philosophical in character, and would lead us into the realm of religion, esthetics, sociology, psychology, and other behavioral sciences. The greatest interest here is economic values, although it is very difficult to separate the discussion in such a way that an economic analysis would have no implications or overtones for other viewpoints. A human life has economic value to all who depends on the earning capacity of that life, particularly to two central economic groups which are the family dependents and the employer to the employees.

Long Term insurance is therefore developed on the concept of human life value. Human life value approach focuses on the economic component of human life. Any event affecting an individual's earning capacity, retirement or unemployment. The human life value concept provides the philosophical basis for the long term insurance, which is a service designed to protect the individual against two distinct risks superannuating and premature death.

There are four main perils that can destroy, wholly or partially, the economic value of a human life which include premature death, loss of health, old age, and unemployment.

Greene (1984) also said that, as a social and economic device, long term insurance is a method by which a group of people may cooperate to ameliorate the loss resulting from the premature death of members of the group. Long term insurance compensates designated beneficiaries in the event of the insured's death or can constitute a form of retirement fund longevity insurance, in which case the policyholder receives regular payments from the insurance company annuities starting at a specific age and for an indeterminate number of years, in exchange for a single premium payment or a series of prior regular payments.

Long term insurance can accomplish two objectives: to guarantee the existence of an estate out of which one's dependents may meet debts and receive an income if the breadwinner dies which is protection need; and to save money as a part of one's own living estate, which is created for future income needs.

### **2.3. TYPES AND BENEFITS OF LONG TERM INSURANCE**

Black (2000) indicated that there are three main types of Long term insurance policies in actuarial literature however; traditionally long term insurance policies are categorized in terms of the benefit they provide and premium payment pattern. Following are presented in brief the basic traditional long term insurance policies and the newest once included as well.

- I. Annuity insurance: It provides retirement benefit to the insured who wish to supplement their pension income.
- II. Term insurance - that provides a death benefit for a limited number of years.
- III. Whole life insurance – which provides a death benefit the insured and,
- IV. Endowment insurance – which is a term insurance with a saving component.
- V. Universal life insurance policy- The policy holder, can access his or her cash value by making partial withdrawals.
- VI. Children Education Policy- Education fund is a type of long term insurance expected to cover for the cost of education.

In general terms, Long term insurance is a way of dealing with risk and a saving mechanism for the assured.

### **2.3.1 Annuity insurance**

Annuity insurance provides retirement benefit to the insured who wish to supplement their pension income. It is to protect against the probability of outliving ones income that is protection against living too long. It is the opposite of a person who desire long term insurance for protection against premature death, i.e. dying too short.

### **2.3.2 Term insurance**

Term insurance provides for assurance coverage for a specified term of years for a specified premium. Term insurance policy is known for its protection benefit. It has no any saving benefit. That means if a person buys a 15 year term insurance at the age of 40, the insurance company's liability expires at the end of the person's age of 55. It is also a type of insurance which is mostly needed for financial guarantee purpose. The premium for term insurance increases each time the policy is renewed.

### **2.3.3 Whole life insurance**

The need for whole life insurance arose from the two major shortcomings of term insurance: (1) premiums increase constantly throughout the coverage year, and (2) coverage is not normally available past retirement age. If you buy a whole life policy when you are 25 years old and the annual premium is Birr 15,000, the annual premium on that policy when you are 92 years old still will be Birr 20,000. In whole life policy, the coverage continues for your entire year. It is a means by which long term insurance protection is available throughout one's retirement years (Williams, 1984).

### **2.3.4 Endowment insurance**

According to Williams (1984) it is simply an insured's saving plan. To illustrate, assume that you need Birr 50,000 in ten years to send your child to college. Endowment policy has both the saving benefit and a protection benefit. If you buy a 10 year, Birr 150,000 endowment policy, the long term insurance company will pay you this Birr 150,000 in ten years which is Saving benefit. In effect, your premium payments will have saved that amount. If you

unfortunately die, however, the long term insurance company will pay your beneficiaries the Birr 150,000 at the time of your death which is protection of beneficiaries.

### **2.3.5 Universal life insurance policy**

This type of policy is introduced in 1979 (Black and Skipper, 1987). It differs from other type of long term insurance in that it offer flexible, potentially low cost coverage on a basis that permits service transparency. It does not require a fixed schedule of premium payments; instead, the premium payment schedule is flexible. Flexibility allows policy owners to skip scheduled premium payments occasionally without causing the policy to lapse. The policy holder, can access his or her cash value by making partial withdrawals.

### **2.3.6 Variable life insurance policy**

It is a fixed premium policy in which the death benefit and cash values vary as a result of the investment performance of a separate account. It is the other form of cash value long term insurance that performs like traditional whole life insurance in some ways: fixed premiums, guaranteed death benefit equal to the original face value, and no partial withdrawal. In contrast, the owner of the policy under a variable policy has a right to choose various financial vehicles to invest premiums, such as mutual funds of stocks, bonds, or money market securities. If the investment performance is favorable, the face amount of long term insurance is increased. If the investment performance is poor, the face amount of long term insurance is reduced, but it will typically not fall below the original face amount.

The insured do not have to surrender or cancel the policy to obtain the accumulated cash value the saving part. They can obtain a loan under their policy for the amount up to the cash value. Interest has been charged for the loan. The loan and interest is deducted from the sum assured to pay death claim if the insured died or to pay the cash value if the policy is terminated or matured.

### **2.3.7 Children Education Policy**

Education fund: the cost of higher education in Ethiopia has increased dramatically over the last few years, particularly at private school. These costs can relate to a tremendous financial

drain for a family. The objective of education policy is to provide a fixed benefit/sum assured to the policy holder or the parent whereas the actual beneficiary would be the named beneficiary.

#### **2.4. Ways of determining the amount of Long term insurance needed**

The earliest method is based on estimated financial requirements at the time of death and in the years following. This is the method most used by long term insurance agents or brokers.

The next is based on earnings and is a concept developed many years ago by Professor S.S. Huebner of the University of Pennsylvania. He called the concept human life values. This approach looks at the earnings of an individual over a life time and finds the present value of that stream of expected future earnings. The present value of this stream of expected earnings is found by using the formula for present value of an annuity.

Assumptions are made in calculating the premium

- a. The individuals are at standard health state.
- b. A ten year period is assumed
- c. The premium increases with increasing age of the individual

#### **2.5. Overview of insurance industry in Ethiopia**

The financial sector in Ethiopia is regulated by National Bank of Ethiopia /NBE, In line with there is also an agency which regulates the Insurance and Banks activities. The agency is responsible to control government owned banks and insurance. Even though the number of insurance companies is increasing from time to time, there is no insurance company doing business and specializing in Long term insurance business sector alone. There are about seventeen insurance companies including the government owned insurer in Ethiopia, the Ethiopian Insurance Company. All of these insurance companies mainly compete on Long term as well as General class of insurance in Ethiopia. Few private insurance companies are doing the Long term insurance business in line with the General class sector. In order to benefit from the opportunities of Long term insurance business, the only Government insurer,

Ethiopian Insurance Corporation (EIC) has opened about twelve Long term insurance branches, out of which four are in Addis Ababa.

The next table has summarized insurance companies in Ethiopia and types of business they are currently performing.

**Table2.1 Insurance companies currently selling Long term insurance policies**

No	Name of insurance company	Web site	Insurance business	
			Long Term Insurance	General Insurance
1	Abay insurance	www.abayinsurance.et	No	Yes
2	Africa Insurance	www.africainsurance.com	Yes	Yes
3	Awash Insurance Company	www.awashinsurance.com	Yes	Yes
4	Berhan insurance	www.berhaninsurance.com	No	Yes
5	Bunna Insurance	www.bunnainsurance.com	No	Yes
6	Ethio-Life and General Insurance S.C	www.ethiolifeandgeneralinsurance.com	Yes	Yes
7	EIC	www.eic.com	Yes	Yes
8	Global Insurance Company	www.globalinsurancesc.com	No	Yes
9	Lion Insurance	www.anbessainsurance.com	No	Yes
10	Lucy Insurance		No	Yes
11	NIB Insurance Company	www.nibinsurance.com	Yes	Yes
12	Nile Insurance Company	www.nileinsurancesc.com	Yes	Yes
13	Nyala Insurance Company	www.nyalainsurance.com	Yes	Yes
14	National-Insurance Company of Ethiopia	www.niceinsurance-et.com	No	Yes
15	Oromia Insurance Company	www.romiainsurancecompany.com.et	Yes	Yes
16	Tsehay Insurance	www.tsehayinsurance.com	No	Yes
17	United Insurance S.C	www.unitedinsurancesc.com	Yes	Yes

Source: Insurance Company's web site and primary information personally gathered

## 2.6. Assessment of theories on Awareness, Religion and Income affecting Long Term Insurance

### 2.6.1. Awareness

It is the ability to perceive, to feel, or to be [conscious](#) of events, [objects](#), thoughts emotions, or sensory [patterns](#) (Wiktionary). The dictionary meaning of awareness is “knowledge or understanding of a particular subject or situation” (Longman). In this level of consciousness, sense data can be confirmed by an observer without necessarily implying [understanding](#). More broadly, it is the state or quality of being aware of something. In [biological psychology](#), awareness is defined as a human's or an animal's [perception](#) and [cognitive](#) reaction to a condition or event (Wikipedia). Awareness is a relative [concept](#). An [animal](#) may be partially aware, may be [subconsciously](#) aware, or may be acutely unaware of an event. Awareness may be focused on an internal state, such as a visceral feeling, or on external events by way of sensory perception.

In cooperative settings, awareness is a term used to denote “knowledge created through the interaction of an agent and its environment — in simple terms ‘knowing what is going on’” (Science News Online). In this setting, awareness is meant to convey how individuals monitor and perceive the information surrounding their colleagues and the environment they are in. This information is incredibly useful and critical to the performance and success of collaborations. Awareness can be further defined by breaking it down into a set of characteristics (Capra, 1996).

- ❖ Situations are continually changing, therefore awareness and knowledge must be constantly maintained
- ❖ Information about the state of some environment
- ❖ Human beings interact with the environment, and maintenance of awareness is accomplished through this interaction.

It is perceived to be a very rational factor affecting utilization choice of customers in economic approach. That is why companies spend their dollars on promotional activities that intended to create and increase awareness.

Khan (2006), showed a use-related section consisting of usage rate, awareness status. Awareness is then classified as unaware, aware, interested, and enthusiastic. In adoption process is also showed that adoption is a result of awareness followed by interest, evaluation and trial stages. He also indicated that customers go through a standard hierarchy of effects sequence awareness-interest-desire-action.

Invention awareness can be from advertisement or exposure to different types of media or by the social circle. The awareness and the need lead to the building of interest. In some cases, the interest may also breakdown and, the decision process also stops or may be postponed for the time being.

### **2.6.2. Income**

Various writers classify income under measurable demographic characteristics of customers. Income level of the customer is one of the indicators of the demand for a service. Unless backed up by the purchasing power, the willingness to buy does not guarantee the demand for a given service.

