



**FACTORS AFFECTING STUDENTS' ATTITUDE TOWARDS
ENTREPRENEURSHIP: THE CASE OF ADDIS ABABA
SCIENCE AND TECHNOLOGY UNIVERSITY GRADUATING
STUDENTS**

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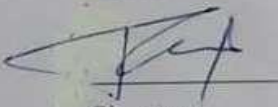
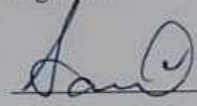
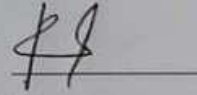
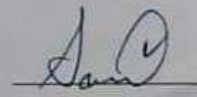
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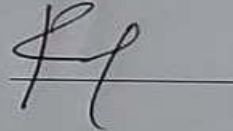
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Abstract

The objective of this study was to examine factors affecting graduating students' attitude towards entrepreneurship: the case of Addis Ababa Science and Technology University undergraduate and postgraduate students. The primary challenge of higher education students is securing a job after graduation. Furthermore, there is no established mindset among the students as to how to go about translating their academic gains into innovations that can be commercialized. The study employed explanatory research design supported with deductive/quantitative approach data was collected with questionnaire and structured interview from graduating class students and university officers. The Taro Yamane (1967) formula sample size determination method was used to determine the sample size and the sample size was 328. The collected data was analyzed using inferential analysis techniques: regression and correlation. The correlation analysis result reported there is strong association among the study variables. From the simple linear regression result, it was found that family background explained 77.9% of the variation in students' entrepreneurial attitude. The simultaneous multiple regression result reported that 83.6% of the variation in students' entrepreneurial attitude is explained by the proposed model. Based on these major findings the researcher recommends that family of the students should financially support and morally encourage youth children to enhance their entrepreneurial attitude. The researcher further notes that entrepreneurial government support programs' should be reachable to the needy young.

Keywords: Entrepreneurial attitude, Family background, Role model, Government support, Business ecosystem, University wide support, Graduating students and Addis Ababa Science and Technology University.

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Acronyms

AASTU	Addis Ababa Science and Technology University
CAS	College of Applied Science
CACE	College of Architecture and Civil Engineering
CBCE	College of Biological and Chemical Engineering
CEME	College of Electrical and Mechanical Engineering
FDRE	Federal Democratic Republic of Ethiopia
KIU	Kigali Independent University
MoE	Margin of Error
NEPSE	National Employment Policy and Strategy of Ethiopia
NGO	Non-Governmental Organizations
OECD	Organization for Economic Co-operation and Development
SME	Small to Medium Enterprises
TVET	Technical and Vocational Education and Training
UN	United Nation

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CHAPTER ONE

INTRODUCTION

This study is about the factors affecting students' attitudes towards entrepreneurship. The chapter includes the background of the study, statement of the problem, research questions, objective of the study, scope of the study, significance of the study, limitation of the study, organization of the study, operational definition of terms, background of the organization and it explains the basic ideas about entrepreneurship and attitude it takes from different related kinds of literature review.

Entrepreneurship is one of the most important drivers of job creation and economic growth, and is crucial for the development of a vibrant formal small and medium-sized (SME) business sector. It enhances productivity growth and can also help to find practical business solutions to social and environmental challenges, including climate change. Despite its importance, entrepreneurship is not always actively encouraged in all developing countries through dedicated policy initiatives. Both economic theory and practice demonstrate that entrepreneurship may generate social gains beyond private gains. A proactive role of governments in supporting entrepreneurship is, therefore, justified and it requires a systemic approach (UN, 2012).

1.1. Background of the study

The study focuses on the basic concepts of entrepreneurship and also concentrates on the students' family background, role models, government entrepreneurial supporting programs, business ecosystem, university-wide entrepreneurial support and entrepreneurial attitude and identifying which the study variables are mainly influencing the student's entrepreneurial attitude towards entrepreneurship and evaluate each finding and compare the findings with other researchers' findings.

Entrepreneur' for the first time to mean a person who bears uncertainty and risk, an agent who buys factors of production at certain prices to combine them into a product to sell it at an uncertain price in future, an entrepreneur is the one who always searches for change, responds to it and exploits it as an opportunity and entrepreneur makes a decision about obtaining and using resources while assuming the risk of the enterprise (Anurag;

Ghaziabad and Sanjeev, 2016). For generating economic growth and moving towards the entrepreneurial society it is imperative, in the opinion of economic theorists, to have a development of entrepreneurship capital, which reflects some different legal, institutional and social factors and forces, and involves also a social acceptance of entrepreneurial behavior (Audretsch, 2007). An entrepreneurial initiative of individuals is an important factor of economic growth to raise enterprising people (among students and graduates) by educational system. According to Kolbre *et al.*, (2005) there was potential experience at Tallinn University of Technology to increase entrepreneurial initiative for graduates.

However, the research showed that the students knew to start a business, but not so much motivation for starting a business. This result referred to a need to study more profoundly students' attitudes and intentions to start a business, their personality traits and contextual factors of the business environment, including the role of the university in supporting students' entrepreneurial attitudes and intentions. Fostering entrepreneurship among students has become an important topic in universities and governments' as well as in research. As some studies show, student interest in entrepreneurship as a career choice is growing while interest in professional employment in businesses is declining (Kolvereid *et al.*, 2015). An entrepreneur has been defined as an innovator, entrepreneurial person (person of initiative), an organizer and a bearer of risk and entrepreneur as a person who has a great imagination, flexibility, creativeness, and innovativeness; a person who is ready for conceptual thinking, who sees a change as an opportunity for business (Schumpeter, 2013).

Many authors today have challenged the previous understanding that entrepreneurship is a privilege only for a small group of selected people with specific personal characteristics. For this, entrepreneurship in a so-called early-stage (i.e. in a start-up phase) as a competency in a wider sense (Hougaard, 2005). Such an entrepreneurship concept is based on the viewpoint that to find business opportunities one needs creativity, the ability to see and understand problems and find unanticipated (unexpected) solutions. Today it is increasingly supported that entrepreneurship can be learned and that coincidence of circumstances largely determines who starts a new venture. Other studies have emphasized the need for entrepreneurial attitude and intention as factors determining entrepreneurial behavior (Fayolle and Gailly, 2005; Ajzen, 1991). These

factors can be considerably influenced by entrepreneurship education (Fayolle *et al.*, 2005; Hannan *et al.*, 2004). Thus, for increasing the level of entrepreneurial initiative among students it is needful to increase positive attitudes towards entrepreneurship, so attitudes can be viewed as the stepping stone to entrepreneurial intentions (Hannan, 2004).

Lee and Xin (2015), Chen, (2014), Erken *et al.* (2014), Vazquez *et al.* (2010) and Audrestch (2007) are among those who found that entrepreneurship is an important factor for economic growth, while Kardos (2012), Stefanescu and On (2012) and Talmaciu (2012) found correlations between entrepreneurship activities and economic development. Decker *et al.* (2014) and Haltiwanger *et al.*, 2013) are among the various researchers who found that entrepreneurship creates jobs in an economy. It is this type of study findings that stretch back several decades that have put entrepreneurship in the spotlight amongst scholars and practitioners. The perceived importance of entrepreneurship makes it an area of interest to academics for study and development of education, and to politicians for the development of strategies for economic development and poverty eradication in the case of developing countries. However, the concept of entrepreneurship lacks a commonly agreed definition (Henrekson and Sanandaji, 2014) despite the fact that almost all researchers and writers trace its origins to the same economic theorists.

1.2. Background of the organization

Addis Ababa Science and Technology University was established in 2011 under the Directive of the Council of Ministers No. 216/2011. However, on August 18, 2014, the university was once again re-established under regulation No.314/2014 by the Council of Ministers of FDRE. Initially, as a public university, AASTU was responsible to the Ministry of Education. However, due to the deeply rooted commitment of the FDRE government, AASTU's responsibility shifted from the Ministry of Education to the Ministry of Science and Technology since June 2014.

Geographically, the university is well situated in the Akaki-Kality-Dukem industrial zones in the South Eastern outskirts of Addis Ababa. This strategic location was selected because of its special mission to serve Ethiopia's industrial sector. Accordingly, AASTU

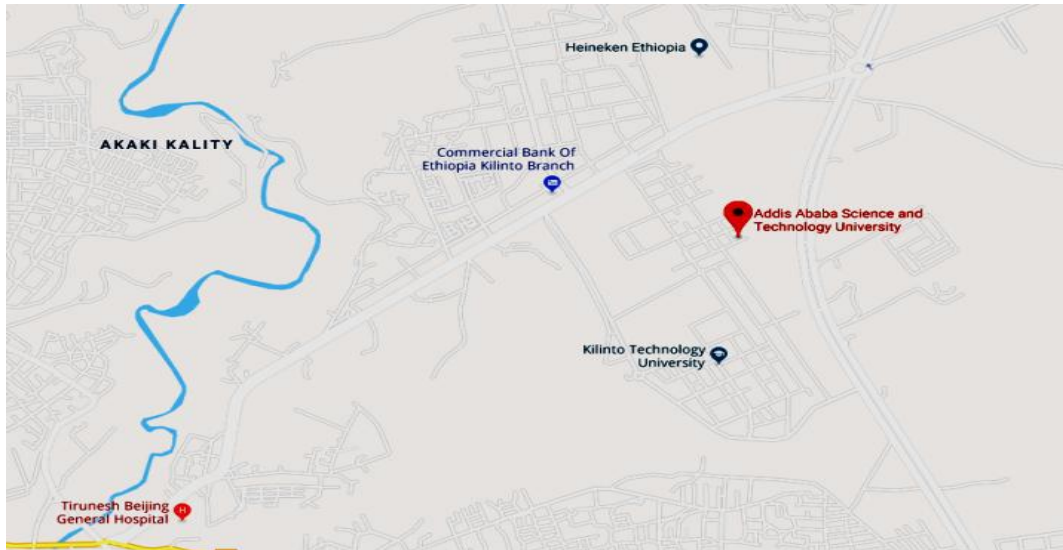
is guided by its motto "University for Industry" and its establishment is an integral part of the ongoing economic structural transformation. AASTU seeks to play a pivotal role in the industrialization of Ethiopia. Since its inception, AASTU has laid its foundation based on the lesson that it took from the seven decades experience of Ethiopian higher education trends to open a new path in the nation's higher education institution's history. Also, the university has drawn the best practices from well recognized international universities. This, of course, enabled the university to obtain a unique structure, commitment and initiative compared to previously established Ethiopian universities and colleges.

AASTU is a unique university in many ways. First, its uniqueness emanates from its vision and determination to become a powerhouse of science and technology in Africa; Second, its uniqueness emanates from its mission to be a lead player in the science and technology advancement of the nation through graduating well-trained and qualified students; Third, its uniqueness emanates from its engagement in a demand-driven and problem-solving researches that can change the lives of millions of poor people in the country.

AASTU is a university in the making as well as transformation, where many of its activities are geared towards establishing academic infrastructures, facilities, and manpower development. Program expansion in selected national priority areas, research, and technology transfer and more importantly, establishing centers of excellence are given due emphasis. Collaboration with industries, strengthening links with international universities and institutes for student and staff exchange are additional areas that AASTU is working with its local and international partners.

AASTU aims at conducting demand-driven research in science and technology to address the challenging issues in the country's development plan. The outputs from the researches are to bring academic excellence and with an entrepreneurial spirit to transfer into the commercial domain, thus strengthening the links between the university-industry and the local community, as well as benefiting the wider society (AASTU,2017).

Figure 1. 1 Addis Ababa Science and Technology University Map



1.3. Statement of the Problem

The Ethiopian youth unemployment was aged between 15-24. According to World Bank definition, youth unemployment refers to the share of the labor force without work but available for and seeking employment. The definition of the labor force and unemployment differ by country. Most, however, agree that entrepreneurship is vital for stimulating economic growth and employment opportunities in all societies (The World Bank provides data for Ethiopian from 1991 to 2012). The youth-focused employment mainstreaming strategies identified include the following: Improving the quality of education and technical and vocational education and Training (TVETs); further enhance the implementation of the on-going youth package in a more structured manner; supporting the creation of quality jobs in the formal and informal sectors; fostering entrepreneurship and empowerment of youth, facilitating youth entry into business and promoting additional youth employment intensive and, initiatives that enhance youth mobility and employment (NEPSE, 2009). This particularly true in the development of the world, where successful small businesses are the primary engine of job creation and poverty reduction.

Therefore, it can be said entrepreneurial thinking can significantly affect the development of an economy. Entrepreneurial know-how is essential to a contemporary and future professional from a society, public and private organization or individual's point of view. Due to the above reasons, the subject of entrepreneurship continues to attract interest

from both academicians and policymakers to the magnitude that many universities and colleges now include entrepreneurship studies as part of their graduate and undergraduate curricula. Similarly, empirical research studies exploring the magnitude to which entrepreneurial education influences the decision to become an entrepreneur are steadily increasing.

The primary challenge for graduates in securing a job is no established mindset how to go about translating their academic gains into innovations that can be commercialized. On one hand, no adequate job posts are being created in the market place and also, students are not oriented to be entrepreneurially minded to create their jobs (Beshir, 2014; Daniel, 2016 and Nigusse, 2018). These challenges are the causing problems that initiated this research thesis. To the best of my knowledge, no similar study has been done so far in the Addis Ababa Science and Technology University (AASTU). In this study therefore awareness and understanding of the attitude of undergraduate and postgraduate students towards entrepreneurship and motivating and affecting factors in starting their own business than only looking for a job opportunity. This later aimed to minimize the unemployment rate. Specifically, this research was designed to assess factors affecting students' entrepreneurial attitudes towards entrepreneurship.

1.4. Research Questions

This research tried to address the following basic research questions:

1. What is the level of association that exists between students' entrepreneurial attitude and affecting factors?
2. What is the magnitude of percentage explained in students' entrepreneurial attitude by family back ground?
3. What is the magnitude of percentage explained in students' entrepreneurial attitude by role model?
4. What is the magnitude of percentage explained in students' entrepreneurial attitude by entrepreneurial supporting program?
5. What is the magnitude of percentage explained in students' entrepreneurial attitude by business ecosystem?
6. What is the magnitude of percentage explained in students' entrepreneurial attitude by university wide entrepreneurial support?

1.5. Objectives of the Study

1.5.1. General objectives

The objective of the research is to identify and evaluate factors that affect students' attitudes towards entrepreneurship.

1.5.2. Specific objectives of the study

1. To investigate the level of association that exists between students' entrepreneurial attitude and affecting factors.
2. To examine the magnitude of percentage explained in students' entrepreneurial attitude by family back ground.
3. To analysis the magnitude of percentage explained in students' entrepreneurial attitude by role model.
4. To find out the magnitude of percentage explained in students' entrepreneurial attitude by government supporting program.
5. To examine the magnitude of percentage explained in students' entrepreneurial attitude by business ecosystem.
6. To analyze the magnitude of percentage explained in students' entrepreneurial attitude by university wide entrepreneurial support.

1.6. Scope of the Study

The study was confined to AASTU. The data were collected from 4th and 5th year undergraduate and postgraduate students from the College of Biological and Chemical Engineering, College of Architecture and Civil Engineering, College of Electrical and Mechanical Engineering, and College of Applied Science. The sample was taken randomly selected 4th and 5th years of 2020 undergraduate and postgraduate students in all departments from those colleges.