Income is money or other gain or return resulting from goods or services produced in a given period of time, usually measured annually. Income may be received by an individual or an entity, such as a corporation or a government. The various types of income are usually described within the private or the public sector of economic activity. In the private sector the four major types of income are (i) Wages: the return for labor; (ii) Rent: the return for use of land; (iii) Interest: the return for the use of capital, and (iv) Profit: the return to the business owner. Income in the public sector, called national income, is the money measure of the annual flow of goods and services in an economy. Income is normally measured in money terms, although non-money definitions are sometimes used. Real income refers not to the actual money income but to the extent that the money income can be used to purchase goods and services as they are affected by price changes.

Customers are constrained by limited income, which forces them to behave in a way that will ensure that they get the most out of their income – they will act to maximize the utility of their income.



### **a. Individual income and disposable income**

Income in this study refers to the monthly disposable income i.e. wages and salaries, as a return for labor of an individual, and the disposable income the business owner uses for personal purpose. Consumption of an individual increases with the increasing income level.

Derived from national income figures, personal income is the amount of money received by individuals for their own use. It is made up of all types of income: wage and salaries, proprietor and rental income, dividends and personal interests and transfer payments. Transfer payment consists of pension payments, social insurance, and social service payments. When all taxes are deducted from the personal income, the remainder is called disposable income which is either saved or spent.

Many writers and customers consider long term insurance as a luxury service and the demand for such service arises when the income is high and the amount of saving is higher for an insured.

### **b. Income level and long term insurance demand**

Concerning long term insurance demand and income level, there are two arguments which are accepted by different writers. The first argument is that, as income level increase, the demand for long term insurance tends to decrease. The second is that as income level increase the demand for long term insurance also increase. This argument assumes that wealthiest people do not want to buy long term insurance as they do not have to worry about the financial problems the dependent face.

- ❖ **Low income level:** As the income is used to cover living expense, low level income groups tend to ignore long term insurance.
- ❖ **Middle income level:** As the portion of income goes to saving, the middle income levels are a good prospect for long term insurance.
- ❖ **High income level:** The high income class considers long term insurance as an inferior service. The main reason for this phenomenon is that at high-income levels, customers become so wealthy that they can afford to retain risks within their current financial portfolios.

Ward and Zur bruegg (2002) highlight that the consumption of long term insurance services in OECD countries is three times less sensitive to changes in income than it is in Asia. This is

consistent with Enz's (2000) findings, which shows that, on average, Asians spend more on long term insurance than in the developed economies of the globe.

### **c. Income in Ethiopia**

Ethiopia's per capita income of \$470 is substantially lower than the regional average (Gross National Income, Atlas Method). The government aspires to reach middle income status over the next decade. According to World Bank report 2015, economic growth brought with it positive trends in reducing poverty, in both urban and rural areas of Ethiopia. While 38.7% of Ethiopians lived in extreme poverty in 2004-2005, five years later this was 29.6%, which is a decrease of 9.1 percentage points as measured by the national poverty line, of less than \$0.6 per day.

The World Bank defines low income countries as countries in which (2004) GNI per capita was \$845 or less – i.e. an average income of less than two per cent of that of the United States. In spite of vast differences, many of these countries are likely to face similar opportunities and challenges with respect to long term insurance growth.

Low income means very little demand for services and services and this discourages the manufacturers or the producers of services or services. Different business professionals and writers classify long term insurance under unwanted services. This indicates that customers do not easily shop for it and consume like any normal goods or services. That means it is very challenging to sell long term insurance in low income countries.

According to World Bank report 2004, Ethiopia faces a monumental challenge to raise income levels and pull its population out of extreme poverty. With a Gross national Income per capita of only 110 USD in 2004, Ethiopia is one of the poorest countries in the world. Growth levels were moderate in the 1990s, especially in relation to the continued high population pressures. Reflecting the low income levels, about four fifths of the population presently lives on less than two dollars per day.

Hammond (1967) and Mantis and Farmer (1968) find influence of employment on long term insurance consumption. Because employment provides source of income and according to the theory of consumption it is permanent factor which determines level and distribution of

income among consumption and saving. Thus, long term insurance will be demanded more by individuals who are employed compared to those unemployed.

Of all the factors, income is essential in all the models of insurance demand. Higher income is expected to increase the demand for long term insurance, generating a greater affordability of long term insurance services (Dragos, 2014). Numerous studies have proved that income of the insured positively affects the demand for long term insurance. Hakansson (1969) and Campbell (1980) along with Lewis have derived a positive correlation between income and long term insurance purchasing decision. Referring to the long term insurance line of business, income is found to have a significant positive impact on the insurance demand by all the researchers interested in the subject.

### **2.6.3. Religion**

It is the set of beliefs, feelings, dogmas and practices that define the relations between human being and sacred or divinity. A given religion is defined by specific elements of a community of believers: dogmas, sacred books, rites, worship, sacrament, moral prescription, interdicts, and organization.

It is a human activity that can be easily accepted only within the framework of reality that it creates for itself. If you accept the existence of whatever myth, God, spirit, or supernatural force that a religion proposes, then you can see the logic of all that follows.

It is difficult to make a definition of religion, because it has many facets, of which do not appear to be religious by themselves. For example, religion involves gathering in groups. It involves communal eating. It involves theoretical dissertation about the nature of the universe, and so onward. Countless definitions have been proposed by theoreticians. The most interesting thing is that the average person can tell when others are engaging in religious behavior while many scholars and scientists have problems defining it. The concept of religion is like the concept of culture. It is easy to use in ordinary communication, but difficult to define precisely. However, it is good to see some of the definitions given by different authors on different materials.

A religion may be defined with its three great characteristics:

- ❖ The religious feeling i.e. faith
- ❖ Believes and religious practices
- ❖ Unity in a community of those who share the same faith: the Church. It is what differentiates religion from magic.

The English word "religion" is derived from the Middle English "religioun" which came from the Old French "religion." Many people focus on a very narrow definition that matches the individual's own religion, but few others. A humorous case is in Henry Fielding's novel "Tom Jones." where he has one character say: "By religion I mean Christianity, by Christianity I mean Protestantism, by Protestantism I mean the Church of England as established by law."

Religion is a set of beliefs concerning the cause, nature, and purpose of the universe, especially when considered as the creation of a superhuman agency or agencies, usually involving devotional and ritual observances, and often containing a moral code governing the conduct of human affairs. A specific fundamental set of beliefs and practices generally agreed upon by a number of persons or sects: the Christian religion; the Buddhist religion. Something one believes in and follows devotedly; a point or matter of ethics or conscience: to make a religion of fighting prejudice.

This assessment will not look in to the detail doctrine of the religions, but looks whether the involvement of an individual in a religion affects its purchasing behavior of long term insurance. For the purpose of this assessment, three types of religion in the country, namely, Orthodox, protestant and catholic are taken under the category of Christian as they have a common central element. The other type of religion in the country, with different doctrine is Islamic religion and it is taken as one category. The assessment has also included other type of religions under the category of any other.

## **a. Religion in Ethiopia**

### Religious Demography

The 2007 census in Ethiopia estimates that 44 percent belong to the Ethiopian Orthodox Church (EOC), 34 percent is Sunni Muslim, and 19 percent belong to Christian evangelical and Pentecostal groups. According to Ncube, basic information about Ethiopia, the composition of the major religion is, Christian 60.8% (Orthodox 50.6%, Protestant 10.2%), Muslim 32.8%, traditional 4.6%, other 1.8%.

According to international journal of peace and development studies 2013 the estimates from the 2007 Ethiopian census showed that the Christian Orthodox is 43.5% and the Muslim population, of 33.9%. In the recent decades, many Evangelical churches have been established in the country and are still growing. There are about 8.6% of these, together with adherents to Pentecostalism. Those who profess traditional religious beliefs are 2.6%, Catholics make up about 0.7% of the population.

## **b. Religious Identity and Economic Behavior**

An article by Iannaccone (1998) lists twelve religious identities that affect individuals' economic outcomes: risk-taking, individual responsibility, education, criminal activity, suicide, drug and alcohol consumption, physical and mental health, sexual activity, marriage, fertility, divorce, and life satisfaction. A risk taker individual does not think of buying Long term insurance. Instead believes that God is the protector of his life. Risk taking is also fatalistic behavior which develops as a result of involvement in religious beliefs.

However, measuring the causal effect of religion has been hampered by the difficulty of identifying exogenous variation in religious identities. Religious affiliation—even when inherited from one's parents—is likely to be correlated with many unobserved factors that affect behavior. For example, people whose preferences already align closely with a religion's prescriptions may be more likely to choose it and/or remain in it.

Correlation between behavior and religious affiliation could thus be entirely due to the correlation between exogenous preferences and religion, rather than any causal impact of religion itself. In addition, religious affiliation may be correlated with background variables,

such as childhood home environment, that affect behavior but are unobserved or measured mistakenly.

### **C. Effect of religion on expenditure**

Many scholars agree that one of the demographic factors, religion, affects the expenditure behavior of customers. For example, in business segment, Khan (2006) said that one of the bases of segmentation is socio-cultural segmentation as a sub-culture consisting religion. He also classified religion under demographic factors.

As stated by Solomon (2009), risk aversion is important reason why people decide to buy insurance in general despite the fact that they have to pay for insurance premium more than mathematical expectation of loss. Thus, it is expected that risk aversion has positive effect on long term insurance purchase as well. It is assumed that the religion of an individual affects whether the person is risk averter or not.

On religious front, Henderson and Milhouse (1987) argue that an individual's religion can provide an insight into the individual's behavior; and understanding religion is an important component of understanding a nation's unique culture. In some Muslim dominated countries, the religious beliefs inhibit those forms of insurance that facilitate speculation of future events, thereby discouraging growth of the insurance sector. Customers in Islamic nations purchase less long term insurance policies, which is reflected in the below global average long term insurance penetration in Muslim dominated countries, i.e. Middle East.

Business scholars have not studied religion extensively, possibly because many view it as a taboo subject. Religious sub cultures have an impact on customer variables such as personality, attitudes toward sexuality, birthrates and household formation, income, and political attitudes. Religious leaders can encourage consumption, but more importantly, they discourage it- sometimes with powerful effects.

## **2.7. EMPIRICAL RESULTS**

In this section, an attempt is made to describe the theoretical foundations of the different factors hypothesized to affect the demand for long term insurance as follows:

### **2.7.1. Long Term insurance demand**

Hakansson (1969) and Yaari (1965) were the first to develop a theoretical framework to explain the demand for long term insurance. Within this framework, the demand for long term insurance is attributed to a person's desire to bequeath funds to dependents and provide income for retirement. Lewis (1989) extends this framework by explicitly incorporating the preferences of the dependents and beneficiaries into the model. Following Lewis's model, long term insurance demand is determined by maximization of the beneficiaries' expected lifetime utility. Protection of dependent members of family against financial hardship in the case of a wage earner's premature death is important motive of buying long term insurance. Thus, higher number of dependents implies increasing demand for long term insurance. However, numerous family members may limit the wage earner's financial sources, implying negative effects of families' members on long term insurance consumption. In addition to this the person's positive attitude toward buying long term insurance is also included in the framework. This is the demand side of long term insurance and this study is based on this model, and it is taken as dependent variable.