1.7. Significance of the Study

The study is to examine factors affecting students' attitude towards entrepreneurship. The university serves to help students by identifying their weaknesses in their creativeness needs better than current support. This allows students to identify and address barriers to practice in their efforts to increase their creativity and helps to revise curriculum approach came into practical support to entrepreneurship. The findings of this study also can help policy makers to use as a base to make decisions in addition the study helps future researcher to use as references to conduct further study.

1.8. Limitation of the study

The limitation of this study is that confined only to Addis Ababa Science and Technology University 2020 graduating students, this data did not represent other students in AASTU and students enrolled in other universities of the country.

1.9. Organization of the study

The study was being organized into five chapters. The first chapter was deal with introductory parts consisting, statements of the problem, research questions, objectives, scope, and significance of the study. The second chapter reviews kinds of literature related to the study. In this second chapter, various theoretical concepts that relate to graduate entrepreneurship and entrepreneurship were dealing. Research method, design, data collection methods, population and sampling techniques and methods of data analysis were addressed in the third chapter. Analysis of collected data, interpretation of the analyzed data, and summaries of the major findings were also being presented in the fourth chapter. Finally, the fifth chapter was to present a summary, conclusions, and recommendations.

CHAPTER TWO

2. REVIEW OF THE RELATED LITERATURE

This chapter focuses on the details of various related literature reviews, theoretical review, histories of entrepreneurship, empirical review and studies to my topic, the concept of entrepreneurship and factors that affect students' attitude towards entrepreneurship are included.

2.1. Theoretical Review

Entrepreneurship is defined differently by different scholars. According to Hisrich *et al.*, (2005), "In almost all of the definitions of entrepreneurship, there is an agreement that is talking about a kind of behavior that includes: (1) initiative-taking, (2) the organizing and reorganizing of social and economic mechanisms to turn resources and situations to practical account, (3) the acceptance of risk or failure." They also mentioned that: "To an economist, an entrepreneur is one who brings resources, labor, materials, and other assets into combinations that make their value greater than before, and also one who introduces changes, innovations, and a new order. To a psychologist, such a person is typically driven by certain forces the need to obtain or attain something, to experiment, to accomplish, or perhaps to escape the authority of others. To one businessman, an entrepreneur appears as a threat, an aggressive competitor, whereas to another businessman the same entrepreneur may be an ally, a source of supply, a customer, or someone who creates wealth for others, as well as finds better ways to utilize resources, reduce waste, and produce jobs others are willing to get. Entrepreneurship is the dynamic process of creating incremental wealth. The wealth is created by individuals who assume the major risks in terms of equity, time, and/or career commitment or provide value for some product or service. The product or service may or may not be new or unique, but the value must somehow be infused by the entrepreneur by receiving and locating the necessary skills and resources."

Jones (2012) also defined an entrepreneur as "a person who conceives or receives ideas and turns them into business realities". Gutter man (2012) by borrowing the idea of Joseph Schumpeter (1883–1950), one of the most well-known theorists on entrepreneurship defined an entrepreneur as one who reorganizes economic activity in an

innovative and valuable way. That is, an entrepreneur is one who engages in a new economic activity that was previously unknown and he is also a risk-taker because being innovative means there are few rules or history for guidance. Plehn-Dujowich (2011) has presented different entrepreneurship theories, which explain the intrinsic characteristics of entrepreneurs, using the entrepreneurship model of different scholars as follows: “individuals are heterogeneous in their risk preferences and choose between two occupations: entrepreneur or wage worker. In equilibrium, less risk-averse individuals become entrepreneurs. For Lazear (2005), individuals are endowed with two skills and choose between two occupations: a specialist that earns an income proportional to his maximum skill or an entrepreneur that earns an income proportional to his minimum skill. In equilibrium, individuals that do not excel in any one skill but are competent in both ("jack-of-all-trades") become entrepreneurs. For Evans and Jovanovich (1989), individuals are heterogeneous in their entrepreneurial ability and initial wealth, and choose between two occupations: entrepreneur or wage worker. In equilibrium, wealthy high-ability individuals become entrepreneurs. For Jovanovich (1994), as it is cited in Plehn-Dujowich (2011) individuals are heterogeneous in their managerial and labor skills, and choose between two occupations: a manager whose output depends on managerial skill, or a wage worker whose income depends on labor skill. In equilibrium, the sorting of individuals across occupations depends on the correlation between managerial and labor skills. For Lucas (1978), individuals are heterogeneous in their managerial ability and choose between two occupations, manager or wage worker (employed by a manager). In equilibrium, high-ability individuals become managers; and higher ability individuals operate firms with a larger workforce”.

Development of attitudes has interested several academics. Despite how attitude is defined, it is more than collecting ideas about something. Attitude is tendency to respond in certain way or give assessments either positive or negative. Attitude is general and relatively stable assessment of a situation or phenomenon that involves beliefs, feelings and behavior. Attitudes are defined as the predisposition to respond in a generally favorable or unfavorable manner with respect to the object of the attitude. In general, attitude is defined as the degree to which a person evaluates something positively or negatively. Employees’ attitudes are considered to be indicative of the future success of

an organization. Beliefs shape attitudes towards entrepreneurship, subjective norms and perceived behavior control. Beliefs related to perceived high entrepreneurial motivation on a country-wide level may promote individuals' attitude towards entrepreneurship. It works in bidirectional: if a person believes that the result/impact of his/her entrepreneurship activity will be desirable in existing conditions, he/she is likely to have a positive attitude towards entrepreneurship and if a person perceives doing business in existing conditions as being difficult or with negative image his/her attitude towards entrepreneurship might be negative also. Several studies have explored the importance of attitudes toward entrepreneurship (like achievement, autonomy, money, change, and competitiveness upon entrepreneurial conviction) while setting up a company and staying in business (Merike and Mervi, 2013).

2.1.1. The Concept of Entrepreneurship

Entrepreneurship is often viewed as a function, which involves the exploitation of opportunities, which exist within a market. Such exploitation is most commonly associated with the direction and/or combination of productive inputs. Entrepreneurs usually are considered to bear risk while pursuing opportunities, and often are associated with creative and innovative actions. Also, entrepreneurs undertake a managerial role in their activities, but routine management of an ongoing operation is not considered to be entrepreneurship. An individual may perform an entrepreneurial function in creating an organization, but later is relegated to the role of managing it without performing an entrepreneurial role. In this sense, many small-business owners would not be considered to be entrepreneurs. Various authors have used several terms and concepts to define entrepreneurship; creativity, innovation, creative destruction, risk-taking, creation of new products, new business methods, creations of new organizations, and enterprises among others, all showing its richness in meaning, application and manifests. Entrepreneurship can either be opportunity-based or necessity-based but whatever the motivation; it is pursued as a viable career option (Samuel, 2012).

2.1.2. Histories of Entrepreneurship

The beginnings of entrepreneurship and trade, believe it or not, the first entrepreneurs can be found back to nearly 20,000 years ago. The first known trading between humans took place in New Guinea around 17,000 BCE, where locals would exchange obsidian (a

volcanic glass prized for its use in hunting tools) for other needed goods like tools, skins, and food. This early type of entrepreneurship continued for millennia. Hunter-gatherer tribes would trade goods from different parts of their respective regions to provide an overall benefit for their society (<https://bebusinessed.com/history/history-of-entrepreneurship>).

2.1.2.1. Entrepreneurship and the Agricultural Revolution

The first big shift entrepreneurship took place during the agricultural revolution which occurred about 12,000 years ago. You probably already know the story about the agricultural revolution, but here's a brief refresher: Humans started to domesticate plants and animals. Instead of having to roam, search, and hunt for their food in different regions throughout the year, human populations could remain stationary in one location and farm the land. This was the fundamental shift in human history, villages and towns started developing close to fertile lands. There was no longer a need for everyone in the community to directly involve with food production. People didn't need to spend all day hunting and gathering for their own sustenance it was more efficient to let a smaller number of farmers handle food production while the rest of the population focused on other tasks (Murray Hunter, 2013).

By specializing in different professions, members of the community could trade valuable goods for food. These were the earliest entrepreneurs in human civilization. Some common areas of specialization included: Hunting and gathering, fishing cooking, tool making, shelter building, and clothes making. Farmers could grow more food than they needed to support their own families. Thus, they would sell food at the market to say, a clothes-market. The farmers' families no longer needed to make their own clothes. They could rely on the specialized services within a community to provide for them. Over time, these specialists became better and better at their unique areas of specialization. Tricks of the trade would be passed down through families. The space of innovation sped up. Towns and cities grow to include thousands of people. Dependable sources of food encouraged people to build permanent settlements and homes. Different social institutions arose around these permanent structures, including, religious centers, counts, and marketplaces. This provided new business opportunities for entrepreneurs to explore. As time went on, areas of specialization began to emerge. Early entrepreneurs would

work areas like: pottery, carpentry, wool-making, and masonry. Standards of living continued to increase. Entrepreneurs were constantly at the forefront of innovation. If problems needed to be solved, these early entrepreneurs recognized that they could profit by solving that problem (Murray Hunter, 2013).

2.1.2.2. Entrepreneurship and the Innovation of Money

One of the key developments in the history of entrepreneurship (and in human history) was the invention of money. Prior to the invention of money, all entrepreneurship and trade took place through a barter system (Murray Hunter, 2013).

2.1.2.3. Entrepreneurship and the Beginning of the Marketplace in the medieval period

Starting in the medieval period, markets became more and more popular. Larger populations required large marketplaces where they could purchase food, clothing, services, and other important things. The population spurt starting around 1470 solidified the market's connection with entrepreneurship. Here are some of the important developments that took place in entrepreneurship during this period:

Banking grew to new heights and complexities as small business owners had greater financing, the guild system expanded, giving, skilled craftsmen and other entrepreneurs a way to organize their business together, regulate the quality of the goods produced, and develop reputations for certain goods in towns across medieval Europe and entrepreneurs were able to purchase goods from abroad, turn those goods into finished products, and then those goods for a profit at a wider scale than ever before (Murray Hunter, 2013).

2.1.2.4. Modern Entrepreneurship

Today, entrepreneurs are the lifeblood of economies all over the world. Even in command economies like China, entrepreneurs are valued for their contributions to the economy and encouraged to innovate to compete with companies around the world. The global economy—combined with modern infrastructure and communications has introduced a new age of competition to the world of entrepreneurship. No longer are you competing with entrepreneurs in your tribe, town, village, or city: you're competing with entrepreneurs all over the world. Many of these entrepreneurs can access cheaper means of production than you. They may have better access to raw resources of cheap labor, for

example. This has made modern entrepreneurship more challenging and arguably more rewarding than ever before (Murray Hunter, 2013).

2.1.3. The History of Entrepreneurship in Ethiopia

The entrepreneurship resource in Ethiopia is at a low level. The backwardness of the country has a direct relationship with traditional practices of the agricultural economy. The practices are more traditional. The industry, commerce and service giving sectors are not well exploited. Due to the discouraging effects that happen during government change in the 1960s and transfer of individual properties to public ownership in the 1960s beginning and end modern agriculture, hand manufacturing, the interest for work, and creativity were affected. In the present system due to the lack of effort to strengthen and create a fair competitive atmosphere, the private sector is not showing the expected level of development. The business sector that the government monopolized cannot create a fair competitive atmosphere for creativity (Ethiopia economic association, 2005).

2.1.3.1. Entrepreneurship and development in Ethiopia

The development of countries has a direct relation with education, skill, creating wealth, technological progress, and significant change in the state of life of the people. Development is more about the existence of the perception of the society that is enriched in knowledge and practice. This enriched knowledge and skill of people can create new creative works and continuous wealth development. From many creative works, the income of a country increases through taxation. The development of social and economic infrastructure such as communication, education, health, electric power, telephone, water supply, radio, television, etc. services are widely distributed through the development of a countries income. Countries with fast developmental activities have people of self-confidence and understanding. Entrepreneurs are the sources for fast developmental activities, thinking, and creative works. There are no underdeveloped countries with a large number of entrepreneurs and developed countries with a few numbers of entrepreneurs. Therefore, skilled people are needed to develop a country. For this, development entrepreneurs and entrepreneurship play the leading role (Ethiopia economic association, 2005).

2.1.4. Theories of Entrepreneurship

Many theories have been put forward by scholars to explain the field of entrepreneurship. These theories have their origins in economics, psychology, sociology, anthropology, and management.

2.1.4.1. Economic Entrepreneurship Theories

The economic entrepreneurship theory has deep roots in the classical and neoclassical theories of economics. These theories explore the economic factors that enhance entrepreneurial behavior (Kwabena, 2011).

2.1.4.2. Classical Theory

The classical theory extolled the virtues of free trade, specialization, and competition. The theory was the result of Britain's industrial revolution which took place in the mid-1700 and lasted until the 1830s. The classical movement described the directing role of the entrepreneur in the context of production and distribution of goods in a competitive marketplace. Classical theorists articulated three modes of production: land; capital; and labor. There have been objections to the classical theory. These theorists failed to explain the dynamic upheaval generated by entrepreneurs of the industrial age (Kwabena, 2011).

2.1.4.3. Neo-classical Theory

The neo-classical model emerged from the criticisms of the classical model and indicated that economic phenomena could be relegated to instances of pure exchange, reflect an optimal ratio, and transpire in an economic system that was closed. The economic system consisted of exchange participants, exchange occurrences, and the impact of results of the exchange on other market actors. The importance of exchange coupled with diminishing marginal utility created enough impetus for entrepreneurship in the neoclassical movement. Some criticisms were raised against the neo-classical conjectures. The first is that aggregate demand ignores the uniqueness of individual-level entrepreneurial activity. Furthermore, neither use nor exchange value reflects the future value of innovation outcomes. Thirdly, rational resource allocation does not capture the complexity of market-based systems. The fourth point raised was that, efficiency-based performance does not subsume innovation and non-uniform outputs; known means/ends and perfect or semi-perfect knowledge does not describe uncertainty. Also, perfect competition does not

allow innovation and entrepreneurial activity. The fifth point is that it is impossible to trace all inputs and outputs in a market system. Finally, entrepreneurial activity is destructive to the order of an economic system (Kwabena, 2011).

2.1.4.4. Psychological Entrepreneurship Theories

The level of analysis in psychological theories is the individual. These theories emphasize personal characteristics that define entrepreneurship. Personality traits need for achievement and locus of control are reviewed and empirical evidence presented for three other new characteristics that are associated with entrepreneurial inclination. These are risk-taking, innovativeness, and tolerance for ambiguity (Kwabena, 2011).

2.1.4.5. Personality Traits Theory

Kwabena (2011) cited that Coon (2004) defines personality traits as “stable qualities that a person shows in most situations”. To the trait theorists there are enduring inborn qualities or potentials of the individual that naturally make him an entrepreneur. This model gives some insight into these traits or inborn qualities by identifying the characteristics associated with the entrepreneur. The characteristics give us a clue or an understanding of these traits or inborn potentials. In fact, explaining personality traits means making inferences from behavior.

Some of the characteristics or behaviors associated with entrepreneurs are that they tend to be more opportunity-driven (they nose around), demonstrate a high level of creativity and innovation, and show a high level of management skills and business know-how. They have also been found to be optimistic, (they see the cup as half full than as half empty), emotionally resilient and have the mental energy, they are hard workers, show intense commitment and perseverance, thrive on competitive desire to excel and win, tend to be dissatisfied with the status quo and desire improvement, entrepreneurs are also transformational in nature, who are lifelong learners and use failure as a tool and springboard. They also believe that they can personally make a difference, are individuals of integrity, and above all visionary. The only way to explain or claim that it exists is to look through the lenses of one’s characteristics/behaviors and conclude that one has the inborn quality to become an entrepreneur.

2.1.4.6.Locus of Control Theory

Locus of control is an important aspect of personality. According to Kwabena (2011) cited that the concept was first introduced by Julian Rotter in the 1950s. Rotter (1966) refers to Locus of Control as an individual's perception about the underlying main causes of events in his/her life. In other words, a locus of control orientation is a belief about whether the outcomes of our actions are contingent on what we do (internal control orientation) or on events outside our control (external control orientation). In this context the entrepreneur's success comes from his/her abilities and also support from outside.

The former is referred to as internal locus of control and the latter is referred to as external locus of control. While individuals with an internal locus of control believe that they can control life events, individuals with an external locus of control believe that life's events are the result of external factors, such as chance, luck or destiny. Empirical findings that internal locus of control is an entrepreneurial characteristic have been reported in the literature. In a student sample, internal locus of control was found to be positively associated with the desire to become an entrepreneur. Business owners have a slightly higher internal locus of control than other populations. Other studies have found a high degree of innovativeness, competitive aggressiveness, and autonomy reports (Kwabena, 2011).

2.1.4.7.Need for Achievement Theory

While the trait model focuses on enduring inborn qualities and locus of control on the individual's perceptions about the rewards and punishments in his or her life need for achievement theory human beings need to succeed, accomplish, excel or achieve. Entrepreneurs are driven by this need to achieve and excel. While there is no research evidence to support personality traits, there is evidence for the relationship between achievement motivation and entrepreneurship. Achievement motivation may be the only convincing person logical factor related to new venture creation. Risk taking and innovativeness, need for achievement, and tolerance for ambiguity had positive and significant influence on entrepreneurial inclination. However, locus of control had negative influence on entrepreneurial inclination. The construct locus of control was also found to be highly correlated with variables such as risk taking, need for achievement,

and tolerance for ambiguity. The recent finding on risk taking strengthens earlier empirical studies which indicate that aversion to risk declines as wealth raises, that is, one's net assets and value of future income. In complementing success in entrepreneurship, by increasing wealth, can reduce the entrepreneur's degree of risk aversion, and encourage more venturing. In his view, entrepreneurship may therefore be a self-perpetuating process. Further evidence suggests that some entrepreneurs exhibit mildly risk-loving behavior. These individuals prefer risks and challenges of venturing to the security of stable income (Kwabena, 2011).

2.1.4.8.Sociological Entrepreneurship Theory

The sociological theory is the third of the major entrepreneurship theories. Sociological enterprise focuses on the social context .In other words, in the sociological theories the level of analysis is traditionally the society.

According to Kwabena, 2011 cited that Reynolds (1991) has identified four social contexts that relates to entrepreneurial opportunity. The first one is social networks. Here, the focus is on building social relationships and bonds that promote trust and not opportunism. In other words, the entrepreneur should not take undue advantage of people to be successful; rather success comes as a result of keeping faith with the people.

The second he called the life course stage context which involves analyzing the life situations and characteristic of individuals who have decided to become entrepreneurs. The experiences of people could influence their thought and action so they want to do something meaningful with their lives. The third context is ethnic identification. One's sociological background is one of the decisive "push" factors to become an entrepreneur. For example, the social background of a person determines how far he/she can go. Marginalized groups may violate all obstacles and strive for success, spurred on by their disadvantaged background to make life better. The fourth social context is called population ecology. The idea is that environmental factors play an important role in the survival of businesses. The political system, government legislation, customers, employees and competition are some of the environmental factors that may have an impact on survival of new venture or the success of the entrepreneur (Kwabena, 2011).

2.1.4.9. Anthropological Entrepreneurship Theory

The fourth major theory is referred to as the anthropological theory. Anthropology is the study of the origin, development, customs, and beliefs of a community. In other words, the culture of the people in the community. The anthropological theory says that for someone to successfully initiate a venture the social and cultural contexts should be examined or considered.

Here emphasis is on the cultural entrepreneurship model. The model says that new venture is created by the influence of one's culture. Cultural practices lead to entrepreneurial attitudes such as innovation that also lead to venture creation behavior. Individual ethnicity affects attitude and behavior and culture reflects particular ethnic, social, economic, ecological, and political complexities in individuals. Thus, cultural environments can produce attitude differences as well as entrepreneurial behavior differences (Kwabena, 2011).

2.1.4.10. Opportunity-based Entrepreneurship Theory

According to Kwabena (2011) cited, the opportunity-based theory is attached by names such as Peter Drucker and Howard Stevenson. An opportunity-based approach provides a wide-ranging conceptual framework for entrepreneurship research. Entrepreneurs do not cause change but exploit the opportunities that change (in technology, consumer preferences, etc.) creates. He further says, "This defines entrepreneur and entrepreneurship, the entrepreneur always searches for change, responds to it, and exploits it as an opportunity". Opportunity construct is that entrepreneurs have an eye more for possibilities created by change than the problems. This is based on research to determine the differences between entrepreneurial management and administrative management. He concludes that the center of entrepreneurial management is the "search of opportunity without regard to resources currently controlled" (Kwabena, 2011).

2.1.4.11. Resource-based Entrepreneurship Theories

The resource-based theory of entrepreneurship argues that access to resources by founders is an important predictor of opportunity-based entrepreneurship and new venture growth. This theory stresses the importance of financial, social, and human resources. Thus, access to resources enhances the individual's ability to detect and act

upon discovered opportunities. Financial, social, and human capital represents three classes of theories under the resource-based entrepreneurship theories (Kwabena, 2011).

2.1.4.12. Financial capital/liquidity Theory

Empirical research has shown that the founding of new firms is more common when people have access to financial capital. By implication, this theory suggests that people with financial capital are more able to acquire resources to effectively exploit entrepreneurial opportunities, and set up a firm to do so. However, other studies contest this theory as it is demonstrated that most founders start new ventures without much, and that financial capital is not significantly related to the probability of being budding entrepreneurs. This apparent confusion is due to the fact that the line of research connected to the theory of liquidity constraints generally aims to resolve whether a founder's access to capital is determined by the amount of capital employed to start a new venture. This does not necessarily rule out the possibility of starting a firm without much capital. Therefore, founders access to capital is an important predictor of new venture growth but not necessarily important for the founding of a new venture. This theory argues that entrepreneurs have individual-specific resources that facilitate the recognition of new opportunities and the assembling of new resources for the emerging firm. Different research shows that some persons are more able to recognize and exploit opportunities than others because they have better access to information and knowledge (Kwabena, 2011).

2.1.4.13. Social Capital or Social Network Theory

Entrepreneurs are embedded in a larger social network structure that constitutes a significant proportion of their opportunity structure. "An individual may have the ability to recognize that a given entrepreneurial opportunity exists, but might lack the social connections to transform the opportunity into a business startup. It is thought that access to a larger social network might help overcome this problem". Kwabena (2011) cited (Aldrich and Zimmer, 1986) the literature on this theory shows that stronger social connections to resource providers facilitate the acquisition of resources and enhance the probability of opportunity exploitation. Other researchers have suggested that it is important for promising founders to have access to entrepreneurs in their social network,

as the competence these people have represents a kind of cultural capital that budding ventures can draw upon to detect opportunities (Kwabena, 2011).

2.1.4.14. Human Capital Entrepreneurship Theory

The human capital entrepreneurship theories are two factors, education and experience. The knowledge gained from education and experience represents a resource that is heterogeneously distributed across individuals and in effect central to understanding differences in opportunity identification and exploitation. Empirical studies show that human capital factors are positively related to becoming a budding entrepreneur, increase opportunity recognition, and even entrepreneurial success (Kwabena, 2011).

2.2. Empirical Review

2.2.1. Factors Affecting Entrepreneurship Attitude

2.2.1.1. Attitude toward entrepreneurship

Attitude toward a behavior refers to “the degree to which a person has a favorable or unfavorable evaluation or appraisal of the behavior in question. In the entrepreneurship context, attitude toward self-employment has been defined as “the difference between perceptions of personal desirability in becoming self-employed and organizationally employed” (Yan, 2014).

Attitude toward start-up is the degree to which the individual holds a positive or negative personal valuation about being an entrepreneur. Theorists have argued for a distinction between two components of attitude: affective/ experiential attitude, on the one hand, referring to feelings or emotions (joy, satisfaction), and drives engendered by the prospect of performing a behavior; and instrumental/cognitive attitude, on the other hand, referring to beliefs, thoughts, or rational arguments (Fernandes and Proença, 2013).

Types of attitude towards business

An attitude is a mental and neutral state of readiness organized through experience exerting a directive and dynamic influence upon the individual response to all objects and situations with which it is related. Attitude towards business is psychological preparation to perform a job that could be positive, negative, or neutral (Mohsen, Moslem and Mahdi, 2012).

Positive attitude towards business

It is an attitude that the individual view his job with love and interest and believes that business is the factor of personal and social success and has a sense of satisfaction and happiness from work. In this type of attitude the individual makes relation with their job and tries towards his growth with more motivation by performing affairs in a better manner (Mohsen, Moslem and Mahdi, 2012).

Negative attitude towards business

It is when the individual doesn't like to perform the job because of any reason and wants to shrink from responsibility. In this type of attitude the individual works by force to conduct his task and is just spending his working hours without any motivation (Mohsen, Moslem and Mahdi, 2012).

Neutral attitude towards business

In this type of business, the individual has no negative or positive feeling towards business and evaluates performing of the job as a task instead of the income that he is received. In this state, the individual has no sense of belongingness to the job and the performs job to the same amount that he is asked to and doesn't take action towards job excellence (Mohsen, Moslem and Mahdi, 2012).

The entrepreneurial attitude of people is influenced by their previous knowledge about entrepreneurship (Merike and Mervi, 2013). The entrepreneurship process is a complex effort carried out by people living in specific cultural and social conditions. For this reason, the positive or negative perceptions, which society has about entrepreneurship, can strongly influence the motivations of people to enter entrepreneurship. Societies benefit from people who are able to recognize valuable business opportunities and who perceive they have the required skills to exploit them. If the economy, in general has a positive attitude towards entrepreneurship, this can generate cultural and social support, financial and business assistance, and networking benefits that will encourage and facilitate potential and existing entrepreneurs (Xavier et al., 2013).

2.2.1.2. Entrepreneurship policy

It has been established four purposes: strong enterprise culture, legal environment favorable for entrepreneurship, Small to Medium Enterprises (SMEs') access to finance, and capability for SME growth and exports. Activities aimed at promoting entrepreneurship culture are needed to achieve three purposes: people are enterprising and want to become entrepreneurs; people have the skills and knowledge necessary for doing business; positive attitudes towards entrepreneurs and entrepreneurship in society. Activities in the following spheres are undertaken to achieve the purposes: entrepreneurship education in schools; life-long learning of the entrepreneurs; raising the awareness of entrepreneurship and innovation throughout the society; developing the ability of enterprises to co-operate. Therefore the government tends to positively influence the image of entrepreneurship in the country; universities and institutions (Eesti, 2007:2013).

Policymakers can help reduce these barriers by making the same support measures applicable to small and medium enterprises (e.g. tax reliefs or others) available to social enterprises and by making public procurement policies more responsive to the needs of the social enterprise sector (e.g. by removing hindrances such as capital requirements). Finally, a lack of managerial skills and capacities can limit social enterprises' ability to meet their objectives. Policymakers can help to increase the capacity of social enterprises by developing business development services and support structures, including hubs and incubators. By promoting a culture of social entrepreneurship, policymakers can also build awareness of the sector and attract new talent to it. Supporting research and increased knowledge of the sector and its needs, including on issues such as measuring social impact, can help to strengthen the sector more broadly. Social economy organizations that were surveyed for the crucial role that government can play in providing financial support and improving access to markets, including through public procurement policy (OECD, 2014).

2.2.1.3. Entrepreneurship Education

Entrepreneurship education refers to education which assists students to develop positive attitudes, innovation, and skills for self-reliance, rather than depending on the

government for employment. Often, the need for this kind of education is to produce graduates with capabilities and self-confidence for independent thought to discover new information leading to self-empowerment and economic development.

Agu (2006) argued that entrepreneurship education refers to the type of education designed to change both the orientation and attitude of the recipients which equips the recipient with both knowledge and skills to enable him/her to start and be able to manage a business entity. In other words, entrepreneurship education aims at developing the necessary entrepreneurial attitude, competence, and skills that will equip an individual to be able to commence and manage a business enterprise (Henry *et al.*, 2005).

Kirby (2011) observes that entrepreneurship has become so important that one of the major challenges facing all economies is their capacity to develop an environment that will support entrepreneurial culture, develop the necessary skills, attitudes, and behaviors to prepare young people and others to pursue opportunities.

Components of Entrepreneurship Education

Entrepreneurship education is viewed as a form of training in entrepreneurial knowledge, behavior, attitudes, and skills. As a result, students' attitudes towards entrepreneurship and entrepreneurship education can be measured in terms of three components of entrepreneurship attitudes namely cognitive, affective and behavioral attitude components (Pulka *et al.*, 2014). The cognitive component relates to beliefs, thoughts, and knowledge students have about entrepreneurship and entrepreneurship education that shape their attitudes and behaviors (Amdam, 2011). The affective component relates to feelings and emotions about entrepreneurship and entrepreneurship education that is, how a person sees the desirability or relevance of something and hence whether eventually they either like it or not (Kulpa *et al.*, 2014). The behavioral component relates to actions, overt responses, and willingness to respond to or accept something (Mani, 2008).

2.2.1.4. Entrepreneurial Attitude

The attitude of graduating class student's towards self-employment. The graduating class students are currently involved in entrepreneurial or self-employment activity. However, the majority do not have even a short term self-employed plan shortly after graduation. Therefore, entrepreneurial education plays a significant role in entrepreneurship and self -

employment as students who had taken the entrepreneurship course are more likely to be interested in start-ups of their own business at some point in time. On a survey conducted on Nigerian undergraduate students, they identified that specialized and practical education directed towards entrepreneurship has a significant influence in motivating students to become entrepreneurs (Abraham, 2015).

Self-confidence and innovativeness are given the general notion of an entrepreneur as one who prefers to go into his/her own business, it can be expected that an entrepreneur must believe that he/she can achieve the goals that are set. In other words, an entrepreneur is expected to have a perceived sense of self-esteem and competence in conjunction with his/her business affairs (Robinson *et al.*, 1991). According to Mbassana (2014), study the survey revealed that Kigali Independent University (KIU) students who participated in the study have a positive attitude towards entrepreneurship.

Urve *et al.*, (2014), the study was focused on identifying the attitudes and intentions of students to start with business, their personality traits, and contextual factors of the business environment, including the role of the university in supporting students' entrepreneurial attitudes and intentions. The research results showed that despite the considerable share of respondents thinking about starting a business, most of them do not want to undertake entrepreneurial activity after graduation, but postpone this to a more distant future. There could be various reasons that may be connected with personality traits, entrepreneurship knowledge and skills, and business environment problems.