Long term insurance demand: customers' interest in acquiring long term insurance and it is measured by:

- ❖ The desire to bestow funds to dependents at the time of death
- ❖ A person's desire to bestow funds to provide income for retirement
- ❖ Positive attitude towards purchasing long term insurance
- ❖ The dependents preference for long term insurance

### **2.7.2. Religious belief**

Dependency on a belief based on religion negatively affects the consumption of long term insurance. This was proved by different researchers that:

- ❖ A religious principle forbids buying long term insurance
- ❖ Purchasing long term insurance means abuse of God's protective ability
- ❖ Religion encourages other method of risk management rather than buying long term insurance.

In his research, Zeilzer (1979) concluded that religion has created a negative perception about long term insurance since long time. Religious people, especially, Catholics, Muslims and a

few other sects oppose long term insurance coverage thinking that it is an insult to the God's power of protection. Religion and culture can affect a person's perception on risk aversion which results in less demand for long term insurance. Until the nineteenth century, European nations condemned and banned long term insurance on religious grounds. He also states that religious antagonism to long term insurance still remains in several Islamic countries. In similar vein, Wasaw and Hill (1986) tested the effect of Islam on long term insurance consumption using an international data set. The results of their study indicate that, *ceteris paribus*, customers in Islamic nations purchase less long term insurance than those in non-Islamic nations.

In addition, the religious inclination of a population may affect its risk aversion (Beck and Webb, 2003). Browne and Kim (1993) find Islamic beliefs to significantly decrease long term insurance purchases. It is expected that a high percentage of religious people in a country negatively affect insurance purchases, especially in Islamic countries. Prior studies have indicated the presence of strong negative correlation between the share of Islamic believers in a country's population and the demand for long term insurance. Unlike other studies, the result of an exploratory study conducted by Badru, Yusuf, and Isola (2013), in Lagos Nigeria shows that Nigerians' religious persuasions do not impact negatively on insurance investment.

### **2.7.3. Knowledge and Awareness**

Knowledge and awareness for the use of long term insurance service is positively related to insurance consumption. This is because the higher the level of one's awareness of a thing, the more likely the person will appreciate its value. The lack of sophistication or awareness and knowledge of insurance on the part of the consuming public has been identified as a major hindrance to insurance consumption. Majority of insurance customers misunderstand the very purpose of insurance and this misunderstanding creates widespread difficulties for insurance business against expenditure. Wilson (2004) observed that much of the dissatisfaction with insurance is based on a faulty idea of what insurance is and how it operates. With this level of awareness, insurance patronage and utilization becomes an overwhelming task. This problem is even made worse by the high level of illiteracy among the citizenry (Oworen, 1993). An institutional bottleneck that affects insurance business and



utilization as argued by Gowon (2004) is insufficient publicity and public awareness campaign by insurance companies.

Khan (2006) stated that awareness or knowledge test is used to find out what the customers are aware of and what they do not know. This is imparted to them by advertising and by other promotional methods. This can be done by using awareness approaches of unaided recall, aided recall, or by recognition.

The idea is to find out whether the customer is:

- ❖ Responsive to the attributes of long term insurance
- ❖ Aware of the availability of the long term insurance
- ❖ Responsive of the price for long term insurance
- ❖ Reactive where long term insurance is available
- ❖ Aware of the company making long term insurance
- ❖ Responsive to the use of long term insurance

#### **2.7.4. Individual Income**

The effect of current income on long term insurance demand is examined in numerous studies (Duker 1969), Ferber and Lee (1980), Truett and Truett (1990), Showers and Shotick (1994), Gandolfi and Miners (1996).

Showers and Shotick (1994) used a Tobit analysis to analyze the effect of household characteristics on the demand for total long term insurance with data from the customer expenditure study in 1987. The dependent variable used was premium expenditures on long term insurance service. They assumed that long term insurance was a normal service. The Tobit analysis indicated that a positive relationship existed between income and expenditures on long term insurance premiums. They explained that as income increased the household has a motive to buy better long term insurance because it is bought as a function of the income replacement needed, in the event of an unexpected death of the major wage earner.

Çelik and Kayali (2009) have studied determinants of demand for long term insurance in European countries and concluded that income per capita has positive and significant effect on demand for long term insurance. 1% increases in income per capita causes 1.91% increase in demand for long term insurance. They found that income is the most important variable

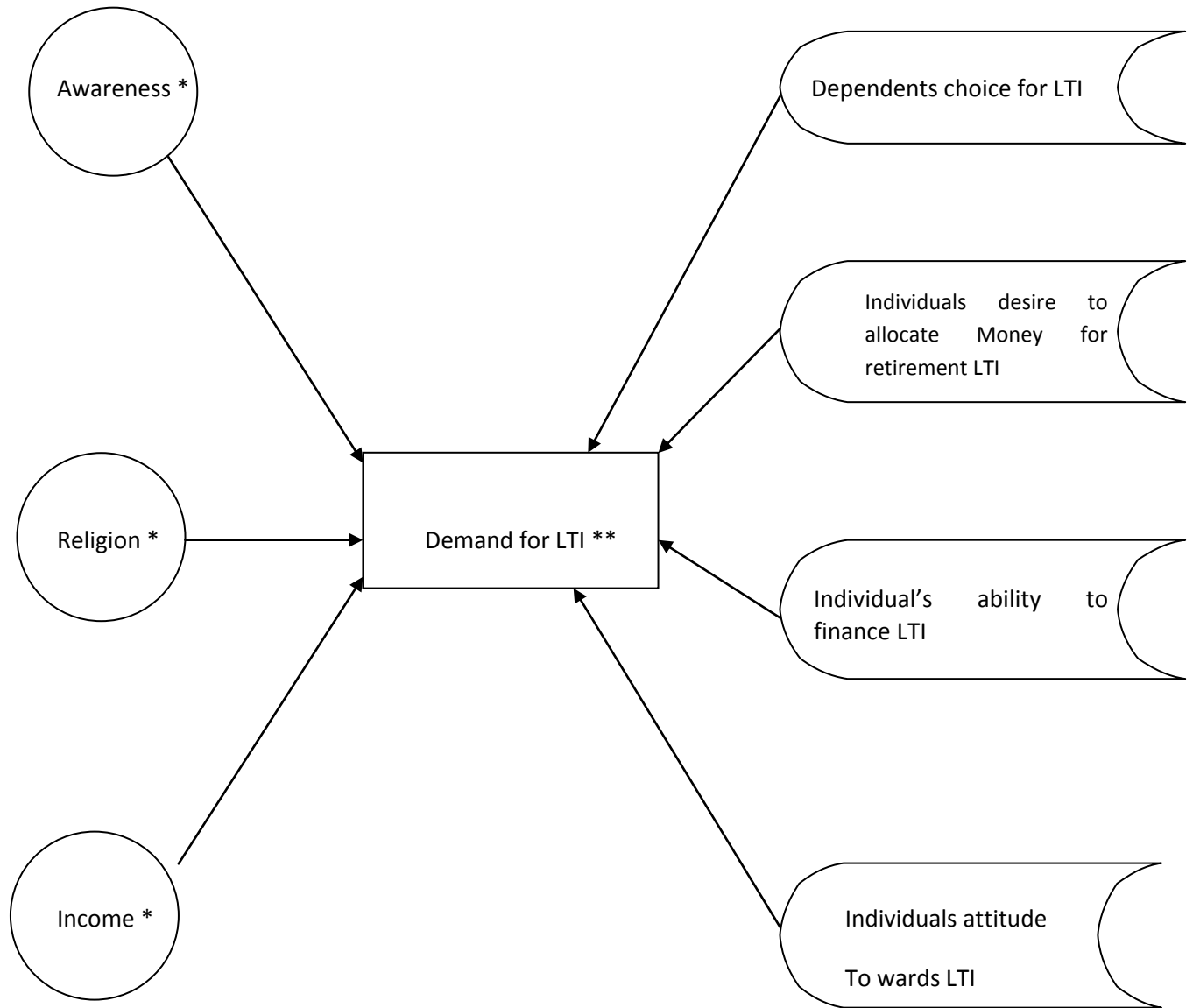
which affects utilization of long term insurance. This assessment has gathered a data on whether the current income of respondents has hindered them from buying long term insurance. The output does not show that increasing the current income will increase demand by some percentage.

According to Yusuf, Gbadamosi & Hamadu (2009), household income of respondents has significant influence on Nigerians attitude to long term insurance. Low household incomes have lesser positive attitude to insurance than high household income groups. This can be explained partially by the fact that middle income groups are more vulnerable than wealthy household in Nigeria. In fact, wealthy household relatively feel secured usually in Nigerian economic environment.

Rising cost of living expense minimizes or reduces the saving capacity of an individual and hence affects purchase of long term insurance. In other ways lower cost of living expense increase the purchasing power of an individual. People who unable to buy a service because of low current income plans for future purchase of the service expecting increase in income. Income is generally found to be positively related to the demand for long term insurance, holding other factors remaining steadily.

## 2.8. Conceptual framework of the study

Figure 2.1 Conceptual frameworks for Long term insurance demand drivers and factors affecting it.



❖ Framework developed based on theories

\*\* -- Dependent factors

\* --- Independent factor

## CHAPTER THREE

### RESEARCH DESIGN AND METHDOLOGY

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#### 3.1. RESEARCH DESIGN

This study used a deductive design approach, as it used to test theories which are developed by other researchers at different time. It is a non experimental hypothesis testing research. In analytical research, on the other hand, the researcher has to use facts or information already available, and analyze these to make a critical evaluation. The study is also an explanatory type of research.

#### 3.2. POPULATION AND SAMPLING TECHNIQUE

##### Sample design

Population Target:

People who have not bought any type of long term insurance policy:

- ❖ Business owners (who earn their own income/profit)
- ❖ Company employees (other than insurance company employees as well as those whose company buys long term insurance for the employees). The reason is that these groups are fully aware of the benefit and use of long term insurance.

**Sampling technique:** non-probability samples are those based on convenience sampling. Population elements are selected for inclusion in the sample based on the ease of access.

Geographic areas covered:

In order to generalize, the research findings to the whole Ethiopia, the researcher has selected six major cities in addition to Addis Ababa (capital city of Ethiopia), Adama, Hawasa, Dere dawa, Mekele, Jimma, and Bahir dar. These cities have more number of employees in every sector where the long term of individual workers are also at risk. That means individuals working in different factories, for example are at higher risk of death, disability, and illness.

The areas under study for Addis Ababa are; Merkato, Laghar, Piazza, Megnagna, Bole, and Saris. This is done because the areas are more condensed with population and business areas.

Business centers like Boutiques are also selected, in order to include both business owners and paid workers.

Governmental and nongovernmental offices except insurance companies and other companies which buy long term insurance for employees are also used to collect the primary data.

**Sample size:** 400. For infinite population, the minimum sample size is 384. But in order to get a higher return rate (in case there might be less than 384 responses), 400 samples are taken. The formula for sample size determination when the population is universe is attached to the appendix III & V.

- ❖ Christian= 211 (orthodox + protestant + catholic).....52.5%
- ❖ Muslim = 136..... 34% of total sample
- ❖ ‘Others’ = 54.....13.5% of total sample

From a total sample of 400 individuals, 240 samples were taken from the six cities out of Addis Ababa (40 each city). From each city 40 samples as per the percentage of religious group were taken. The rest 160 samples were taken from Addis Ababa, as it has a more percentage of population than each of the six cities. From a total of 400 samples, 211 Christian, 136 Muslims, and 54 ‘others’ are taken based on the percentage of religion in the country (Nucbe), Basic Information about the Ethiopia.

### 3.3. TYPES OF DATA

In order to gather the data from relevant sources, both primary and secondary data collection instruments were used.

- ❖ **Primary data:** primary data is a data originated by the researcher for the specific purpose of addressing the research problem. It is what the researcher originally collects from the sample population. In this study the primary data will be gathered from respondents by using self designed questionnaire.
- ❖ **Secondary data:** The secondary sources of data were collected from review of journals, articles, books both published and unpublished earlier research, the National Bank of Ethiopia.

### **3.4. DATA COLLECTION TOOLS**

The data collection tools used to obtain the desired information from primary sources is a questionnaire. The questionnaire consist 25 questions out of which 7 questions seek information on demographic characteristics of respondents, and the rest 18 questions are designed to gather data on awareness, income reason, religious reason, and demand for long term insurance. All of the 18 questions are designed using a five point Likert scale in which respondents are required to give their response in selecting either strongly disagree, disagree, neutral, agree, or strongly agree.

Designed by Rensis Likert, Likert scale is a very popular rating scale for measuring ordinal data in social science research. This scale includes Likert items that are simply-worded statements to which respondents can indicate their extent of agreement or disagreement on a five or seven-point scale ranging from “strongly disagree” to “strongly agree” (Bhattacharjee, 2012).

The questions printed in a definite order on a form are distributed door to door by the researcher, so that it is a person administered form of questionnaire. The questionnaire method is selected because of its ease of data gathering and its objective nature. A highly structured study questionnaire (where respondents select an answer from a given set of choices), intended to collect quantitative data, was used and it also left a room for one open-ended questions to collect qualitative data that may generate unexpected insights not otherwise possible from quantitative data alone.

### **3.5. PROCEDURE OF DATA COLLECTION**

Structured questionnaires were designed using a 5 point Likert scale item. In order to capture the interest of the respondents a total of 26 questions including 1 open ended question are prepared in a 2 page single paper format. To avoid misunderstanding of some questions, a pilot study was performed and adjustments were done on the questions. The researcher believed that questions related to long term insurance, needs clarification of some concepts to respondents. Therefore, in order to minimize the non response rate, field study was performed by the researcher and by intimate friends. Questionnaires in Addis ababa, Adama, Hawasa, and Bahirdar were administered by the researcher on the way while taking trip for

business purpose. For Jimma, Mekele, and Dire dawa, the researcher has used friends working in the same company. The parameter of interest in which the respondent was selected is religion type and not holding any long term insurance policy.

### **3.6. METHOD OF DATA ANALYSIS**

Descriptive analysis of data was used at the first stage of the analysis. At this stage of the analysis frequency tables, and the central tendency measures of an ordinal scale; median and mode were used. Graphs are also used to present and analyze the nominal data.

In general SPSS software was used to code and analyze the research data. All the questions are entered in the software using coding system for the responses.

At the inferential analysis stage; Spearman's coefficient of correlation was used to examine the correlation between the independent variables and the demand for long term insurance and to test the hypothesis. Charles Spearman's coefficient of correlation (or rank correlation) is the technique of determining the degree of correlation between two variables in case of ordinal data where ranks are given to the different values of the variables. The main objective of this coefficient is to determine the extent to which the two sets of ranking are similar or dissimilar. The main objective of this coefficient is to determine the extent to which the two sets of ranking are similar or dissimilar (Kothari, 2004). According to Marczyk, DeMatteo, and Festinga (2005) Spearman rank-order(rs) is used to examine the relationship between two variables measured on ordinal scales.

The questions are composed of nominal and ordinal data which allows the use of the above non parametric statistics of data analysis methods. Descriptive statistics such as frequency tables are also used to determine the demographic characteristics of respondents. In addition to this qualitative data also analyzed using data coding system.

The specific rating scales level properties used in the data collection are, Likert rating scales, and nominal rating scales which are not binary itemized rating scale also known as arithmetical size.

## **CHAPTER FOUR**

### **DATA PRESENTATION, ANALYSIS AND INTERPRETATION**

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#### **4.1. INTRODUCTION**

As previously stated above the main objective of this study is to assess whether awareness, income and religious belief of the people affect demand for long term insurance by taking a sample of four hundred people who were not insured from all religious groups. The sample was classified under three strata based on the religious belief of the people. The sample size for each religious group was taken based on the percentage of their distribution in the country. In calculating the sample size, the total population of Ethiopia above age 18 and less than 65 was taken as discussed under the sampling methodology above. From the total of four hundred questionnaires three hundred ninety one are found error free and used for this study purpose. That means above 97.75% return rate was achieved from the questionnaires distributed to all religious groups. Therefore, the entire analysis given in this study is based on the actual questionnaires returned.

#### **4.2 RESPONDENTS DEMOGRAPHIC INFORMATION**

The first part of the questionnaire consists of the demographic information of the participants particularly with regarding to respondents variables of age, gender, marital status, educational level, employment status, income category, and type of religion. This data is summarized under the following tables.

From table 4.1, 51.7% of the respondents are Christianities, 34.8% are Muslims, and 13.6% are 'other' types of religions. All subsequent analysis is based on the type of religious belief of the respondent and they are mutually exclusive samples. As it can be observed, from the total of 391 respondents, 66.5% of them are male while the rest 33.5% are female respondents. Regarding their age category, about 37.3% of respondents are within the age of 41-54, taking the largest share followed by age category of 29-40 by 35.5%. From the total of 391 respondents, the largest share in educational level is diploma and it is 35.3% followed by degree, grade 10 up to 12+, and below grade 10, by 27%, 20.5%, and 14.3% respectively.



The smallest percentage share is masters and above educational level with a count of eight respondents only.

**Table 4.1. Summary of the total count and percentage of respondents' demographic character**

<b>Gender</b>	<b>Frequency</b>	<b>Percent</b>	<b>Educational level</b>	<b>Frequency</b>	<b>Percent</b>
Male	260	66.5	Below grade 10	56	14.3
Female	131	33.5	Grade 10 up to 12+	80	20.5
<b>Religion</b>	<b>Frequency</b>	<b>Percent</b>	Diploma	138	35.3
Christian	202	51.7	Degree	109	27.2
Muslim	136	34.8	Masters and above	8	2
Others	53	2.8	total		100
<b>Age category</b>	<b>Frequency</b>	<b>Percent</b>	<b>Marital status</b>	<b>Frequency</b>	<b>Percent</b>
18-28	49	12.5	Single	137	35
29-40	139	35.5	Married with no children	40	10.2
41-54	146	37.3	Married with children	193	49.4
55-65	57	14.6	Divorced	21	5.4
<b>Employment status</b>	<b>Frequency</b>	<b>Percent</b>	<b>Income category in Birr</b>	<b>Frequency</b>	<b>Percent</b>
Business owner	153	39.1	Below 4000	49	12.5
Paid worker	227	58.1	From 4000 to 7000	129	33
Any other	11	2.8	From 7001 to 10000	71	18.2
			From 10001 to 15000	79	20.2
			Above 15,000	63	16.1

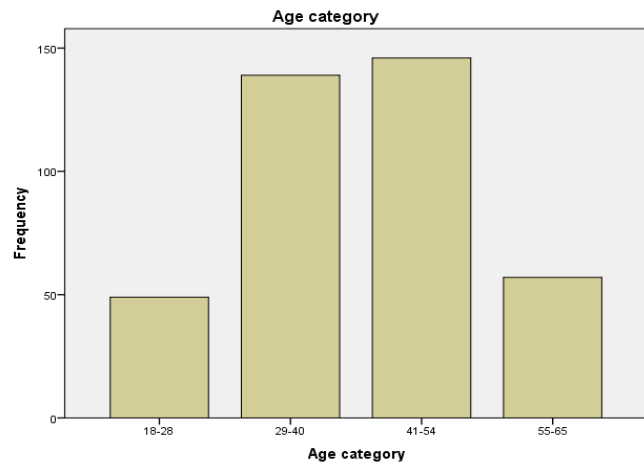
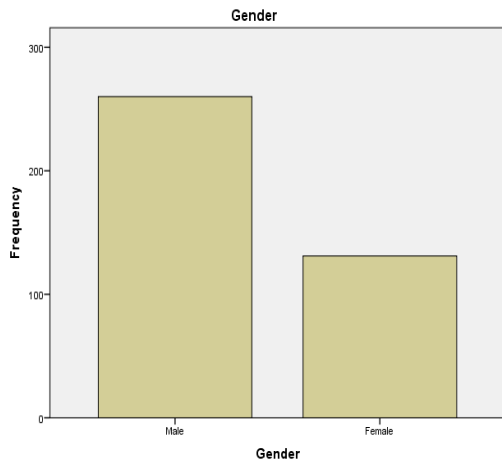
Source: Questionnaires Result 2016

From the total 391 respondents 49.4% of them are married and have children, while 35% are single individuals. The rest 10.20% and 5.4% are married with no children, and divorced respectively. For the purpose of this study the monthly average income of respondents was

classified under five categories. As per the collected data, about 33% of the respondents earn monthly income from Birr 4000 up to 7000. The rest earn below birr 4000, from 7001 to 10,000, from 10,001 to 15,000, and above 15,000 by 12.53%, 18%, 20%, and 18% respectively.