Dickel (2011), attitude is the measuring of any object, thought, ideas, abstract or it comprises anything which a person holds in mind. The behavior of a person solely depends upon the individual's beliefs and attitudes, where those beliefs and attitudes play very important roles in determining an individual's action Sagiri (2009). Dohse and Walter (2010) also emphasized that the attitude towards the behavior has a direct and positive relation to entrepreneurial intentions. In studies by Byabashaija and Katono (2011), the results strongly evidenced that, where students are exposed to entrepreneurship education, their entrepreneurial attitude and entrepreneurial intention will change accordingly, because entrepreneurship education helps in building self-confidence as well as promoting self-efficacy among students. It is important to foster

personal capabilities and interests among students to have positive attitudes towards entrepreneurship (Ramayah *et al.*, 2012).

Attitude is the degree or extent to which an individual likes or dislikes something. Attitude is defined as the predisposition to respond in a generally favorable or unfavorable manner concerning the object of the attitude. An attitude is a mental neural state of readiness, organized through experience exerting a directive or dynamic influence upon the individual's response to all objects and situations with which it is related. Attitude may be positive or negative, optimistic or pessimistic, rational or irrational, desirable or undesirable. Therefore, there is a strong ascertaining that attitude plays a very important role in determining the learning behaviors of students in Universities. This called for a continued effort by the researchers/teachers to make sure that students develop a positive attitude and behavior towards Entrepreneurship (Ajzen, 1991).

According to the study of Nicholas (2015), items such as attitudes, subjective beliefs, and perceived behavioral restrictions became essential factors for explaining intentions and entrepreneurship. Factors such as age, training, gender, and family involvement have different relationships to a person's intentions to become an entrepreneur. A positive attitude is important in addition to the socio-political environment and financial resources for MSE promotion (Arzeni and Mitra, 2008).

According to Aschalew (2016), the study found most of the students have an unfavorable attitude towards entrepreneurship, but some of the students have a favorable attitude towards entrepreneurship. Community, family, and peers are the most influencers to graduate students' attitudes towards entrepreneurship and job creation. In addition to this negative attitude of students towards MSEs, is one of the factors that affect students' attitudes towards entrepreneurship (Belete, 2016).

Types of attitude towards business

Attitude towards business is psychological preparation to perform a job that could be positive, negative, or neutral. A positive attitude towards business is an attitude that the individual view his job with love and interest and believes that business is the factor of personal and social success and has a sense of satisfaction and happiness from work. In this type of attitude the individual makes relation with job and tries towards his growth

with more motivation by performing affairs in a better manner. A negative attitude towards business is when the individual doesn't like to perform the job because of any reason and wants to shrink from responsibility. In this type of attitude the individual works by force to conduct his task and is just spending his working hours without any motivation. Neutral attitude towards business in this type of business the individual has no negative or positive feeling towards business and evaluates performing of the job as a task instead of the income that he is received. In this state, the individual has no sense of belongingness to the job and performs the job to the same amount that he is asked to and doesn't take action towards job excellence (Mohsen, 2012).

2.2.1.5.Human and Intellectual Capital

There are a number of profits and non-profit organizations which are ready to support young entrepreneurs are limited both in scale and quantity. Another problem occurs is the lack of human and intellectual capital. These youngsters cannot easily find partners and supporting employees as a result of capital shortage. Give students the primary foundation to get information about start-ups from the market, get more access to capital, and practical for their business ideas. Human capital is associated with knowledge, technology, and the ability of employees. Hayton (2005) studied the relationship between human capital and entrepreneurship in terms of heterogeneity and the accumulation of human capital. Hambrick and Mason (1984) suggested that the cognitive ability and values of members in the top management team have a significant impact on the company's strategy. Experience in the profession and educational training can show the characteristics of managers in this regard. Furthermore, the personal backgrounds and heterogeneity of the educational levels of top managers also affect decision-making which, in turn, affects the company's strategy and performance (Simons, Pelled and Smith, 1999).

Several studies have indicated that experience, education and training, and other learning experiences of the entrepreneurs and members of the top management team are related to the success of the corporation (Chandler and Hanks, 1998; Cooper, Gimeno Gascon, and Woo, 1994; Honig, 1998; MacMillan, Zemann and Subba Narasimha., 1987; Stuart and Abetti, 1990). Therefore, the success of the enterprise can be attributed to the impact of

both the accumulation and the heterogeneity of human capital on decision-making strategy and innovation.

The better cognitive ability helps one to better understand the issue in a decision-making situation and to come up with systematic plans for resolving problems. Empirical researches have shown that education, awareness, and wisdom, and other characteristics are related to innovation (Amabile, 1983; Oldham and Cummings, 1996; Woodman and Schoenfeldt, 1989) and entrepreneurship (Kimberly and Evanisko, 1981; Rogers and Schoemaker, 1971). Because upper-level managers play a key role in the decision-making process, characteristics of the top management team have an especially great influence on entrepreneurship-oriented start-ups. Bantel and Jackson's (1989) empirical analysis revealed that the educational levels of the top management team and heterogeneity of their educational backgrounds are positively correlated with innovation activities. Similarly, Wiersema and Bantel (1992) found that the top management team's education, training in science, and the heterogeneity of their profession are also positively correlated with the company's strategy preferences (which can be a proxy for the willingness to participate in venturing activities). Hayton (2005) provided evidence that the heterogeneity of the educational backgrounds of the top management team has a positive impact on the company's innovation activities and venturing activities.

Human capital is a major component of intellectual capital based on employees' set of knowledge, skills, experience, and abilities that can generate value for the organization, and human capital can generally be expressed as an essential component of intellectual capital based on: Competencies such as education, professional skills, knowledge, attitude such as motivation, leadership, behavior patterns and intellectual agility such as innovation, creativity, flexibility, adaptability (Yasmin and Inneke, 2018).

According to Yasmin and Inneke (2018), intellectual capital is an important factor, a strategic asset that determines the success of an organization. Especially, in a competitive environment, intellectual capital becomes increasingly important. In the industrial era, traditional assets such as land and capital and tangible assets are very important sources of production. But along with the transformation of the industrial era into the era of the knowledge-based economy, the understanding of assets also changed. Intellectual capital

can be expressed as the backbone of an information-based economy. Intellectual capital can also be expressed as a management strategy utilized for the organization to generate profit and achieve the desired performance.

Intellectual Capital differentiates between the market value of the firm and the book value of the company's assets or its financial capital. Intellectual Capital refers to the knowledge and abilities possessed by a social collective, such as an organization, an intellectual community, or professional practice. Intellectual capital represents valuable resources and the ability to act based on knowledge. The intellectual capital model is based on six major components of intellectual capital, namely, human capital, customer capital, structural capital, social capital, technological capital, and spiritual capital. Intellectual Capital had met the pre-requirements of unique resources which became competitive advantages composing the values of the company (Yasmin and Inneke, 2018).

The human capital entrepreneurship theories are two factors, education and experience. The knowledge gained from education and experience represents a resource that is heterogeneously distributed across individuals and in effect central to understanding differences in opportunity identification and exploitation. Empirical studies show that human capital factors are positively related to becoming a budding entrepreneur, increase opportunity recognition, and even entrepreneurial success (Kwabena, 2011).

2.2.1.6. Business Encouragement Center

Business encouragement centers are very essential to initiate graduate students to find their opportunities and deploy their ideas for entrepreneurship. It is also a place for sharing stories, getting inspiration, and looking for business partners or finding human resources. Furthermore, the government should organize more start-up workshops and competitions or leagues at the national level to attract investors and benefactors to transform ideas as well as innovations from paper into reality Duygu (2009). Research results showed that subjective norms had a positive and significant relationship with entrepreneurial intention and findings revealed that students with past work experience had higher entrepreneurial intentions Ehsan (2016). As a result of Sylvia (2016) study, a personal attitude is the greatest influence of the students' intention to become an

entrepreneur. Thus, it is important to find a strategy on how to convince the students about the advantages of being an entrepreneur. In this sense, it may require additional syllabus or programs for entrepreneurship study.

2.2.1.7. Knowledge Transfer

The results of Munshi (2018), study have demonstrated that variables such as knowledge transfer rate between the university-industry domain, as well as the standard of the tertiary education system in the country, exert a positive influence on the entrepreneurial capability. According to Abel, (2015), the more the young people know successful entrepreneurs, the more likely he/she might become personally interested in starting a business because they have role models to follow. Moreover, when supported by media campaigns, credible models can influence young people's environment, so that parents and relatives will change their attitude towards entrepreneurship as well and encourage their children to engage in the field. Promoting entrepreneurship education-entrepreneurship education is crucial in assisting young people to develop entrepreneurial skills, attributes, and behaviors as well as to develop enterprise awareness, to understand and realize entrepreneurship as a career option. According to Wei-Loon (2012), knowledge and experience transferring processes are the main factors that positively affect entrepreneurship attitude.

According to Majid (2013), specific processes and programs can make a long way that a person passes with trial and error short by altering the perception and attitudes of individuals and equipping them with particular knowledge and skills and change a potential entrepreneur to an actual entrepreneur. Therefore, Universities can use various methods including introducing culture, doing scientific research, training courses, and creating entrepreneurial supporting centers to take a great step forward in achieving this mission.

2.2.1.8. Environment

Environment is one of the factors not yet been examined thoroughly in past entrepreneurial kinds of literature. These kinds of literature stated that countries established their economic development knowledge based on small business entrepreneurship laid in the deep-rooted ground for the sustainability of their economy

Hisrich *et al.*, (2002). These environmental factors cover cultural supports, social confidence, appropriate markets, financing, consulting and training into the business networks that are given in this regard, in a multinational study of university students, found no significant relationship between employment status and entrepreneurial intentions (Autio *et al.*, 2001). According to Yu-Fen Chen (2010), environmental cognition was an important factor in entrepreneurship.

Environmental protections such as financial and non-financial protections are among the causes that are effective on creating new and entrepreneurial businesses. Environmental protection is important in investment success and also next steps while it is effective on the primary launching of a business (Willet bank, 2005). Carter (2003) identified the main reasons that individuals inclination to start an enterprise as self-realization, financial success, perception of their likely success in the role of a successful entrepreneur whom they choose to imitate, innovation, recognition, and independence. Gender, family experience with business, and educational level were found to be significant factors in entrepreneurial interests by Wang and Wong (2004) when they investigated the determinants of interest in entrepreneurship among university students in Singapore.

2.2.1.9. Gender

Chalchissa and Emnet (2014), study it became evident there is very little known about female undergraduates and their views on entrepreneurship. Therefore, there is a need to gain more knowledge about young educated women and their views on entrepreneurship. Families play an important role in female entrepreneurship; this study reveals half of family female students discourage them to start their own business while some parents encourage them as they start their own business.

2.2.1.10. Business Ecosystem

The term "ecosystem" was introduced by James (1993), who put forward the thesis that business success requires a set of resources such as: capital, partners, suppliers and clients within a cooperation network in which companies can compete and cooperate in the process of creating innovative products and services, and providing value to clients. Ron (2006) defines the ecosystem in the context of implementing breakthrough innovations within the entire industry. In this sense, the ecosystem means taking into

account the level of maturity of all players: suppliers, recipients, clients, competitors, in the process of creating value for the client and determines the industry's maturity to the spread of innovation Ron (2006). The business ecosystem consists of a set of actors linked together in a specific location, including universities, research institutions, investors, professional service providers, and culture in an open and dynamic environment in which these elements are connected. The business ecosystem is an environment within which a new start-up or initiative develops, which provides backing for the entrepreneurship phenomenon in general. This ecosystem consists of three elements: a tightly clustered community of entrepreneurs; leaders heading up this community for its different interest groups; and facilitators that support the community, including universities, governments, investors, corporations, and other players.

Mason and Brown (2014), defined business ecosystem as a set of interconnected entrepreneurial actors (both potential and existing), entrepreneurial organizations (e.g. firms, venture capitalists, business angels, banks), institutions (universities, public sector agencies, financial bodies) and entrepreneurial processes (e.g. the business birth rate, numbers of high growth firms, levels of 'blockbuster entrepreneurship', number of serial entrepreneurs, degree of sellout mentality within firms and levels of entrepreneurial ambition) which formally and informally coalesce to connect, mediate and govern the performance within the local entrepreneurial environment.

Often cited definition of the business ecosystem is the definition of Daniel (2010) and (2011) according to which the entrepreneurial ecosystem is "a set of networked institutions to aid the entrepreneur to go through all stages of the process of new venture development. It can be understood as a service network, where the entrepreneur is the focus of action and the measure of success".

The business ecosystem consists of specific elements that are grouped in six general domains: (1) policy, (2) finance, (3) culture, (4) supports, (5) human capital, and (6) markets. Although an entrepreneurial ecosystem can be described using these six domains, each ecosystem is the result of the hundreds of elements interacting in highly complex ways. Business ecosystem is made up of three key factors: (1) there is a critical mass of entrepreneurs, companies and institutions specialized in a particular location; (2)

developed a dense network of relationships between the actors; (3) a culture where all it brings together elements (Daniel, 2011).



Figure 2. 1 Domains of Entrepreneurial Ecosystem (Daniel, 2011)

2.2.2. Challenges of Entrepreneurial Attitude/Entrepreneurs

2.2.2.1. Business Regulation

Effective and efficient regulations give entrepreneurs a better chance to flourish at the lowest possible cost. Fast and over-simplified business regulations are quite essential to unleashing the entrepreneurship potential due to a nation. Regulations are like traffic lights put up to prevent gridlock. Alike efficient traffic rules in the city, smart business regulations are essential to allow business transactions to flow. Tougher business regulations show the growth of entrepreneurial works. They increase the time and cost needed to start a business, making it less likely for such a business to take root. Business regulation therefore should have to be flexible in the way that fits the dynamicity of market forces (World Bank Doing Business, 2015).

The World Bank Doing Business (2015) report notes that just as traffic systems have to adjust when a new path is being constructed, regulations need to adapt to new demands from the market and to changes in technology (such as the growing use of information and communication technology in business processes). Entrepreneurs face many regulatory disturbances along the path of new firm formation.

2.2.2.2. Corruption

Corruption is one of the serious challenges entrepreneurs face on their way to meet government requirements to start a business. Building on the World Bank Enterprise Survey corruption database around 27.8 percent of firms are expected to give gifts to officials to get things done (World Bank Doing Business, 2015).

2.2.2.3. Lack of Infrastructure

Empowering infrastructure is crucial to thriving entrepreneurship. It is the base of exercising an entrepreneurial knowledge and harnessing the state of innovation in a country. Easy access to reliable and quality infrastructure increases productivity and efficiency, lowers transaction costs, betters access to markets, and sustainable growth. Entrepreneurs in Sub-Saharan Africa struggle with a low stock of infrastructure in their day to day activity (World Energy Outlook, 2014).

Lack of sufficient power is one of the threats entrepreneurs face to starting and growing business. Many businesses lack reliable power supply to operate higher value-added activities that heavily depend on electricity-based technologies (World Energy Outlook's, 2014).

2.2.2.4. Lack of Finance

Financial problem has long been one of the stout challenges entrepreneurs faced along the years. They put inadequate funds as the biggest and critical problem in starting a firm and compete with mandatory firms. In fact, without adequate finance, proper functioning and growth of firms become a complicated nightmare. The lack of finance makes the opportunity cost of lending much higher for entrepreneurs. Lenders demand much higher levels of collateral from entrepreneurs (World Bank Doing Business, 2015).

2.2.2.5. Lack of Entrepreneurial Knowledge and Skills

Smart business regulation and adequate finance only do not guarantee an entrepreneurial growth and success. Entrepreneurial skills and knowledge are also fundamental for a promising entrepreneurial work. Basic entrepreneurship training ushers start-up formation and sustainability. It increases the self-confidence and self-efficacy of individuals to cope with challenges ahead. It also helps to ensure a good project proposal and secure a great pool of finance required of the entrepreneur to start a viable firm.

Prospective entrepreneurs need to be able to convince investors that they have a viable proposition and the determination and tenacity to succeed. The entrepreneur should be competent enough to demonstrate an intimate knowledge of his/ her business model, as well as the working environment of his/her firm. He/she need to have the skills used to sell, bargain, lead, plan, make decisions, solve problems, organize and communicate (Shane, 2003).

2.2.2.6. Market Size

Market size is also an important factor determining the status of entrepreneurship in an economy. Big markets enhance opportunities for entrepreneurs as they can enter growing markets to meet excess demand that other companies cannot meet. Big markets allow the fixed costs of organizing a firm to be amortized over more sales (Shane, 2003). (Habtamu, 2015), study result shows that cumbersome laws and regulations, corruption, poor infrastructure, lack of finance, lack of strong entrepreneurial training, and small market came out as the challenges to entrepreneurial success.

2.2.3. Entrepreneur

Entrepreneur' for the first time to mean a person who bears uncertainty and risk, an agent who buys factors of production at certain prices to combine them into a product to sell it at an uncertain price in future, an entrepreneur is the one who always searches for change, responds to it and exploits it as an opportunity and entrepreneur makes a decision about obtaining and using resources while assuming the risk of the enterprise (Anurag; Ghaziabad and Sanjeev, 2016).

Types of Entrepreneur

There are several ways through which entrepreneurs can be classified. They can be classified based on the type of business, use of technology, gender, motivation, organization, and many more. But here we will discuss the two most important classification based on prior researches. Entrepreneurs classified in the manner that at the initial stage of economic development entrepreneurs have less initiative and drive and as economic development proceeds, they become more innovative and enthusiastic (Anurag; Ghaziabad and Sanjeev, 2016).

Based on this, classified entrepreneurs into four categories:

Innovating Entrepreneurs: Prevalent in developed countries, and innovating entrepreneur is the one who introduces new goods and services, inducts new methods of production, experiments with new processes, discover new markets, and restructures the enterprise. It is important to note that such entrepreneurs can work only when a certain level of development is already achieved, and people look forward to change and improvement (Anurag; Ghaziabad and Sanjeev, 2016).

Imitative Entrepreneurs: Mostly found in developing/underdeveloped countries, this class of entrepreneurs is characterized by their readiness to adopt successful innovations already inaugurated. They enjoy the existing innovations originated by innovating entrepreneurs, which may be in developed economies. Imitative entrepreneurs do not innovate the changes themselves, they only imitate techniques and technology innovated by others (Anurag; Ghaziabad and Sanjeev, 2016).

Fabian Entrepreneurs: Fabian entrepreneurs are ones who lack the will to adapt to new methods of productions. They exhibit great vigilance and apprehensions in experimenting with any change in their enterprise. They imitate only when it becomes clear that failure to do so would result in a loss of the relative position of their enterprise. They are sluggish and diffident in adopting even the successful innovations (Anurag; Ghaziabad and Sanjeev, 2016).

Drone Entrepreneurs: Drone entrepreneurs are referred to the ones who refuse to adopt opportunities to make changes in the existing methods of production, although they are earning extremely reduced returns compared to other producers, who have adopted new and technologically advanced methods. Sometimes such entrepreneurs may even suffer losses but they are not ready to make changes in their existing production methods. They struggle to exist, not to grow. Thus they are dawdlers as they choose to continue working in their conventional way and resist changes (Anurag; Ghaziabad and Sanjeev, 2016).

2.2.4. Opportunities for Entrepreneurs

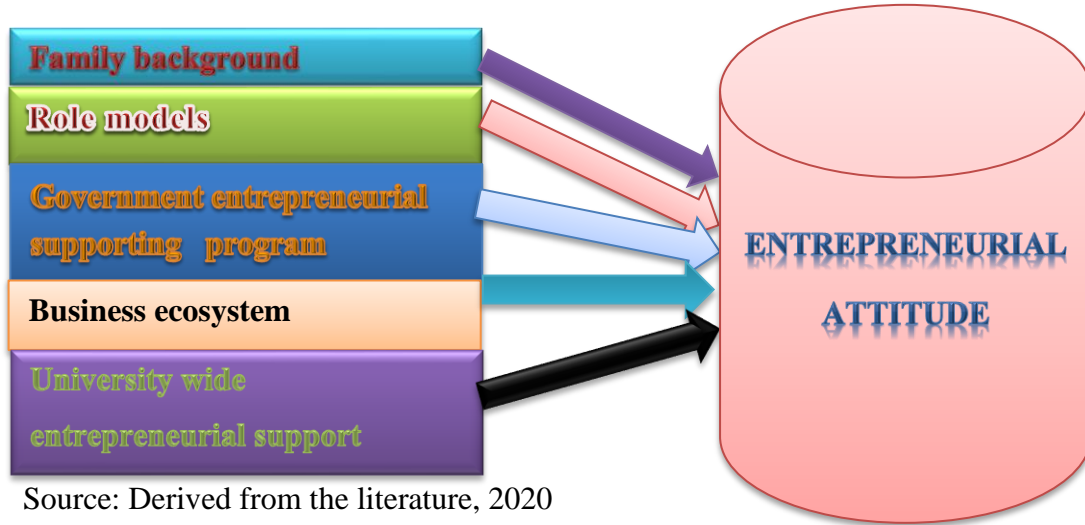
There are many different good opportunities for entrepreneurs in our country to start up a new business and to innovate their business ideas. Just to mention some of the best opportunities available for entrepreneurs in Ethiopia are: Government entrepreneurship

incentives policy, that the government works to find budget and funding for entrepreneurs and creative minds, the fact that different banks have a credit service that encourages students with entrepreneurial and creative thinking, to encourage students with creative ideas to go abroad and to study their creative ideas; have a system where other NGOs promote creative ideas. On the other hand, there are better opportunities gave the space to absorbing unemployment through to startup business/job creations in Ethiopian urban development. These are like government-funded financial institutions to give 80% credit capital with and without collateral, high government subsidies for constructions of agglomerate market places and clustered production, special support of MSEs on creating the business network and value chain management, tax incentives for MSE both at the domestic and export market (tax holidays), the long Payback period for loan and affirmative action on government procurements are some of the opportunities MSEs and entrepreneurs are favored (FDRE, 2016).

2.3. Conceptual Frame work

According to John W. Creswell (2014), a conceptual framework or literature map is a visual picture (or figure) of the grouping of the literature on the topic that illustrates how your particular study contributed to the literature, placing your study within the larger body of research. Accordingly, the literature on factors affecting students' entrepreneurial attitude towards entrepreneurship reviewed and conceptual framework is developed. In an attempt to put this study in context, the conceptual framework is developed for the sake of getting information relevant to the study objectives and to identify the measurable variables. The dependent variable which is entrepreneurial attitude is influenced by independent variables which are family background, role model, government entrepreneurial supporting programs, and business ecosystem and university-wide entrepreneurial support.

Figure 2. 2 Conceptual Framework



CHAPTER THREE

3. RESEARCH DESIGN AND METHODOLOGY

This chapter focuses on the methodology that was being used in the study. It was deal with research design, research approach, target population, sampling techniques, sample size, research instruments, and validity instruments, reliability of instruments, data collection and analysis and, ethical considerations.

3.1. Research Design

The study was used as a descriptive and explanatory research design. According to Dhanapati (2016) cited Plano Clark (2011), an explanatory design consists of first collecting quantitative data and then collecting qualitative data to help explain or elaborate on the quantitative results. The rationale for this approach is that the quantitative data and results provide a general picture of the research problem; more analysis, specifically through qualitative data collection is needed to refine, extend or explain the general picture.

The combination of descriptive and explanatory research types enables the researcher to use methods of data collection which provides a lot of information and gives a holistic understanding of the research topic. Therefore, descriptive and explanatory researches are appropriate for this study as the purpose of the study was to describe and explain factors affecting students' entrepreneurial attitudes towards entrepreneurship.

3.2. Research Approach

This study was used as a mixed research approach. Mixed research methods is an approach to an investigation involving collecting both quantitative and qualitative data, integrating the two forms of data, and using distinct designs that may involve philosophical assumptions and theoretical frameworks. The core assumption of this form of investigation is that the integration of qualitative and quantitative data yields additional insight beyond the information provided by either the quantitative or qualitative data alone (John W. Creswell, 2018).

3.3. Target Population and Sampling Design

3.3.1. Target Population

In this study, the target population was being including 2020 graduate students from the University of Addis Ababa Science and Technology and the population size is 1822.

3.3.2. Sampling Design

3.4. Target Population Size

The target population includes all graduating students from the four colleges in Addis Ababa Science and Technology University and the population size is 1822.

3.4.1. Sample Size Determination Method and Sample size

Simple random sampling method was used. The simple random sample means that every case of the population has an equal probability of inclusion in the sample Hamed Taherdoost (2016).

A population refers to the group of individuals from which the sample is taken for measurement. However, a sample is a subset of people, items, or events from a larger population that we collect and analyze to make inferences.

Taro Yamane's method (1967), for sample size calculation, was being determined from the total given population.

$$n = \frac{N}{1+N(e)^2}$$

Where:

n= signifies the sample size,

N = signifies the population under study (Population size), and

e = signifies Margin of error (MoE), e = 0.05 based on the research condition.

Therefore according to Yamane sample size determination formula, my sample size is calculated as follows:

$$n = \frac{N}{1+N(e)^2}$$

$$n = \frac{1822}{1+1822(0.05)^2}$$

$$n = \frac{1822}{1+4.555}$$

$$n = 328$$

The margin error (MoE), It could be 0.05 (e = based on the research condition). In this study therefore 328 were be participating in graduating and post graduating class students of the four colleges of AASTU. It is from this population that a sample size of 328.

Table3. 1 The Proportion of Sample Size from Each College

No	Name of the College	Total population in one college	Sample size calculation from one college	Total sample size Each colleges
1	College of Applied Science	134	$134 \times 328 / 1822 = 24$	24
2	College of Biological and chemical Engineering	256	$256 \times 328 / 1822 = 46$	46
3	College of Architecture and Civil Engineering	734	$734 \times 328 / 1822 = 132$	132
4	College of Electrical and Mechanical Engineering	698	$698 \times 328 / 1822 = 126$	126
Total				328

3.5. Sampling Techniques/Method

There are four Colleges and nineteen departments in AASTU. The study was focus on the four colleges that are Applied Science College, Biological and Chemical Engineering College, Electrical Mechanical Engineering College and Architecture and Civil Engineering College, nineteen departments. There are 1822 total graduate students from the four colleges. So, from 1822 students' 328 was determined as sample size using the Taro Yamane sample size determination formula, and a simple random sampling technique was used to draw 328 respondents from the 1822 student population.

3.6. Type and Data Source

The data collection instrument was including questionnaires, interviews, and analysis of documents utilized to get relevant information from key informants. The questionnaires were being constructed with closed and open-ended items. The questionnaire was being employed as the main data collection instrument because factual information is better to secure through the questionnaire. The other instrument is the interview; the study was constructing semi-structured interview questions.

The study used in both primary and secondary data sources to attain the objective of the study. The primary data were being collected from 2020 under and postgraduate students of Applied Science College, Biological and Chemical Engineering College, Electrical and Mechanical Engineering College and Architecture and Civil Engineering College and its departments. Because of supporting the information gathered through primary sources, secondary data were collected from different published books, journals, articles, and documents.

3.7. Data Collection Method

The data collection tools are instruments the researcher uses to gather information to address critical research questions identified before. To increase the breadth of information obtained from the respondents to factors affecting students' entrepreneurial attitudes towards entrepreneurship Addis Ababa Science and Technology University this study would use two types of data collection instruments. These instruments are questionnaires and personal interviews.

3.7.1. Questionnaire

A structured questionnaire is used to gather information on students' attitudes towards entrepreneurship. The researcher was developing a structured questionnaire with mostly close-ended questions and a few open-ended questions. The questionnaire is structured to give demographic data, knowledge of assessment of students' attitudes towards entrepreneurship. The items of all questionnaires were being prepared in the English language.

3.7.2. Interview

Various publications, different journals, articles related to the subject under study, and other online materials were being utilized. To make triangulation between the quantitative results and qualitative information of the study, interviews were being 6 students of which four colleges from each department based on the lottery method, and AASTU innovation and technology transfer director were interviewed.

3.8. Validity and Reliability

Checking the validity and reliability of data collecting instruments before providing for the actual study subject is the core to assure the quality of the data.

3.8.1. Validity

Validity is concerned with whether the findings are really about what they appear to be about. This potential lack of validity in the conclusions was minimized by a research design that built in the opportunity for focus groups after the questionnaire results had been analyzed (Mark, Philips, and Adrian, 2007).

To ensure the validity of instruments, the instruments were developing a pilot study that was carried out in Addis Ababa Science and Technology University. The pilot test provides an advance opportunity for the investigator to check the questionnaires and to minimize errors due to improper design of instruments, such as problems of wording or sequence (Adams and Waits, 2007).

The pilot-test was conducted to test the validity of the content. It was be done with objectives of checking whether or not the items included in the instruments could enable the researcher to obtain the relevant information and to identify and eliminate problems in collecting data from the target population. Before conducting the pilot-test, respondents was oriented about the objectives of the pilot-study, how to fill out the items, evaluate and give feedback regarding the relevant items. To this end, draft questionnaires was distributed and filled out by the population selected for the pilot study. After the dispatched questionnaires were returned, necessary modifications on items and the complete removal and replacement of unclear questions were being made.

3.8.2. Reliability

Reliability refers to the extent to which your data collection techniques or analysis procedures was yield consistent findings (Mark, Philips, and Adrian, 2007). Reliability is a major concern when a psychological test is used to measure some attribute or behavior (Rosenthal and Rosnow, 1991). For instance, to understand the functioning of a test, the test which is used consistently must discriminate individuals at one time or over a course of time. In other words, reliability is the extent to which measurements are repeatable,

when different persons perform the measurements, on different occasions, under different conditions, with supposedly alternative instruments that measure the same thing. In sum, reliability is the consistency of measurement (Bollen, 1989), or stability of measurement over a variety of conditions in which the same results should be obtained (Nunnally, 1978). Thus, the reliability of questionnaires of major dimensions (attitude, family background, role model, government entrepreneurial supporting programs, and business ecosystem and university-wide entrepreneurial support) was tested by using Cronbach's Alpha. Accordingly, reliability analysis was done and the findings are presented in the following table.

Table3. 2 Reliability Statistics

Reliability Statistics			
No	Variables	Cronbach's Alpha values	N of Items
1	Attitude	.923	4
2	Family background	.663	4
3	Role model	.621	5
4	Government entrepreneurial supporting program	.719	5
5	Business ecosystem	.702	5
6	University wide entrepreneurial support	.719	6
Result of total variables		.923	29

Source: Own Computation via SPSS, 2020

According to Tarakol and Dennick (2011), Cronbach's alpha score greater than or equal to 0.9 is excellent, 0.8 up to 0.9 is good, greater than 0.7 up to 0.8 is acceptable, greater than 0.6 up to 0.7 is questionable, 0.5 up to 0.6 is poor and less than 0.5 is unacceptable. In general, a score of the above table 3.2 more of them greater than 0.7 they are okay, but one of them approximately 0.7 and one of them less than 0.7 which means the reliability is under question. As indicated in table3.2 the overall reliability coefficients of the questionnaires were 0.923 which is excellent which denotes that all items in questionnaires were reliable. This implies that the instruments were highly reliable for use in data collection.