The following bar charts also display demographic characteristics of respondents

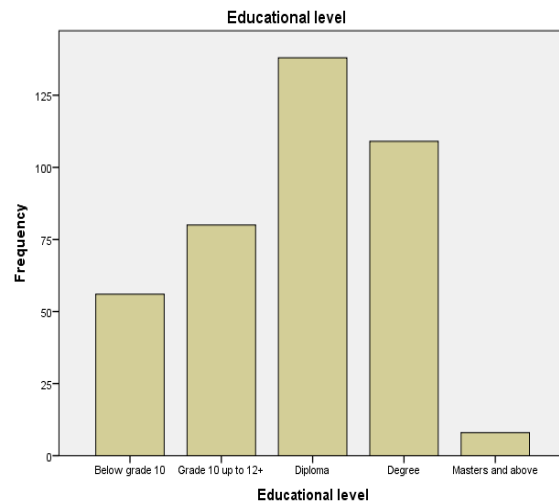
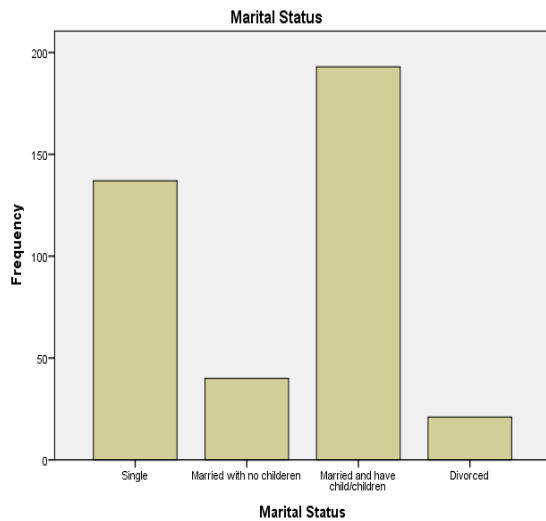
Fig 4a: Bar chart for sex category of respondents    Fig 4b: Bar chart for age category of respondents



Source: Questionnaires Result 2016

Fig 4c: Bar chart for marital status of respondents

Fig 4d: Bar chart for educational level of respondents



Source: Questionnaires Result 2016

### 4.3 RELIABILITY

Generally it refers to the consistency or dependability of a measurement technique. More specifically, reliability is concerned with the consistency or stability of the score obtained from a measure or assessment technique over time and across settings or conditions. In its simplest form, reliability is concerned with the relationship between independently derived sets of scores, such as the scores on an assessment instrument on two separate occasions. Accordingly, reliability is usually expressed as a correlation coefficient, which is a statistical analysis that tells us something about the relationship between two sets of scores or variables. Adequate reliability exists when the correlation coefficient is 0.80 or higher (Marczyk, DeMatteo, and Festinger, 2005).

Reliability can be estimated in terms of average inter-item correlation, average item-to-total correlation, or more commonly, Cronbach's alpha. Cronbach's alpha is a reliability measure designed by Lee Cronbach in 1951 (Bhattacharjee, 2012).

Accordingly, the Cronbach alpha for the general instrument (for 18 items) is found to be 0.928 or 92.8% and this is more than 0.80 and it is acceptable.

Table 4.2 Reliability Statistics for the instrument

Cronbach's Alpha	N of Items
.928	18

Source: Questionnaires Result 2016

The reliability for items in each research variable category namely, awareness, religion, income, and demand are also shown in table 4.3.

Table: 4.3 Reliability statistics for each item of awareness, religion, income and demand

ITEMS	Cronbach's Alpha	N
Awareness	0.945	8
Income	0.907	4
Religion	0.848	3
Demand	0.944	3

Source: Questionnaires Result 2016

#### 4.4. VALIDITY

It is usually called construct validity, refers to the extent to which a measure adequately represents the underlying construct that it is supposed to measure (Bhattacharjee, 2012). Theoretical and empirical aspects of the measurement are considered in to confirm the validity of measurement. All of the measurements are believed to measure the variables namely awareness factors, income related factors, religion related factors and demand related factors. The content validity of measurement procedures are examined and approved by the advisor of the thesis.

#### 4.5. DESCRIPTIVE STATISTICS OF PRIMARY DATA

##### 4.5.1. Descriptive analysis, and interpretation of awareness data

Based on the responses gathered, I have tried to identify whether the factors identified have affected demand for long term insurance. The questionnaires were designed using Likert Scale for both the independent and the dependent variables ,where almost all the statements were measured on a five point scale with 1 = strongly disagree; 2 = disagree; 3 = undecided; 4 = agree; and, 5 = strongly agree. The questions were categorized under measurement of awareness, measurement of income, and measurement for religious reasons against long term insurance, measurement for overall demand for long term insurance.

The following table shows primary data gathered in order to measure awareness level. Eight constructs intended to measure the awareness and knowledge of long term insurance were prepared. Each question was pre-coded in order to make the data management and entering in SPSS.

Table 4.4: The following table shows summary of descriptive statistics for awareness level of long term insurance.

Questions	Response	Frequency	Percent	Valid percent	Cum. percent
I understand the benefit of having long term assurance	Strongly disagree	77	19.7	19.7	19.70
	disagree	219	56.0	56.0	75.7
	undecided	20	5.1	5.1	80.8
	agree	55	14.10	14.10	94.9
	Strongly agree	20	5.1	5.1	100
I know the protection benefit of long	Strongly disagree	78	19.9	19.9	19.9
	disagree	212	54.2	54.2	74.2
	undecided	28	7.2	7.2	81.3

term assurance	agree	48	12.3	12.3	93.6
	Strongly agree	25	6.4	6.4	100
I know the saving benefit of long term insurance	Strongly disagree	90	23.0	23.0	23.0
	disagree	191	48.8	48.8	71.9
	undecided	30	7.7	7.7	79.5
	agree	60	15.3	15.3	94.9
	Strongly agree	20	5.1	5.1	100
I know that Long term assurance provides financial security to the family, when the income earner dies	Strongly disagree	84	21.5	21.5	21.5
	disagree	202	51.7	51.7	73.10
	undecided	28	7.2	7.2	80.3
	agree	57	14.60	14.60	94.90
	Strongly agree	20	5.1	5.1	100
I know the availability of long term insurance in Ethiopia	Strongly disagree	56	14.30	14.3	14.30
	disagree	66	16.9	16.9	31.2
	undecided	97	24.8	24.8	56.0
	agree	134	34.3	34.3	90.3
	Strongly agree	38	9.7	9.7	100.0
I know how much to pay to buy long term insurance	Strongly disagree	158	40.4	40.4	40.4
	disagree	141	36.1	36.1	76.5
	undecided	29	7.4	7.4	83.9
	agree	47	12.0	12.0	95.9
	Strongly agree	16	4.1	4.1	100
I know where to buy long term insurance	Strongly disagree	41	10.5	10.5	10.5
	disagree	159	40.7	40.7	51.2
	undecided	37	9.5	9.5	60.6
	agree	101	25.8	25.8	86.4
	Strongly agree	53	13.6	13.6	100
I know why people decide to buy long term insurance in general	Strongly disagree	53	13.6	13.6	13.6
	disagree	168	43.0	43.0	56.5
	undecided	74	18.9	18.9	75.4
	agree	47	12.0	12.0	87.5
	Strongly agree	49	12.5	12.5	100

Source: Questionnaires Result 2016

As per the data from this table, about 75.75% of respondents do not understand the benefit of having long term insurance (77+219) of respondents.

- About 74% (78+212) of respondents do not know the protection benefit of long term insurance
- About 71% (90+191) of them do not know the saving benefit of long term insurance
- About 73% (84+202) of respondents do not know that Long term assurance provides financial security to the family, when the income earner dies

- 44% (56+66) of respondents know the availability of long term insurance in Ethiopia, while 31% do not know, and about 24% (97) fail to decide on the issue.
- About 75% (158+141) of respondents do not know about the price of long term insurance service
- About 51% (41+159) of respondents do not know where to buy long term insurance, while **39%** know where to buy long term insurance.
- About 56% (53+168) do not know why people decide to buy long term insurance in general.

From this descriptive data we can see that there is a large gap in awareness and knowledge of long term insurance. From a total of 8 questions intended to measure awareness, it is only the knowledge of where to buy long term insurance, which scored 39% positive response (agree + strongly agree). This might be due to some media promotion or personal experience. But creating awareness of a service in order to make a sales require customers more than knowing where to buy it. In other ways it needs knowing the core Service. The customer must first know what the core benefits the service will provide. Knowing long term insurance policy at the most basic level requires knowing its benefits and cost (as discussed in the literature part of this paper). This in turn requires intensive information search from the side of the customer. As enumerated by different writers, long term insurance is classified under ‘unsought’ goods classification of consumer services. In general, from this data we can conclude that there is a very low awareness level of long term insurance in Ethiopia.

#### **4.5.2. Descriptive analysis, and interpretation of income data**

To assess whether people are not buying long term insurance because of lower purchasing power or not, four questions related to income issues are raised. Respondents are asked to record their agreement level on all selected items using a 5-point Likert-type scale, ranging from ‘strongly disagree’ to ‘strongly agree’. The strongest favorable response is scored as 5, whereas the strongest unfavorable response as 1. The questions are presented below with their responses.

**Table 4.5: summary of response to each question under income factors**

questions	response	frequency	percent	Valid percent	Cum. percent
My current income cannot cover the cost of long term insurance	Strongly disagree	13	3.3	3.3	3.3
	disagree	81	20.7	20.7	24.0
	undecided	177	45.3	45.3	69.3
	agree	65	16.6	16.6	85.9
	Strongly agree	55	14.1	14.1	100
Cost-of-living expenses are keeping me from buying long term insurance.	Strongly disagree	7	1.8	1.8	1.8
	disagree	157	40.2	40.2	41.9
	undecided	94	24.0	24.0	66.0
	agree	91	23.3	23.3	89.3
	Strongly agree	42	10.7	10.7	100
I will most probably buy long term insurance if my income is increased	Strongly disagree	3	0.8	0.8	0.8
	disagree	81	20.7	20.7	21.5
	undecided	157	40.2	40.2	61.6
	agree	112	28.6	28.6	90.3
	Strongly agree	38	9.7	9.7	100
I am willing to buy long term insurance if the price is within my purchasing power	Strongly disagree	7	1.8	1.8	1.8
	disagree	93	23.8	23.8	25.6
	undecided	88	22.5	22.5	48.1
	agree	155	39.6	39.6	87.7
	Strongly agree	48	12.3	12.3	100

Source: Questionnaires Result 2016

As per the data in this table:

- ❖ About 30% of respondents believe that their current income cannot cover the cost of long term insurance. While 45% of the respondents fail to decide on the issue, about 23% of them disagree.
- ❖ About 33% of respondents accept that cost-of-living expenses are keeping them from buying long term insurance, while 41% of them do not accept the issue. 24% of the respondents fail to decide.
- ❖ About 37% of respondents will most probably buy long term insurance if their income is increased, and 40% of them preferred to undecided on the issue. Only 20% of respondents fail to accept buying long term insurance even if their income is increased.
- ❖ About 51% of respondents are willing to buy long term insurance if the price is within their purchasing power, and 22% of the respondents fail to decide. Only 25% of them fail to accept the idea of buying even if the price is within their purchasing power.

From this descriptive statistics we can see that the decision of respondents is not consistent. This indicates their lack of awareness of the price of the insurance as well as its benefits, rather than their purchasing power. If we investigate the percentage of respondents who failed to decide on all income issues, it is higher. Fail to decide on some issue is an indication of lack of full knowledge of it. A good indication of affordability on demand for long term insurance is that about 51% of the respondents are willing to buy if there is a long term insurance policy within their purchasing power.

#### 4.5.3. Descriptive analysis, and presentation of religion data

Respondents are categorized under three groups based on the type of religion as Christian, Muslim, and others. The same questions are forwarded to all religious groups and the response is summarized in the following table. From the data in the table, we can observe that, 151 (74.5%) Christians, out of 202 do not accept that there is a religious principle forbidding buying long term insurance (strongly disagree and disagree), while 40 Christians fail to decide on this issue. For the same question, 56 Muslims, out of 136 disagree. Based on the data on table 4.6 all the three hypotheses are tested using spearman’s rho as stated in table.

**Table 4.6: Descriptive statistics of response to question related to religious belief.**

	Religion	Strongly disagree	Disagree	Undecided	Agree	Strongly Agree
There is a principle on my religion forbidding buying long term insurance policy	Christian	62	89	40	1	10
	Muslim	0	56	58	17	5
	Others	19	29	5	0	0
Purchasing long term assurance policy means abuse of God’s protective ability	Christian	42	96	54	0	10
	Muslim	25	40	21	29	21
	Others	9	19	25	0	0
My religion encourages to use other methods of risk management rather than buying long term insurance	Christian	44	86	62	0	10
	Muslim	0	57	43	21	15
	Others	19	10	24	0	0

Source: Questionnaires Result 2016



From this table it can be observed that from a total of 202 Christians, 136 Muslims, and 53 ‘others’;

- ❖ about 74% (strongly disagree + disagree) of Christians, 41% Muslims, and 90% of ‘other’ religious groups do not accept that there is a principle on religion forbidding buying long term insurance policy. About 42% of Muslims fail to decide about the presence of religious principle.
- ❖ about 68% of Christians, 47% of Muslims, and 52% of ‘others’ do not believe that purchasing long term assurance policy means abuse of God’s protective ability.
- ❖ 64% of Christians, 41% of Muslims, and 54% of ‘others’ do not accept the statement that says my religion encourages to use other methods of risk management rather than buying long term insurance.
- ❖ About 30% of Muslim respondents fail to decide on religious issues

From this descriptive statistics, we can observe that the three types of religion category have different response on religious issues. However there is similarity between Christians and ‘other’ religious groups. According to this data, except for Muslims, the probability of ignoring long term insurance in religious ground is very low as per the response to each question.

**Table 4.7: Summary of responses for each question on demand for Long Term Insurance.**

questions	response	frequency	percent	Valid percent	Cum. percent
I have the desire to bequeath funds to my dependents and provide income for my retirement	Strongly disagree	69	17.6	17.6	17.6
	disagree	213	54.5	54.5	72.1
	undecided	28	7.2	7.2	79.3
	agree	52	13.3	13.3	92.6
	Strongly agree	29	7.4	7.4	100
My dependents prefer long term insurance for financial security	Strongly disagree	73	<b>18.7</b>	<b>18.7</b>	<b>18.7</b>
	disagree	214	<b>54.7</b>	<b>54.7</b>	<b>73.4</b>
	undecided	20	<b>5.1</b>	<b>5.1</b>	<b>78.5</b>
	agree	60	<b>15.3</b>	<b>15.3</b>	<b>93.9</b>
	Strongly agree	4	<b>6.1</b>	<b>6.1</b>	<b>100</b>
I have positive attitude towards purchasing long term insurance	Strongly disagree	82	<b>21.0</b>	<b>21</b>	<b>21.0</b>
	disagree	184	<b>47.1</b>	<b>47.1</b>	<b>68.0</b>
	undecided	34	<b>8.7</b>	<b>8.7</b>	<b>76.7</b>
	agree	68	<b>17.4</b>	<b>17.4</b>	<b>94.1</b>
	Strongly agree	23	<b>5.9</b>	<b>5.9</b>	<b>100</b>

Source: Questionnaires Result 2016

From the above table we can see that:

- ❖ About 73% of the respondents' dependents do not prefer long term insurance for financial security, indicating very low demand for long term insurance.
- ❖ About 72% do not have the desire to bequeath funds to dependents and provide income for retirement.
- ❖ About 68% of respondents do not have positive attitude towards purchasing long term insurance.

All of the three proxies for the long term insurance demand show the existence of low demand for long term insurance. If we see this data against the previous awareness data, the response of the respondents coincide with the response to demand for long term insurance. This is an indication, as a proof for the stated research problem to this point.

#### 4.5.4. Descriptive analysis, and interpretation of qualitative data

In order to obtain some unexpected insights from respondents, one open ended question was left to the respondents. In the space provided to respondents to give any of their comment about long term insurance, 102 respondents gave their comment. The comments are generalized and were coded in order to interpret.

After summarizing and coding the responses in to 7 categories (table 4.8), the following was obtained.

- ❖ 58% percent of 102 respondents said that insurance companies are not promoting the available insurance services intensively.
- ❖ 24% respondents said that the price of long term insurance services is expensive and it is not encouraging to buy.
- ❖ 8 (7.8%) respondents said that saving is from God.

Very Low announcement of insurance service is responsible to low awareness and knowledge of the insurance services. This idea is consistent with the quantitative findings of the research on awareness level.

Table: 4.8 Summary of coded qualitative data

	Frequency	Percent	Valid Percent	Cumulative Percent
Valid No comment	289	73.9	73.9	73.9

No need of long term insurance	2	.5	.5	74.4
The price required by insurance companies is not fair	3	.8	.8	75.2
SAVING IS FROM GOD	8	2.0	2.0	77.2
Buying long term insurance is a matter of financial issue and not religious issue	4	1.0	1.0	78.3
The price is expensive and it is not encouraging to buy	25	6.4	6.4	84.7
Insurance companies are not promoting their services	60	15.3	15.3	100.0
Total	391	100.0	100.0	

Source: Questionnaires Result 2016

#### 4.5.5 Measure of central tendency

Mean Median and mode and standard deviation for awareness, income, religion, and demand.

Table:4.9 Measure of central tendency

	Awareness of long term insurance	Religious factor	Income factor	Demand for long term insurance
N Valid	391	391	391	391
N Missing	0	0	0	0
Mean	2.49	2.30	3.20	2.38
Median	2.25	2.00	3.00	2.00
Mode	2	2	3	2
Std. Deviation	.991	.835	.894	1.088

Source: Questionnaires Result 2016

From this table we can see that the most frequently observed response in awareness measurement is 2. That is most of the respondents disagree on knowing the roll, benefits, price, and availability of long term insurance. This is an indication of low awareness of long term insurance. The most frequently observed response for income factor is 3. That means the respondents fail to decide on income issues for demand of long term insurance. This may

be due to low awareness of long term insurance. Because if we do not know about the benefits of having long term insurance it is difficult to talk about buying or if we do not know the price we cannot say that our income cannot cover the cost. Regarding the religious factor, most respondents disagree on religious reasons against long term insurance.

#### **4.6. INFERENCE ANALYSIS OF PRIMARY DATA**

Inferential analysis is concerned with the various tests of significance for testing hypotheses in order to determine with what validity data can be said to indicate some conclusion or conclusions (Kothari, 2004). Inferential analysis refers to the statistical testing of hypotheses. Inferential statistics are the statistical procedures that are used to reach conclusions about associations between variables. They differ from descriptive statistics in that they are explicitly designed to test hypotheses (Bhattacharjee, 2012).

As an inferential analysis, correlation analysis studies the joint variation of two or more variables for determining the amount of correlation between two or more variables in most social and business researches our interest lies in understanding and controlling relationships between variables then with determining causes per se and as such we consider correlation analysis as relatively more important.

The probability that a statistical inference is caused pure chance is called the p-value. The p-value is compared with the significance level ( $\alpha$ ), which represents the maximum level of risk that we are willing to take that our inference is incorrect. For most statistical analysis,  $\alpha$  is set to 0.05. A p-value less than  $\alpha=0.05$  indicates that we have enough statistical evidence to reject the null hypothesis, and thereby, indirectly accept the alternative hypothesis. If  $p>0.05$ , then we do not have adequate statistical evidence to reject the null hypothesis or accept the alternative hypothesis.

Sir Ronald A. Fisher, one of the most prominent statisticians in history, established the basic guidelines for significance testing. He said that a statistical result may be considered significant if it can be shown that the probability of it being rejected due to chance is 5% or less.

In inferential statistics, this probability is called the p-value, 5% is called the significance level ( $\alpha$ ), and the desired relationship between the p-value and  $\alpha$  is denoted as:  $p \leq 0.05$ . The significance level is the maximum level of risk that we are willing to accept as the price of our inference from the sample to the population. If the p-value is less than 0.05 or 5%, it means that we have a 5% chance of being incorrect in rejecting the null hypothesis or having a Type I error in alternate hypothesis.

In the following sections, data examined the using statistical techniques used for inferential analysis and tested the hypotheses. The quantitative data analysis is conducted using software program SPSS. Before making analysis, data transformation was performed using SPSS in order to create the target variables; awareness, religion, income, and demand.

#### **4.6.1. TESTING THE HYPOTHESES AND INTERPRETATION**

##### **4.6.2. Spearman's rank correlation**

In case of bi-variate population correlation can be studied through (a) cross tabulation; (b) Charles Spearman's coefficient of correlation; (c) Karl Pearson's coefficient of correlation; whereas cause and effect relationship can be studied through simple regression equations. Charles Spearman's coefficient of correlation (or rank correlation) is the technique of determining the degree of correlation between two variables in case of ordinal data where ranks are given to the different values of the variables. When the data are not available to use in numerical form for doing correlation analysis but when the information is sufficient to rank the data as first, second, third, and so forth, we quite often use the rank correlation method and work out the coefficient of rank correlation. In fact, the rank correlation coefficient is a measure of correlation that exists between the two sets of ranks. In other words, it is a measure of association that is based on the ranks of the observations and not on the numerical values of the data (Kothari, 2004). So, the characteristics of the data in this study permit the use of spearman's correlation.

Using spearman’s rho correlation, as output from SPSS, we can now test the hypothesis for awareness and demand for long term insurance. The characteristic of the data fulfils all the assumptions of spearman’s rho correlation.

**1. Hypothesis 1- HA: Awareness affects demand for long term insurance in Ethiopia**

Table 4.10 Correlations table awareness vs. long term insurance demand

		Demand for long term insurance	Awareness level of long term insurance	
Spearman's rho	Demand for long term insurance	Correlation Coefficient	1.000	
		Sig. (2-tailed)	.000	
		N	391	
	Awareness level of long term insurance	Correlation Coefficient	.833**	1.000
		Sig. (2-tailed)	.000	.
		N	391	391

\*\* . Correlation is significant at the 0.01 level (2-tailed).

Source: Questionnaires Result 2016

The output from the above table shows a positive correlation of 0.833 between awareness of long term insurance and demand for long term insurance. The correlation will be between -1.0 and +1.0. Scores close to 0.0 represent a weak relationship. Scores close to 1.0 or -1.0 represent a strong relationship. Significant correlations are flagged with asterisks. A significant correlation indicates a reliable relationship but not necessarily a strong correlation. Generally, a correlation coefficient of greater than 0.7 is considered strong. Correlations less than 0.3 are considered weak. Correlations between 0.3 and 0.7 are considered moderate (Cronk, 2008).

Based on this fact a correlation of +0.833 indicates a strong positive relationship between awareness and demand for long term insurance. The P value of 0.00 is less than 0.01 indicating a significant correlation between the variables. We can conclude that, as per the result from this study, 83.3% of the time, awareness is responsible for low demand of long term insurance. That means the higher awareness the more demand for long term insurance. But using the value of spearman’s rank correlation, we cannot infer that low awareness caused low demand, we can only talk how the two variables vary together. So, hypothesis 1, which says awareness affects demand for long term insurance in Ethiopia, is accepted. If the

p-value is less than 0.01 or 1%, it means that we have a 1% chance of being incorrect in rejecting the hypothesis.