3.9. Data Analysis Methods

The data that was collected through self-administered questionnaires was edited, coded, and cleaned before it will be analyzed. Accordingly, simple descriptive statistics analysis such as frequency tables, graphs, mean, chart, and inferential statistics such as correlation and regression presentation measurement types were used to summarize data that shows variations between responses.

CHAPTRE FOUR

4. RESULT AND DISCUSION

This chapter focuses on the data analyzing and interpretations of the results of the study as set out in the research methodology. The data was collected exclusively from the questionnaire as the research instrument. The questionnaire was designed in line with the objectives of the study. To enhance the quality of data obtained, Likert type questionnaires were included whereby respondents indicated the extent to which the variables were practiced in a five-point Likert scale and the data entered to statistical package for social science (SPSS) version 26 the level of significance is determined as 0.05. Later the data were cleaned and coded for further analysis. The study sample size was 328 from this sample size 312 (95%) students are only responded to the questionnaires, but the remaining 16 (5%) of the students' do not respond to the questionnaires.

4.1. Demographic Characteristics of Respondents

The demographic characteristics of the respondents are shown below in the tables.

4.1.1. Gender of Respondents

Table4. 1 Respondents Gender

No	Gender	Frequency	Percent
1	Female	53	17
2	Male	259	83
Total		312	100

Source: Own Survey, 2020

Table 4.1 shows that 259 (83%) of the respondents' who responded to the questionnaires were male, and the other 53 (17%) respondents are females. This data shows that the majority of the respondents were male.

4.1.2. Age of Respondents

Table4. 2 Age of Respondents

No	Age Category	Frequency	Percent
1	18-25 years	242	77.6
2	26-35 years	62	19.9
3	Above 35 years	8	2.6
	Total	312	100

Source: Own Survey, 2020

Table 4.2 shows that 242 (77.6%) of respondents' were aged between 18-25 years category, 62 (19.9%) respondents were 26-35 aged category, and the others 8 (2.6%) respondents' were above 35 years aged category. This data implies that the majority of respondents were young students.

4.1.3. Year of study

Table4. 3 Year of study

Year of study	frequency	Percent
4 th year	43	13.8
5 th year	224	71.8
Post graduate	45	14.4
Total	312	100

Source: Own Survey, 2020

Table 4.3 shows that 224 (71.8%) of respondents were 5th year engineering department students, and the others 45 (14.4%) respondents were postgraduate and the remaining 43 (13.8%) of the respondents' were 4th year applied science department students.

4.1.4. Family Level of Education

Table4. 4 Family Level of Education

No	Family education level	Frequency	Percent
1	No formal education	125	40.1
2	Read and write	5	1.6
3	High school completed	1	0.3
4	First degree	120	38.5
5	Second degree	60	19.2
6	Third degree	1	0.3
	Total	312	100

Source: Own Survey, 2020

Table 4.4 shows that 125 (40.1%) of the respondents responded that their families are uneducated (without any formal education), the other 120 (38.5%) the students family has a bachelor's degree, and the other 60 (19.2%) students' family has a 2nd degree. From this, it can be concluded that higher education is a place where students come from different family educational backgrounds accommodate.

4.1.5. Family Employment Background

Table4. 5 Family Employment Backgrounds

No	Family employment background	Frequency	Percent
1	Agriculture	133	42.6
2	Government employee	69	22.1
3	Private employee	44	14.1
4	Private business owner	50	16
5	Others	16	5.1
Total		312	100

Source: Own Survey, 2020

Table 4.5 shows that 133 (42.6%) of the students' family were participating in agricultural sectors, 69 (22.1%) students family were government-employed, 44 (14.1%) students family were privately employed, and the other 50 (16%) of the students family were self-employed, and 16 (5.1%) of the students' families were in other occupations. This data shows the majority of respondents come from rural areas.

4.1.6. Family Average Monthly Income

Table4. 6 Family Average Monthly Incomes

No	Family average monthly income	Frequency	Percent
1	Less than 1,000 Birr	133	42.6
2	Between 1,0001-5,000 Birr	72	23.1
3	Between 5,001-10,000 Birr	41	13.1
4	Greater than 10,000 Birr	66	21.2
Total		312	100

Source: Own Survey, 2020

Table4.6 reveal that 133 (42.6%) of students' family had less than 1,000 birr monthly income while 72 (23.1%) of the students' family had 1,001 to 5,000 birr monthly income, and 41 (13.1%) of the students' family had 5,001 to 10,000 birr monthly income and the other 66 (21.2%) of the students' family had greater than 10,000 birr monthly income.

4.1.7. Family Business background

Table4. 7 Family business backgrounds

No	Family business back ground	Frequency	Percent
1	Yes	50	16
2	No	262	84
Total		312	100

Source: Own Survey, 2020

As shown in Table 4.7 above, 262 (84%) of the students' family backgrounds indicated they do not business-oriented while others 50 (16%) of the students' family backgrounds indicated that business-oriented. It can be inferred that the majority of respondents' are not business-oriented.

4.1.8. Students Training on Entrepreneurship

Table4. 8 Students Training on Entrepreneurship

No	Training on entrepreneurship	Frequency	Percent
1	Yes	248	79.5
2	No	64	20.5
Total		312	100

Source: Own Survey, 2020

Table 4.8, shows that 248 (79.5%) of the students were received entrepreneurial training, and the remaining 64 (20.5%) of the students' did not receive any entrepreneurial training. As it is indicated above most of the students have an idea of entrepreneurship from a course designed in their education.

4.1.9. Respondents Department Distribution in CBCE

Table4. 9 Respondents Department Distributions in CBCE

No	Department	Frequency	Percent
1	Biotechnology engineering	12	3.8
2	Food processing engineering	12	3.8
3	Chemical engineering	24	7.7
4	Environmental Engineering	32	10.3
Total		80	25.6

Source: Own Survey, 2020

Table 4.9 shows that 80 (25.6%) of students are participate in the study from the College of Biological and Chemical Engineering in four departments.

4.1.10. Respondents Department Distribution in CACE

Table4. 10 Respondents' Department Distributions in CACE

No	Department	Frequency	Percent
1	Architecture engineering	20	6.4
2	Urban planning engineering	4	1.3
3	Civil engineering	8	2.6
4	Water supply and sanitary engineering	28	9
5	Construction Technology and Management (CTM)	24	7.7
6	Mining engineering	4	1.3
Total		88	28.2

Source: Own Survey, 2020

Table 4.10 shows that 88 (28.2%) of students are participate in the study from the College of Architecture and Civil Engineering in six departments.

4.1.11. Respondents Department Distribution in CEME

Table4. 11 Respondents' Department Distributions in CEME

No	Department	Frequency	Percent
1	Electrical engineering	16	5.1
2	Electromechanical engineering	44	14.1
3	Mechanical engineering	8	2.6
4	Manufacturing engineering	4	1.3
5	Computer engineering	8	2.6
6	Software engineering	12	3.8
Total		92	29.5

Source: Own Survey, 2020

Table 4.11 shows that 90 (29.5%) of students are participate in the study from the College of Electrical and Mechanical Engineering in six departments.

4.1.12. Respondents Department Distribution in CAS

Table4. 12 Respondents' Department Distribution in CAS

No	Department	Frequency	Percent
1	Geology	24	7.7
2	Industrial chemistry	20	6.4
3	Food science and applied nutrition	8	2.6
Total		52	16.7

Source: Own Survey, 2020

Table 4.12 shows that 52 (16.7%) of students are participate in the study from the College of Applied Science in three departments.

4.2. Descriptive Characteristics of the Study Variables

4.2.1 Entrepreneurial Attitude of Students

Descriptive summary of f students' entrepreneurial attitude (N=Number of respondents, 312)

Table4. 13 Descriptive summary of students' entrepreneurial attitude

No	Entrepreneurial attitude	Mean	Std. Deviation
1	I want to start my own business.	3.12	1.131
2	I have an idea to start my own business after graduation.	3.01	1.150
3	I have a good and strong personality/motivation to start my own business.	4.89	.308
4	Entrepreneurship is an honorable career.	4.88	.328

Source: Own Survey, 2020

Table 4.13 above shows, responses to the items under entrepreneurial attitude indicates that students have the required motivation and thinks entrepreneurship is an honorable career ($X = 4.88$, Std. = 0.32): and students have the idea to start their own business ($X = 3.07$, Std. = 1.14).

4.2.2 Family back ground of Students

Descriptive summary of students' entrepreneurial family background (N=Number of respondents, 312)

Table4. 14 Family backgrounds

No	Family background	Mean	Std. Deviation
1	My family is currently engaged in business.	2.29	1.049
2	My family supports me financially to create my own business.	4.76	.426
3	My family morally encourages me to create my own business.	3.10	1.227
4	My family appreciates me running own business.	2.96	1.231

Source: Own Survey, 2020

Table 4.14 above shows, respondents have the financial support of their family to create their own business ($X = 4.76$, Std. = 0.426). On the other hand, respondents family engagement in business is reported less ($X = 2.29$, Std. = 1.05). Moral encouragement and appreciation by the family are reported to average ($X = 3.03$, Std. = 1.22).

4.2.3 Students Role Model

Descriptive summary of students' entrepreneurial role model (N=Number of respondents, 312)

Table4. 15 Students Entrepreneurial Role model

No	Role model	Mean	Std. Deviation
1	My role model became a shooting target for me to investigate proven ways of how to design, get funding and launch my start up.	2.39	1.062
2	I have an entrepreneurial role model in Ethiopia or elsewhere.	4.77	.422
3	My role model inspired me to create my own business.	3.09	1.266
4	My entrepreneur role model reoriented me to prioritize entrepreneurship over employment.	4.14	.854
5	My families are my role model to start my own business.	4.10	.901

Source: Own Survey, 2020

Table 4.15 above shows, respondents have entrepreneurial role model ($X = 4.77$, Std. = 0.42). Family has role model of their children can reorient their priorities ($X = 4.12$, Std. = 0.87).

4.2.4 Government Entrepreneurial Supporting Programs

Descriptive summary of students' government entrepreneurial supporting programs (N=Number of respondents, 312)

Table4. 16 Students' Government Entrepreneurial Supporting Programs

No	Government entrepreneurial supporting programs	Mean	Std. Deviation
1	The government entrepreneurship policy inspires me to create my own business.	4.77	.420
2	The government provides training or sharing experience about entrepreneurship to students with collaboration of countries at abroad.	3.10	1.314
3	The government creates a convenient working place for entrepreneurs.	3.30	1.167
4	The government has been creating marketing links for innovative entrepreneurs.	3.12	1.225
5	Government offers reliable revolving funds for innovative student commercial projects.	3.20	1.227

Source: Own Survey, 2020

Table 4.16 above shows, government entrepreneurship policy inspired to create their own business ($X = 4.77$, Std. = 0.42). Training provided, market link created, reliability of revolving fund by the government scored average ($X = 3.18$, Std. = 1.23).

4.2.5 Business Ecosystem

Descriptive summary of business ecosystem (N=Number of respondents, 312)

Table4. 17 Students' Entrepreneurial Business Ecosystem

No	Business ecosystem	Mean	Std. Deviation
1	Banks have good loan opportunities to entrepreneurs to start their business.	3.72	1.046
2	Ethiopian Investors invest their assets on student-generated commercial ideas.	4.75	.454
3	I know our market preferences are focused on innovative business startups than profit-margin-oriented trade transactions.	2.52	1.305
4	I know there are different innovator-investor platforms in our country.	3.49	1.024
5	Individual has easily access to participate in presentation about creative works or workshops in line with national platform.	2.24	1.118

Source: Own Survey, 2020

Table 4.17 above shows, investors invest their assets on student-generated commercial ideas ($X = 4.75$, Std. = 0.45). Innovator investor platforms score more than ($X = 3.61$, Std. = 1.03). Market preferences to startups than profit margin oriented business and access to participation in workshops scored less than average (Mean= 2.38, Std. = 1.21).

4.2.6 University Wide Entrepreneurial Support

Descriptive summary of f students' university wide support entrepreneurial (N=Number of respondents, 312)

Table4. 18 University Wide Entrepreneurial Support

No	University wide entrepreneurial support	Mean	Std. Deviation
1	Learning entrepreneurship course in AASTU helps me to become an entrepreneur.	3.74	1.023
2	Giving entrepreneurship course in the first semester of the first academic year students stimulates entrepreneurial attitude.	2.57	1.335
3	Entrepreneurial /business related examples are included in entrepreneurship course.	2.54	1.297
4	In AASTU, there are practicing entrepreneurial mentors that help to start my own business.	4.79	.409
5	AASTU encourages students to consider entrepreneurship.	4.77	.420
6	The education approach in AASTU is orientated for the development of entrepreneurial attitudes.	3.14	1.127

Source: Own Survey, 2020

Table 4.18 above shows, the presence of practicing entrepreneurial mentors and encouragement provided students in AASTU on entrepreneurial attitude reported

excellent ($X = 4.78$, $Std. = 0.41$). The extent of business-related examples inclusion and first-semester placement the course entrepreneurship scored less than average ($X = 2.55$, $Std. = 1.32$). The extent of learning entrepreneurship course in AASTU to make students entrepreneur scored ($X = 3.74$, $Std. = 1.02$). The extent of orientation of the education approach in AASTU for the development of entrepreneurial attitude scored ($X = 3.14$, $Std. = 1.13$).

4.3. Inferential Statistics

In this study the researcher used inferential analysis is concerned with the various tests of significance for normality and multicollinearity to determine the validity of data. To know the effect of independent (explanatory) variables (family background, role model, government entrepreneurial support programs, business ecosystem, and University-wide entrepreneurial support) on the dependent variable of the study (entrepreneurial attitude) the researcher has conducted simple and multiple linear regression analysis. Before doing the analysis, the assumptions of regression and correlation have been taken care of. As the questionnaire is of Likert type hence normality has not been tested (Clason & Dormody, 1994). The sample size is another major assumption. Though there is no common guideline, the sample size 312 which is more than enough to go for regression analysis as per Pallant (2013) requirements. Another major assumption is multicollinearity which is also checked below. The assumption of linearity of relationship also checked.

4.3.1. Correlations Analysis

Correlations techniques are generally intended to answer three questions about two variables: 'Is there a relationship between the two variables? What is the direction of the relationship? And what is the magnitude?' The Pearson's correlation coefficients, one of the most known measures of association is a statistical value ranging from -1.0 and +1.0 which indicates the strength and direction of the association between the study variables. A correlation coefficient of +1 indicates that two variables are perfectly positively related, while a correlation coefficient of -1 shows that two variables are perfectly negatively related. On the other hand, a correlation coefficient of 0 indicates that there is no linear relationship between the two variables (Cohen, Marion & Morrison, 2007).

Thus, in this study, the correlation between independent variables and the dependent variable was calculated and presented in the following table.