This result is the same as results of other researchers like, (Ebitu, 2012), Wilson (2004), (Oworen, 1990), Gowon (2004). These studies, in different ways suggest that low consumption of long term insurance is due to low level of awareness and knowledge. They also indicated that the lack of sophistication or awareness and knowledge of insurance on the part of the consuming public has been identified as a major hindrance to insurance consumption. A thesis by Frankmuchiri (2009) also indicated that low awareness is one of the factors responsible for low penetration of long term insurance. With a lower level of awareness, insurance investment and consumption becomes a discouraging duty.

**2. Hypothesis 2- HA: Income of an individual affects demand for long term insurance in Ethiopia.**

**Table 4.11 Correlation table Income factor vs. demand for long term insurance**

		Demand for long term insurance	Income factor
Spearman's rho	Correlation Coefficient	1.000	.560**
	Sig. (2-tailed)	.	.000
	N	391	391
	Correlation Coefficient	.560**	1.000
	Sig. (2-tailed)	.000	.
	N	391	391

\*\* . Correlation is significant at the 0.01 level (2-tailed). Questionnaires Result 2016

The obtained Spearman rank-order correlation coefficient ( $\rho = 0.560$ ,  $p < .01$ ) indicates that there is a positive correlation between income and demand for long term insurance. But unlike the awareness, the relationship is not strong. In this case we can say that 56 percent of the time, low demand for long term insurance is due to lower income of the people. The strength of the correlation between income and demand for long term insurance is moderate as per this data. Therefore, the hypothesis that income does affect demand for long term insurance in Ethiopia is accepted. A p-value less than  $\alpha=0.01$  indicates that we have enough

statistical evidence to accept the hypothesis, and thereby, directly accept the alternative hypothesis.

This result is consistent with previous studies which mostly show that there is significant and positive relationship between level of income and demand for long term insurance, Duker (1969), Ferber and Lee (1980), Truett and Truett (1990), and Gandolfi and Miners (1996) have discussed on their materials how income affect consumption of long term insurance. Showers and Shotick (1994) used a Tobit analysis to analyze the effect of household characteristics on the demand for total long term insurance and indicated a positive relationship between income and expenditures on long term insurance. Çelik and Kayali (2009) also studied determinants of demand for long term insurance in European countries and have concluded that income per capita has positive and significant effect on demand for long term insurance. Zekarias (2000) also showed that income has a significant effect on attitude towards long term insurance purchase.

### 3. Hypothesis 3- HA: Christianity belief affects demand for long term assurance in Ethiopia

Table4.12: Spearman's rho correlation statistics for Christianity belief and demand for long term insurance.

		Demand for long term insurance	Christianity belief
Spearman's rho	Demand for long term insurance	1.000	.015
	Correlation Coefficient		.832
	Sig. (2-tailed)		1.000
	Christianity belief	.015	
	Correlation Coefficient	.832	
	Sig. (2-tailed)		

a. Listwise N = 202

Source: Questionnaires Result 2016

From this correlation table, we can see that the P-value for Christianity belief is higher than 0.05 and the correlation coefficient is 0.015. As per Robert Ho (2006), the values of the correlation coefficients vary between +1.00 and -1.00. Both of these extremes represent perfect relationships between the variables, and 0.00 represents the absence of a relationship. For the above data, the correlation coefficient 0.015 is approaching to zero. This indicates no



relationship between Christianity belief and demand for long term insurance is observed in Ethiopia. The P- value (.832) is higher than 0.05. Bhattacharjee (2012) pointed out that, if  $p > 0.05$ , then we do not have adequate statistical evidence either to accept the alternative hypothesis or reject the null hypothesis. That means the hypothesis that, Christianity belief does affect demand for long term assurance in Ethiopia, remain the same. This finding is consistent with other research findings. In his thesis result, Zekarias indicated that religion with the exception of Muslim proved not to have significant impact on demand for long term insurance in Ethiopia.

**4. Hypothesis 4- HA: Islamic belief affects demand for long term assurance in Ethiopia**

Table4.13: Spearman's rho correlation statistics for Islamic belief and demand for long term insurance.

Correlations <sup>a</sup>			Demand for long term insurance	Islamic belief
Spearman's rho	Demand for long term insurance	Correlation Coefficient	1.000	-.438**
		Sig. (2-tailed)	.	.000
	Islamic belief	Correlation Coefficient	-.438**	1.000
		Sig. (2-tailed)	.000	.

a. Listwise N = 136

\*\* Correlation is significant at the 0.01 level (2-tailed).

Source: Questionnaires Result 2016

Again with reference to this table, it can be seen that the correlation between Islamic belief and demand for long term insurance is negative and statistically significant ( $r = -.438$ ,  $P < 0.01$ ). This indicates that for Ethiopian Muslims, 43.8% of the time, the their belief is a reason for not buying long term insurance, but the relationship is not strong because there is a more, 56.2% chance of favoring long term insurance. Because according to Cronk (2008), generally, correlations greater than 0.7 are considered strong. Correlations less than 0.3 are considered weak and correlations between 0.3 and 0.7 are considered moderate. The P-value (0.00) is lower than 0.01 in this case. What we have to consider in this interpretation is that we cannot talk about the causality between Islamic belief and demand for long term

insurance. In other words, we cannot say that Islamic belief caused low demand for long term insurance (a 10% increase in Islamic belief decrease long term insurance demand by 43.8%). The significant relationship merely indicates that the two variables co-vary (Robert, 2006). Because a p-value less than  $\alpha=0.01$  indicates that we have enough statistical evidence to accept the hypothesis. Therefore, the hypothesis that Islamic belief affects demand for long term assurance in Ethiopia is accepted.

The interpretation to these data shows, other things steady, if an insurer works towards increasing awareness of long term insurance in Muslims for those who have the buying capacity, the probability of success will be 57%. Or in other words 43 Muslims, out of 100 reject long term insurance purchase on the basis of religious ground.

There are different research articles and journals having consistent result with this study. Zelizer (1979) notes that religion historically has provided a strong source of cultural opposition to long term insurance as many religious people believe that a reliance on long term insurance results from a distrust of God's protecting care. Wasaw and Hill (1986), Browne and Kim (1993), Ward and Zurbruegg (2002) test whether countries with strong Islamic background have reduced demand for long term insurance consumption.

Their result generally confirmed that consumers in Islamic nations purchase less long term insurance policies. Saaty and Ansari (2000), on their paper showed that people in Saudi Arabia consider that insurance in Saudi Arabia is against Sharia'h. Users of insurance in this country agree to the fact that this is one of the strongest resistant the Saudi Insurance industries facing.

**5. Hypothesis 5- H0: 'Other' beliefs affect demand for long term assurance in Ethiopia**

Table4.14: Spearman's rho correlation statistics for 'other' belief and demand for long term insurance.

Correlation's <sup>a</sup>		
	Demand for long term insurance	'other' belief
Spearman's rho	1.000	-.144

insurance	Sig. (2-tailed)	.	.305
	Correlation Coefficient	-.144	1.000
Other belief	Sig. (2-tailed)	.305	.

a. N = 53

Source: Questionnaires Result 2016

The last variable under religious belief is ‘any other’ religious groups. We also refer this table, where the p-value is 0.305 and  $r = -.144$ . Under this table, spearman’s correlation was calculated examining the relationship between ‘any other’ religious type and demand for long term insurance. A weak correlation that was not significant was found ( $r = -.144$ ,  $p > .05$ ). It indicates that ‘Any other’ religion has no relation to demand for long term insurance. Like the result under Christianity belief, there is no significant relationship between ‘any other’ type of religion and demand for long term insurance. Therefore, the hypothesis, ‘other beliefs’ do affect demand for long term insurance, remain the same. In other ways, for an insurer, the probability of facing a challenge on religious ground is very low or nil if the target customers are non-Muslims.

From the analysis it can be said that both Muslims and Christians have a relationship in awareness level but regarding income factor Muslims are more affected by income factors than Christians. Or, the low demand for long term insurance is attributed to insufficient income, and religious reason against long term insurance, for Muslims than Christians. Moreover when we compare both religious factors and income factors for Muslims, the religious factor is higher. That means the higher the score the higher the probability of a belief affecting demand for long term insurance.

## **CHAPTER FIVE**

### **SUMMARY OF MAJOR FINDINGS, CONCLUSION**

#### **AND RECOMMENDATION**

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##### **5.1. SUMMARY OF MAJOR FINDINGS**

This assessment was conducted in order to provide sufficient answer to the research question; “to what extent awareness, income, and religious belief of the public affect demand for long term insurance in Ethiopia?” The relationship between religious groups on each of the three factors was also assessed. The extent of the effect of each factor was analyzed using inferential statistics methods.

The finding proves that there is a strong positive correlation between awareness and long term insurance demand in Ethiopia. The correlation between income and long term insurance demand was found to be negative but with moderate strength. Two different results were obtained regarding the effect of religion on long term insurance demand as it was explained in the analysis part. No correlation found between Christianity & ‘Other’ beliefs in relation to demand for long term insurance. However, negative correlation between Islamic belief and demand for long term insurance was found.

##### **5.2. CONCLUSION**

Based on the findings of this study, it can be concluded that, awareness, income, and religious beliefs have affected the demand for long term insurance in Ethiopia. However, the extent of effect for the three factors was found different. While the correlation between demands for long term insurance was found positive and strong, the correlation between income factor and demand for long term insurance was negative and has moderate strength. Different results were found between religious belief and demand for long term insurance. While no relationship between religious belief and demand for long term insurance found for Christians and ‘others’, a negative but moderate correlation between Islamic belief and demand for long term insurance was found.

Even though religion is very dominant in the country, its power to influence the purchase of long term insurance is found very low in case of non Muslims. This is an opportunity that should be taken with granted by the industry. A negative moderate correlation between Islamic belief and demand for long term insurance was found using spearman's correlation. As per the result from Spearman's correlation between income factor and demand for long term insurance, the correlation found not to be strong. Income reason for not buying long term insurance is not a significant factor. However, awareness was found to be strongly correlated with the demand for long term insurance. Insurance companies can exert their effort in increasing awareness and benefit from the expected benefits as a result of this assessment.

### **5.3. RECOMMENDATION**

Subsequent to the findings and conclusions, the following recommendations were forwarded in order to include and give emphasize in developing the long term insurance business in Ethiopia. Insurance companies can focus their strategies on the factors identified and enhance the demand for long term insurance.

The results of this assessment suggest some major implications of long term insurances business in Ethiopia. Even though religious belief and income factor found to correlate moderately with long term insurance demand, as discussed above, awareness was found to be highly positively correlated with. This is an indication of insufficient communication from the insurance industry for its contribution for lack of understanding of its benefit to society. Lack of understanding of long term insurance is associated with misunderstanding the service. One of the indications of the misunderstanding of the value and benefit of long term insurance is the association of long term insurance against religious belief.

However, long term insurance does not assure any one against death; it assures from the financial consequence of either dying too soon or living too long. Some of us die young, before we have time to raise our children and do the other thing we plan. Some of us live too long in the sense that we outlive our physical, mental, or financial resource. Healthy

individuals do not look forward to death; it is a subject we all tend to avoid. But it is a universal experience. It is one of the few certainties faced by all humans. Rational minds plan to deal with such certainties. Only Ostriches hide their heads in the sand in the hope that somehow death will pass. Long term insurance is a rational and objective way of planning for the certainty of death, and it is not until we can face the certainty of our own death that we can fully understand the need for long term insurance.

Even though this assessment did not look in to the dogma of each religion to examine its relationship to long term insurance consumption, long term insurance should be seen as a tool of financial protection of the loved ones and the dependents. Relating religious belief to long term insurance is a matter of misunderstanding its role and benefit. It is clear that some religions have a principle prohibiting profit from saving interest. However, buying long term insurance is a matter of protection and saving and not earning extra income from it.

What is needed from long term insurance companies is teaching people and creating awareness of the role and benefit of long term insurance. In addition to this, the cost of long term insurance service should also consider the purchasing power of the person.

An important investment in publicity may result in increased awareness and improved perception. The researcher believes that publicity of the services in order to create awareness is not enough to make business from the long term insurance service. Because it needs further, to convince them by showing that it is not against religious beliefs, it is a method of securing the financial capacity of the dependents or their legal heirs.

Finally, the researcher believes that the result of this assessment contributes to the growth of long term insurance business in relation to the economic development of the country at large through provision of valuable information to the society and future interested researchers in the area as well as decision makers in the insurance industry stressing the factors actually affecting the demand for long term insurance in the future.

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## Appendix I: Financial Information of Insurance business

In '000 Birr

Year	2008	2009	2010	2011	2012	2013	2014	2015
<b>Gross Premium</b>								
<b>1. General Insurance</b>	971,513	1,187,030	1,379,321	1,824,893	2,422,415	3,724,760	4,497,666	4,687,657
<b>2. Long Term Insurance</b>	61,697	74,112	99,993	114,739	160,596	271,523	299,514	273,871
<b>Ratio GI to LTI in %</b>	6.35	6.24	7.25	6.29	6.63	7.29	6.66	5.84

Source: compiled from reports by National Bank of Ethiopia

## Appendix II: Insurance companies currently selling Long term insurance policies

No	Name of insurance company	Web site	Insurance business	
			Long Term Insurance	General Insurance
1	Abay insurance	www.abayinsurance.et	No	Yes
2	Africa Insurance	www.africainsurance.com	Yes	Yes
3	Awash Insurance Company	www.awashinsurance.com	Yes	Yes
4	Berhan insurance	www.berhaninsurance.com	No	Yes
5	Bunna Insurance	www.bunnainsurance.com	No	Yes
6	Ethio-Life and General Insurance S.C	www.ethiolifeandgeneralinsurance.com	Yes	Yes
7	EIC	www.eic.com	Yes	Yes
8	Global Insurance Company	www.globalinsurancesc.com	No	Yes
9	Lion Insurance	www.anbessainsurance.com	No	Yes
10	Lucy Insurance		No	Yes
11	NIB Insurance Company	www.nibinsurance.com	Yes	Yes
12	Nile Insurance Company	www.nileinsurancesc.com	Yes	Yes
13	Nyala Insurance Company	www.nyalainsurance.com	Yes	Yes
14	National-Insurance Company of Ethiopia	www.niceinsurance-et.com	No	Yes
15	Oromia Insurance Company	www.oromiainsurancecompany.com.et	Yes	Yes
16	Tsehay Insurance	www.tsehayinsurance.com	No	Yes
17	United Insurance S.C	www.unitedinsurancesc.com	Yes	Yes

### Appendix III: formula for sample size determination when the population is universe.

$$n = \frac{z^2 \sigma^2}{e^2}$$

$z$  = the value of the standard variation at a given confidence level (to be read from the table giving the areas under normal curve as shown in appendix) and it is 1.96 for a 95% confidence level;  
 $n$  = size of the sample  
 $e$  = error term

(Source: KOTHARI C.R.2004. Research methodology: methods and techniques, New age international. 2<sup>nd</sup> ed. P.175)

The minimum sample size according to this formula should be 384.

### Appendix IV: Population for the survey

Age structure	% of population	Population
15-24	19.9	19,230,058
25-54	29.20	28,216,969
55-64	3.9	3,768,704
Over 64	2.8	2,705,736
<b>Total</b>		51,215,732.74

Source: World fact book December 2014.

**APPENDIX V: Sample size determination table**

Sample Size for $\pm 3\%$ , $\pm 5\%$ , $\pm 7\%$ , and $\pm 10\%$ Precision Levels where Confidence Level Is 95% and $P=.5$ .				
Size of Population	Sample Size (n) for Precision (e) of:			
	$\pm 3\%$	$\pm 5\%$	$\pm 7\%$	$\pm 10\%$
500	a	222	145	83
600	a	240	152	86
700	a	255	158	88
800	a	267	163	89
900	a	277	166	90
1000	a	286	169	91
2000	714	333	185	95
3000	811	353	191	97
4000	870	364	194	98
5000	909	370	196	98
6000	938	375	197	98
7000	959	378	198	99
8000	976	381	199	99
9000	989	383	200	99
10,000	1,000	385	201	99
15,000	1,034	390	204	99
20,000	1,053	392	204	100
25,000	1,064	394	204	100
50,000	1,087	397	204	100
100,000	1,099	398	204	100
>100,000	1,111	400	204	100

a = Assumption of normal population is poor. The entire population should be sampled. (Yamane, 1967)



**ST. MARY'S UNIVERSITY SCHOOL OF GRADUATE STUDIES**

**Department of General Management (MBA)**

*A questionnaire for collection of data on assessment of factors affecting long term insurance*

*Demand in Ethiopia*

*Dear respondent, this questionnaire is designed to gather data on factors affecting for long term insurance demand in Ethiopia. You are selected to fill this questionnaire assuming that you do not have long term insurance policy at all. The information you provide is used for academic purpose and an input for the survey result only. Your esteemed co-operation in this regard is highly appreciated.*

*Please put the sign in the boxes you select for your appropriate response,*



- 1. Gender      1. Male                       2. Female
- 2. Age            1. 18-28                       2. 29-40                       3. 41-54                       4. 55-65
- 3. Marital status    1. Single     2. Married and have no children     3. Married and have children   
4 - Divorced
- 4. Education        1. Below Grade 10                       2. Grade 10 up to 12+                       3. Diploma   
4 Degree                       5- Masters and above
- 5. Employment status    1. Business owner     2. Employee     3. Any other
- 6. Your monthly average disposable income  
1. Less than Birr 4000                       2. 4000 – 7000                       3. 7001 – 10,000   
4. 10,001—15,000                       5. Above 15,000
- 7. Religion type    1. Christian.....    2. Muslim .....    3. Any other.....
- 8. The following questions seek your view to measure your **awareness level** of long term insurance (**highest point 5 indicates the highest awareness level**).

Role, benefit , the provider, price, and availability, of long term insurance	1	2	3	4	5
	Strongly disagree	disagree	Indifferent	agree	Strongly agree
I understand the protection benefit of long term assurance					
I know the benefit of having long term assurance					
I know the saving benefit of long term insurance					
I know that Long term assurance provides financial security to the family, when the income earner dies					
I know the availability of long term insurance in Ethiopia					
I know how much to pay to buy long term insurance					
I know where to buy long term insurance or companies selling long term insurance					
I know why people make a decision to buy long term					

9. Please indicate your view on the following statements regarding your income against your demand for long term insurance.

Reasons associated to income	1	2	3	4	5
	Strongly disagree	disagree	Indifferent	agree	Strongly agree
My current income cannot cover the cost of long term insurance/I cannot afford it					
Cost-of-living expenses are keeping me from buying long term insurance.					
I will most probably buy long term insurance if my income is increased					
I am willing to buy long term insurance if the price is within my purchasing power					

10. Please indicate your view on the following statements regarding religion and long term insurance.

Religious reasons against insurance	1	2	3	4	5
	Strongly disagree	disagree	Indifferent	agree	Strongly agree
There is a principle on my religion forbidding buying long term insurance policy					
Purchasing long term assurance policy means abuse of God's protective ability					
My religion encourages to use other methods of risk management rather than buying long term insurance					

11. The following questions are intended to measure your overall demand for long term insurance.

Questions	1	2	3	4	5
	Strongly disagree	disagree	Indifferent	agree	Strongly agree
My dependents prefer long term insurance for financial security					
I have the desire to grant funds to my dependents and provide income for my retirement					
I have positive attitude towards purchasing long term insurance					

12. Do you have any additional comment about long term insurance that becomes an input for this assessment?

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*Thank you for your precious time!!!*

## Appendix I: Financial Information of Insurance business

In '000 Birr

Year	2009	2010	2011	2012	2013	2014	2015	2016
<b>Gross Premium</b>								
<b>1. General Insurance</b>	1,187,030	1,379,321	1,824,893	2,422,415	3,724,760	4,497,666	4,687,657	6,426,685
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4	Berhan insurance	www.berhaninsurance.com	No	Yes
5	Bunna Insurance	www.bunnainsurance.com	No	Yes
6	Ethio-Life & General Insurance S.C	www.ethiolifeandgeneralinsurance.com	Yes	Yes
7	EIC	www.eic.com	Yes	Yes
8	Global Insurance Company	www.globalinsurancesc.com	No	Yes
9	Lion Insurance	www.anbessainsurance.com	No	Yes
10	Lucy Insurance		No	Yes
11	NIB Insurance Company	www.nibinsurance.com	Yes	Yes
12	Nile Insurance Company	www.nileinsurancesc.com	Yes	Yes
13	Nyala Insurance Company	www.nyalainsurance.com	Yes	Yes
14	National-Insurance Company of Ethiopia	www.niceinsurance-et.com	No	Yes
15	Oromia Insurance Company	www.oromiainsurancecompany.com.et	Yes	Yes
16	Tsehay Insurance	www.tsehayinsurance.com	No	Yes
17	United Insurance S.C	www.unitedinsurancesc.com	Yes	Yes



**Appendix III: formula for sample size determination when the population is universe.**

$$n = \frac{z^2 \sigma^2}{e^2}$$

$z$  = the value of the standard variation at a given confidence level (to be read from the table giving the areas under normal curve as shown in appendix) and it is 1.96 for a 95% confidence level;  
 $n$  = size of the sample  
 $e$  = error term

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The minimum sample size according to this formula should be 384.

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2000	714	333	185	95
3000	811	353	191	97
4000	870	364	194	98
5000	909	370	196	98
6000	938	375	197	98
7000	959	378	198	99
8000	976	381	199	99
9000	989	383	200	99
10,000	1,000	385	201	99
15,000	1,034	390	204	99
20,000	1,053	392	204	100
25,000	1,064	394	204	100
50,000	1,087	397	204	100
100,000	1,099	398	204	100
>100,000	1,111	400	204	100