Even though there is no hard rule to interpret the correlation value, the guideline of correlation interpretation suggested by Cohen (1988) as cited by Pallant (2013), correlation value 0.10 to 0.29 is small, 0.30 to 0.49 is medium, and 0.50 up to 1.0 is large correlations. According to this category, therefore, the study in the above table 4.19 shows that a statistically large and positive correlation between independent variables and the dependent variable.

Table4. 19 Correlations of all Variables

Inter correlations, Means and Std. Deviations For five Variables (N=312)									
No	All Variables	1	2	3	4	5	6	Mean	Std. Deviation
1	entrepreneurial attitude	1						3.9744	.52370
2	Family background	.883**	1					3.2764	.68919
3	Role model	.700**	.741**	1				3.6981	.59494
4	Government entrepreneurial supporting programs	.757**	.763**	.672**	1			3.4974	.76817
5	Business ecosystem	.572**	.712**	.660**	.705**	1		3.3468	.69550
6	University wide entrepreneurial support	.586**	.625**	.593**	.725**	.892**	1	3.5919	.65157

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

Source: Own Survey, 2020

From the above table 4.19 shows correlation analysis which measured the relationship between entrepreneurial attitude and family background. From the results shown in table 4.19 generally, family background influences students' entrepreneurial attitude. Family background has correlated at 0.883 with entrepreneurial attitude, role model has correlated at 0.700 with entrepreneurial attitude, government entrepreneurial supporting programs has correlated at 0.757 with entrepreneurial attitude; business ecosystem has correlated at 0.572 with entrepreneurial attitude, university-wide entrepreneurial support has correlated at 0.586 with entrepreneurial attitude, role model has correlated at 0.741 with family background, government entrepreneurial supporting programs has correlated

at 0.763 with family backgrounds; business ecosystem has correlated at 0.712 with family backgrounds, university-wide entrepreneurial support has correlated at 0.625 with family background, government entrepreneurial supporting programs has correlated at 0.672 with role model, business ecosystem has correlated at 0.660 with role model, university-wide entrepreneurial support has correlated at 0.593 with role model, business ecosystem has correlated at 0.705 with government entrepreneurial supporting programs, university-wide entrepreneurial support has correlated at 0.725 with government entrepreneurial supporting programs, university-wide entrepreneurial support has correlated at 0.892 with business ecosystem. Therefore the correlation of dependent variable (entrepreneurial attitude) within each independent variable and independent variables with independent variables has a large correlation because all correlations are greater than 0.50 to 1.0 it implies that there is a large correlation Cohen (1988) as cited by Pallant (2013).

4.3.2. Testing Regression Assumptions

Before doing regression analysis testing regression assumption is paramount importance. In statistical analysis, all parametric tests assume certain characteristics of the data, also known as assumptions. Violation of these assumptions changes the conclusion of the research and interpretation of the results. The following are the data assumptions commonly found in statistical research:

A. Normality Assumption

Assumptions of normality: Most of the parametric tests require that the assumption of normality be met. Normality means that the distribution of the test is normally distributed (or bell-shaped) with 0 means, with 1 standard deviation and a symmetric bell-shaped curve. The normality of variables is assessed by either statistical or graphical methods. Two components of normality are skewness and kurtosis. Skewness has to do with the symmetry of the distribution; a skewed variable is a variable whose mean is not in the center of the distribution. Kurtosis has to do with the peakedness of a distribution; a distribution is either too peaked (with short, thick tails) or too flat (with long, thin tails).

In a normal distribution, the values of skewness are 0. If a distribution has values of skew above or below 0 then this indicates a deviation from normal (Field, 2006). Skewed distributions are not symmetrical and instead, the most frequent scores (the tall bars on

the graph) are clustered at one end of the scale. A skewed distribution can be either positively skewed (the frequent scores are clustered at the lower end and the tail points towards the higher or more positive scores) or negatively skewed (the frequent scores are clustered at the higher end of and the tail points towards the lower more negative scores) (Field, 2005).

As we have seen from the below table 4.20, the skewness approaches or around to Zero and normal distribution, also table 4.20 show the data is almost normal. All variables were found to be normal.

Table4. 20 Test of Normality

Variable	Skewness Statistic	Std Skewness Error
Entrepreneurial attitude	.151	.138
Family background	.594	.138
Role model	-.067	.138
Government entrepreneurial supporting programs	-.057	.138
Business ecosystem	.551	.138
University wide entrepreneurial support	.200	.138

Source: Own Survey, 2020

Graphical method of assessing normality

A histogram of a variable shows rough normality, and a histogram of residuals, if normally distributed, is often taken as evidence of normality of the entire variable. Frequency histograms are an important graphical device for assessing normality, especially with the normal distribution as an overlay, but even more helpful than frequency histograms are expected normal probability plots and detrended expected normal probability plots. In these plots, the scores are ranked and sorted; then an expected normal value is computed and compared with the actual normal value for each case. The expected normal value is the z score that a case with that rank holds in a normal distribution; the normal value is the z score it has in the actual distribution. If the actual distribution is normal, then the points for the cases fall along the diagonal running from lower left to upper right, with some minor deviations due to random processes.

Deviations from normality shift the points away from the diagonal (Tabachnick and Fidell, 2013).

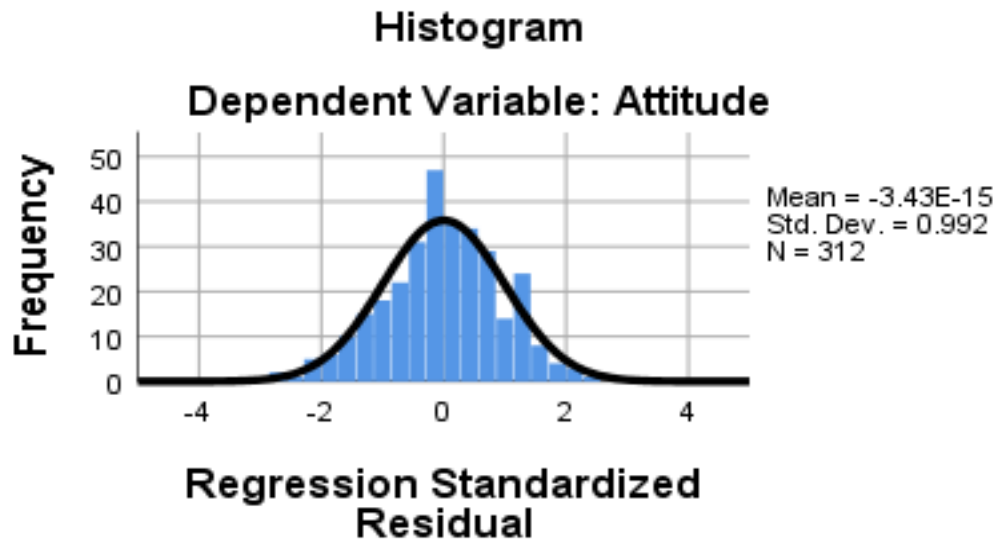


Figure 4. 1 Regression Residual Histogram

A. Normal probability plot

The normal probability plot, also called a P-P plot, is an alternative method, plotting observed cumulative probabilities of occurrence on the standardized residuals on the Y-axis and of expected normal probabilities of occurrence on the X-axis, such that a 45-degree line will appear when the observed conforms to the normally expected and the assumption of points above and below the horizontal 0 line should be random (Garson, 2012).

Normal P-P Plot of Regression Standardized Residual

Dependent Variable: Attitude

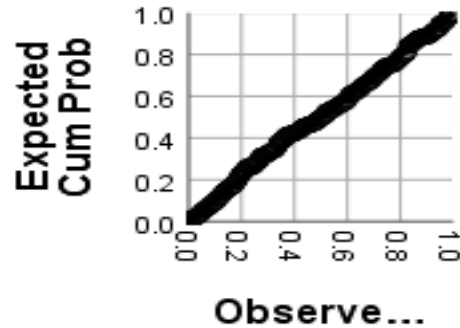


Figure 4. 2 Regression Residual

B. Linearity Assumption

A scatter plot is a plot or graph of two variables that show how the score for an individual variable associated with its score on the other variable. If the correlation is high positive, the plotted points will be close to a straight line (the linear regression line) from the lower-left corner of the plot to the upper right. The linear regression line will slope downward from the upper left to the lower right if the correlation is highly negative. For correlations near zero, the regression line will be flat with many points far from the line (Tabachnick and Fidell, 2013).

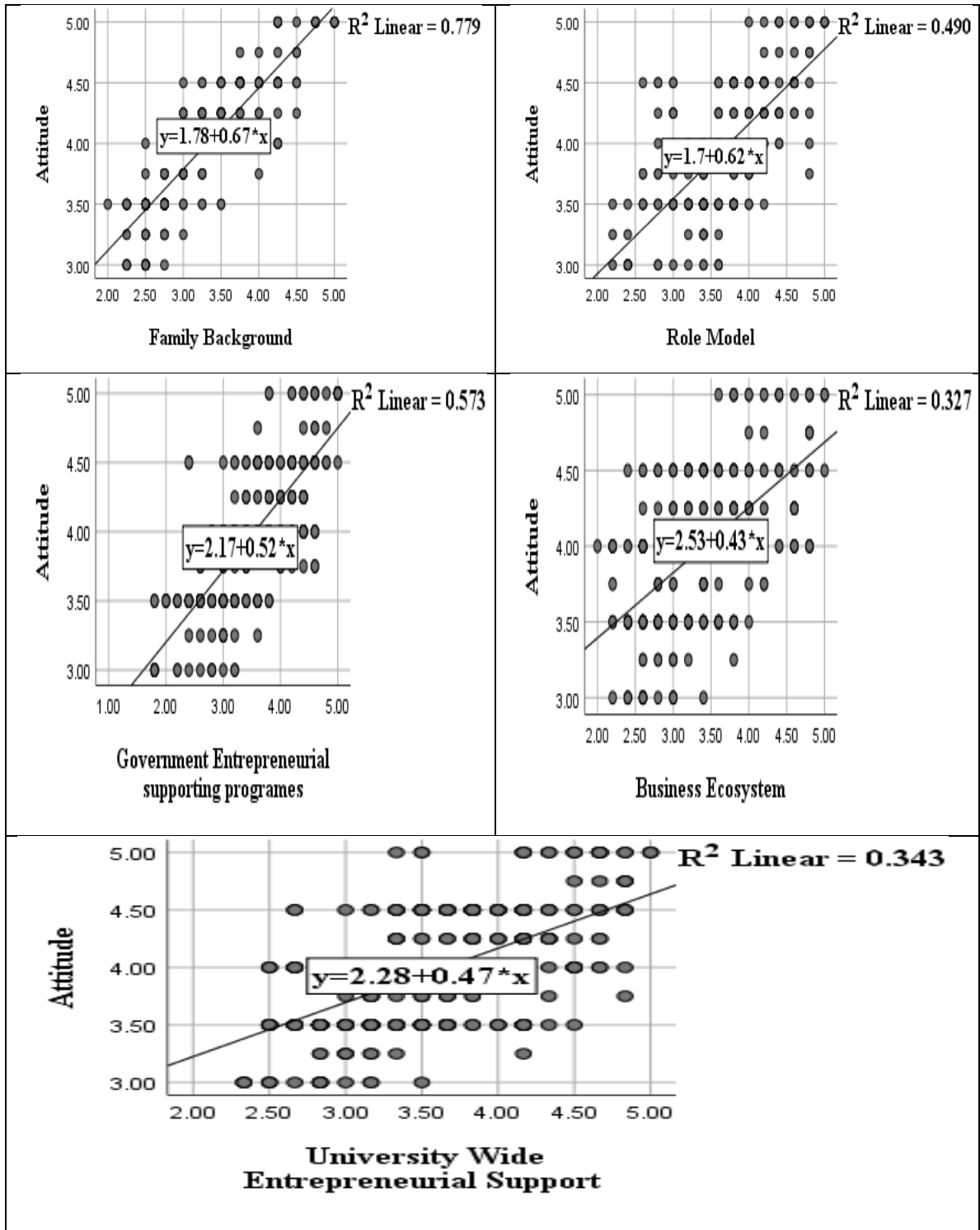


Figure 4. 3 Linearity

Accordingly, the above graphs indicate the study found a linear relationship between independent variables and the dependent variable. Therefore, these regression assumptions were confirmed, and it is possible to perform a correlation test and regression analysis in this study.

C. Multicollinearity Assumption

Multicollinearity: Multicollinearity means that the variables of interest are highly correlated, and high correlations should not be present among variables of interest. To test the assumption of multicollinearity, VIF, and Condition indices can be used, especially in regression analyses. A value of VIF >10 indicates multicollinearity is present and the assumption is violated. On the other hand, the assumption of multicollinearity was also checked in this study. Multicollinearity refers to the relationship between the independent variables. Multiple regressions don't like multicollinearity or singularity. Tolerance is an indicator of how much of the variability of the specified independent is not explained by the other independent variables in the model. Multicollinearity exists when a tolerance value of less than 0.10 or a VIF value of above 10 (Pallant, 2013).

Accordingly, table 4.37: shows that the tolerance values of all independent variables are greater than the minimum cut-off point (0.10) and VIF values of all variables are less than 10 or maximum cut-off points. Therefore there is no possibility of a multicollinearity problem in this study or regression model.

4.3.3. Regression Analysis

According to Muijis (2004), as cited by Cohen, Marion, and Morrison (2007), the R square value less than 0.1 is a poor fit, 0.11 to 0.3 is modest fit, 0.31 and 0.5 is moderate fit, and greater than 0.5 is a strong fit.

Whereas correlation is used to measure the size and direction of the linear relationship between two variables, regression is used to predict a score on one variable from a score on the other. In a bivariate (two-variable) regression (simple linear regression) where Y is predicted from X, a straight line between the two variables is found. The best-fitting straight line goes through the means of X and Y and minimizes the sum of the squared distances between the data points and the line (Tabachnick & Fidell, 2013).

4.3.4. Simple Linear Regression

Simple regressions enable us to predict and weight the relationship between one independent variable and the dependent variable (Cohen, Marion and Morrison, 2007). As a result, in this study, Simple linear regression analysis was carried out in order to investigate the effects of independent variables on the dependent variable. In determining regression among the study variables, coefficient of determination (R-square), analysis of variance (ANOVA), and beta weight (β) or standardized coefficient were used. R square used to know how much variance in the dependent variables is explained by the independent variables in the regression while ANOVA used to check the statistical significance of the model. Beta weighting (standardized coefficient analysis) is used to know the amount of standard deviation unit of change in the dependent variable for each standard deviation unit of change in the independent variable. This enables the researcher to know the unique contribution of each independent variable.

1. The Effect of Family Background on Entrepreneurial Attitude

Table4. 21 Model Summary of Family Background

Model Summary					
Predictor	Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
Family back ground	1	.883 ^a	.779	.779	.24646
a. Predictors: (Constant), Family back ground					

Source: Own Survey, 2020

As observed from table 4.21 R-square is recorded at 0.779. This implies that 77.9% of the variance in entrepreneurial attitude is caused by the family background. This is a strong fit according to Cohen (1998), model.

Table4. 22 ANOVA Analysis of Family Background

ANOVA ^a							
Predictor	Model	Sum of Squares	df	Mean Square	F	Sig.	
Family background	1	Regression	66.465	1	66.465	1094.214	.000b
		Residual	18.830	310	.061		
		Total	85.295	311			
a. Dependent Variable: Attitude b. Predictors: (Constant), Family background							

Source: Own survey, 2020

The above tables 4.22, the ANOVA score shows the overall regression model was significant, $F(1, 310) = 1094.214, P < 0.001$.

Table 4.23 Coefficient Analysis of Family background

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	1.777	.068		26.169	.000
Family back ground	.671	.020	.883	33.079	.000

a. Dependent Variable: Attitude

Source: Own survey, 2020

The model can be built from the table 4.23 above, $Y = \beta_0 + \beta_1 \chi_1 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = Family background

β_0 = Model constant

e = error term

Entrepreneurial attitude = $1.78 + 0.88$ (family background) + 0.246

2. The effect of Role Model on Entrepreneurial Attitude

Table 4.24 Simple Linear Regression of Role model

Model Summary					
Predictor	Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
Role model	1	.700a	.490	.488	.37457

a. Predictors: (Constant), Role model

Source: Own Survey, 2020

As observed from table 4.24, R-square is recorded at 0.49. This implies that 49% of the variance in entrepreneurial attitude is caused by role models. This is moderate fit according to Cohen (1998), model.

Table4. 25 ANOVA Analysis of Role Model

ANOVA ^a							
Predictor	Model		Sum of Squares	df	Mean Square	F	Sig.
Role Model	1	Regression	41.802	1	41.802	297.951	.000b
		Residual	43.493	310	.140		
		Total	85.295	311			
a. Dependent Variable: Attitude			b. predictors: (Constant), Role model				

Source: Own survey, 2020

As indicated in the above tables 4.25, the ANOVA score shows the overall regression model was significant, $F(1, 310) = 297.951, P < 0.001$.

Table4. 26 Coefficient Analysis of Role model

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	1.695	.134		12.680	.000
Role model	.616	.036	.700	17.261	.000
a. Dependent Variable: Attitude					

Source: Own survey, 2020

The model can be built from the table 4.26 above, $Y = \beta_0 + \beta_1 \chi_1 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = Role model

β_0 = Model constant

e = error term

Entrepreneurial attitude = 1.75 + 0.70 (role model) + 0.375

3. The Effect of Government Entrepreneurial Supporting Program on Students

Table4. 27 Simple Linear Regression of Government Entrepreneurial Support Program

Model Summary					
Predictor	Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
Entrepreneurial government supporting programmes	1	.757a	.573	.572	.34265
a. Predictors: (Constant), Entrepreneurial government supporting programmes.					

Source: Own Survey, 2020

As observed from table 4.27 R-square is recorded 0.573. This implies that 57.3% of the variance in entrepreneurial attitude is caused by the government entrepreneurial support program. This is a strong fit according to Cohen (1998), model.

Table4. 28 Analysis of Government Supporting Entrepreneurial Programs

ANOVA ^a							
Predictor	Model	Sum of Squares	df	Mean Square	F	Sig.	
Entrepreneurial government supporting programmes	1	Regression	48.898	1	48.898	416.476	.000b
		Residual	36.397	310	.117		
		Total	85.295	311			
a. Dependent Variable: Attitude b. Predictors: (Constant), Government entrepreneurial supporting programs							

Source: Own survey, 2020

As indicated in the above tables 4.28, the ANOVA score shows the overall regression model was significant, $F(1, 310) = 416.476, P < 0.001$.

Table4. 29 Coefficient Analysis of Government Entrepreneurial Supporting Programs

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	2.169	.091		23.950	.000
Government supporting entrepreneurial programmes	.516	.025	.757	20.408	.000
a. Dependent Variable: Attitude					

Source: Own survey, 2020

The model can be built from the table 4.29 above, $Y = \beta_0 + \beta_1 \chi_1 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = Government supporting entrepreneurial programs

β_0 = Model constant

e = error term

Entrepreneurial attitude = $2.17 + 0.77$ (government supporting entrepreneurial programs) + 0.343

4. The Effect of Business ecosystem on Students Entrepreneurial Attitude

Table 4.30 Simple Linear Regression of Business Ecosystem

Model Summary					
Predictor	Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
Business ecosystem	1	.572a	.327	.325	.43016

Source: Own Survey, 2020

As observed from table 4.30, R-square is recorded 0.327. This implies that 32.7% of the variance in entrepreneurial attitude is caused by the business ecosystem. This is moderate fit according to Cohen (1998), model.

Table 4.31 ANOVA Analysis of Business Ecosystem

ANOVA ^a							
Predictor	Model	Sum of Squares	df	Mean Square	F	Sig.	
Business Ecosystem	1	Regression	27.933	1	27.933	150.960	.000b
		Residual	57.362	310	.185		
		Total	85.295	311			

a. Dependent Variable: Entrepreneurial attitude b. Predictors: (Constant), Business ecosystem.

Source: Own survey, 2020

As indicated in the above tables 4.31, the ANOVA score shows the overall regression model was significant, $F(1, 310) = 150.960, P < 0.001$.

Table4. 32 Coefficient Analysis of Business Ecosystem

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	2.532	.120	.572	21.123	.000
Business ecosystem	.431	.035	.572	12.287	.000

a. Dependent Variable: Entrepreneurial attitude.

Source: Own survey, 2020

The model can be built from the table 4.32 above, $Y = \beta_0 + \beta_1 \chi_1 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = Business Ecosystem

β_0 = Model constant

e = error term

Entrepreneurial attitude = 2.53 + 0 .57 (Business Ecosystem) + 0.430

5. The effect of University-wide Entrepreneurial support on Entrepreneurial attitude

Table4. 33 Simple Linear Regression of University Wide Entrepreneurial Support

Model Summary					
Predictor	Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
University wide entrepreneurial support	1	.586a	.343	.341	.42502

Source: Own Survey, 2020

As observed from table 4.33, R-square is recorded 0.343. This implies that 34.3% of the variance in entrepreneurial attitude is caused by university-wide entrepreneurial support. This is moderate fit according to Cohen (1998), model.

Table4. 34 ANOVA Analysis of University Wide Entrepreneurial Support

ANOVA ^a							
Predictor	Model	Sum of Squares	df	Mean Square	F	Sig.	
University wide entrepreneurial support	1	Regression	29.296	1	29.296	162.177	.000b
		Residual	55.999	310	.181		
		Total	85.295	311			
a. Dependent Variable: Entrepreneurial attitude b. Predictors: (Constant), University wide entrepreneurial support							

Source: Own survey, 2020

As indicated in the above tables 4.34, the ANOVA score shows the overall regression model was significant, $F(1, 310) = 162.177, P < 0.001$.

Table4. 35 Coefficient Analysis of University Wide Entrepreneurial Support

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	2.282	.135		16.904	.000
University wide entrepreneurial support	.471	.037	.586	12.735	.000
a. Dependent Variable: Entrepreneurial attitude.					

Source: Own survey, 2020

The model can be built from the table 4.35 above, $Y = \beta_0 + \beta_1 \chi_1 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = University wide entrepreneurial support

β_0 = Model constant

e = error term

Entrepreneurial attitude = 2.28 + 0.59 (University wide entrepreneurial support) + 0.425

4.3.5. Simultaneous Multiple Linear Regressions

Multiple regressions enable us to predict and weight the relationship between two or more independent variables and the dependent variable (Cohen, Marion & Morrison, 2007). As a result, in this study, multiple linear regression analysis was carried out in order to investigate the effects of independent variables on the dependent variable. In

determining regression among the study variables, coefficient of determination (R-square), analysis of variance (ANOVA), and beta weight (β) or standardized coefficient were used. R square used to know how much variance in the dependent variables is explained by the independent variables in the regression while ANOVA used to check the statistical significance of the model. Beta weighting (standardized coefficient analysis) is used to know the amount of standard deviation unit of change in the dependent variable for each standard deviation unit of change in the independent variable. This enables the researcher to know the unique contribution of each independent variable.

Table4. 36 Simultaneous Multiple Regression analyses

Model Summary				
Model	R	R Square	Adjusted	Std. Error off the Estimate
1	.916 ^a	.838	.836	.21235
a. Predictors: (Constant), Family background, Role model, Government entrepreneurial supporting programs, Business ecosystem and University wide entrepreneurial support.				

Source: Own survey, 2020

Table 4.36 show, R-square is recorded 0.838. This implies that 83.8% of the variance in entrepreneurial attitude is caused by multiple regression analysis. This is a strong fit according to Cohen (1998), model.

Table4. 37 ANOVA Analysis of Simultaneous Multiple Regression

ANOVA ^a						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	71.497	5	14.299	317.125	.000 ^b
	Residual	13.798	306	.045		
	Total	85.295	311			
a. Dependent Variable: Attitude b. Predictors: (Constant), Family background, Role model, Government Entrepreneurial supporting programs, Business ecosystem, and University wide entrepreneurial support.						

Source: Own Survey, 2020

As indicated in the above tables 4.37, the ANOVA score shows the overall regression model was significant, $F(5, 306) = 317.125, P < 0.001$.

Table4. 38 Coefficient Analysis of Simultaneous Multiple Linear Regressions

Model	Unstandardized Coefficients		Standardized Coefficients	T	Sig.	Collinearity Statistics	
	B	Std. Error	Beta			Toleranc	VIF
(Constant)	1.470	.084		17.576	.000		
Family background	.623	.032	.820	19.173	.000	.289	3.460
Role model	.099	.032	.112	3.093	.002	.404	2.477
Government entrepreneurial supporting programs	.116	.028	.170	4.100	.000	.307	3.260
Business ecosystem	-.377	.043	-.500	-8.700	.000	.160	6.256
University wide entrepreneurial support	.265	.044	.330	6.025	.000	.176	5.680
a. Dependent Variable: Attitude							

Source: Own survey, 2020

The model can be built from the table 4.38 above, $Y = \beta_0 + \beta_1 \chi_1 + \beta_2 \chi_2 + \beta_3 \chi_3 + \beta_4 \chi_4 + \beta_5 \chi_5 + e$

Where: Y = Entrepreneurial Attitude

χ_1 = Family background, Role model, Government Entrepreneurial support programs, Business ecosystem and University wide entrepreneurial support

β_0 = Model constant

e = error term

Entrepreneurial attitude = 1.47 + 0.82 (Family background) + 0.11 (Role model) + 0.17 (Government Entrepreneurial Support programs) + -0.50 (Business Ecosystem) + 0.33 (University Wide Entrepreneurial Support) + 0.21

4.4. Discussion the results of the study findings and interview

1. Entrepreneurial Attitude

Table 4.13 above show, responses to the items under entrepreneurial attitude indicates that students have the required motivation and thinks entrepreneurship is an honorable career (X = 4.88, Std. = 0.32): and students have the idea to start their own business (X = 3.07, Std. = 1.14).

According to the explanation of the interviewed students' almost all they have a strong entrepreneurial attitude or interest and they also want to create their own business after

graduation, the interviewed students' also was recommended that students' have an entrepreneurial attitude by making new and persuasive innovation ideas and clearly explaining to the community by using different media, by using the opportunities of government entrepreneurial supporting programs, by collaborating with different investors, and taking loans from banks shall be creating their own business. Therefore, according to quantitative and qualitative results implication students' has a significant entrepreneurship attitude.

2. Family Background

Table 4.14 above shows, respondents have the financial support of their family to create their own business ($X = 4.76$, Std. = 0.426). On the other hand, respondents family engagement in business is reported less ($X = 2.29$, Std. = 1.05). Moral encouragement and appreciation by the family are reported to average ($X = 3.03$, Std. = 1.22). Therefore, the results of the study indicated the respondents' have financial support to their youth children it implies that financial support has a significant effect on students' entrepreneurial attitude. On the other hand, the respondents' family business engagement has a less significant effect on students' entrepreneurial attitude, moral encouragement, and appreciation by family has an average significant effect on their youth children entrepreneurial attitude.

According to (Morrison, 2000; Kirkwood, 2007), many Scholars have been suggested that there is a strong correlation between family background and participation in entrepreneurial activity. The common premise is that a good influence brought by family about entrepreneurs who contribute to higher entrepreneurial tendency to a start-up business. Other Study also conducted across countries between Italian and Argentinean among undergraduate students and the study found that entrepreneurial family background has a bigger impact on the tendency towards starting own business (Postigo, Lacobucci, and Tamborini, 2006).

Generally, the finding of this study and (Morrison, 200; Kirkwood, 2007; Postigo, Lacobucci, and Tamborini, 2006) study results are the same, which means family background has a significant effect on the students' entrepreneurial attitude.

3. Role Model

Table 4.15 above shows, respondents have entrepreneurial role model ($X = 4.77$, Std. = 0.42). Family has role models of their children can reorient their priorities ($X = 4.12$, Std. = 0.87). Therefore, the results of the findings as indicated by role models have a significant effect on students' entrepreneurial attitude and to create their own business.

The finding of Olalekan and Adedayo (2019), study, concluded role model has a significant effect on students' entrepreneurial attitude. This implies that the result of this study and the result of Olalekan and Adedayo (2019) study have the same finding. It indicates that role models have a significant effect on students' entrepreneurial attitude.

4. Government Entrepreneurial Support Programs

Table 4.16 above shows, government entrepreneurship policy inspired to create their own business ($X = 4.77$, Std. = 0.42). Training provided, market link created, reliability of revolving fund by the government scored average ($X = 3.18$, Std. = 1.23). Therefore, the result of the findings as indicated by government entrepreneurial supporting programs are significantly affect students entrepreneurial attitude.

On the other hand, according to the explanation of the interviewed students government entrepreneurial support, opportunities that availed by the government, collaborate with different investors that availed by the government, our country's economic reform, the government provides finance, giving entrepreneurial training and others governmental assistant programs' was significantly affect students' to create their business after graduation. The implication of these two findings indicates government entrepreneurial support programs have a significant effect on students' entrepreneurial attitude.

5. Business Ecosystem

Table 4.17 above shows, investors invest their assets on student-generated commercial ideas ($X = 4.75$, Std. = 0.45). Innovator investor platforms score more than ($X = 3.61$, Std. = 1.03). Market preferences to startups than profit margin oriented business and access to participation in workshops scored less than average ($X = 2.38$, Std. = 1.21). Therefore, the result of the findings as indicated business ecosystems are significantly affected students' entrepreneurial attitude.

According to the explanations of technology transfer director according to the interviewed students explanation our country's economic reform was also significantly affect to create their business after graduation, the opportunities of the government entrepreneurial supporting programs' that changes their life span to become an entrepreneur, because of the government provided finance, training, and other assistance to those who are self-employed or innovators, the interviewed students' explanations also implies they know how to secure funds from banks, investors, and crowd funders to start up their own business after graduation, they know also how to create partnerships with investors if they have a viable or commercialized innovative entrepreneurial idea to the market and they also explains they can create partnerships by using different platforms and social media to introducing their commercialized idea with different investors by the help of stakeholders and experienced entrepreneurs. The result of the study and the explanation of the interviewed students imply that the business ecosystem has a significant effect on the students' entrepreneurial attitude. , the challenges of entrepreneur/ innovator students' in AASTU are lack of strategic view, bureaucracy, attitude, university culture, limited infrastructure/facility and shortage of finance are the main challenges.

According to the explanations of technology transfer director, the challenges of entrepreneur/ innovator students' in AASTU are lack of strategic view, bureaucracy, attitude, university culture, limited infrastructure/facility and shortage of finance are the main challenges.

6. University wide Entrepreneurial Support

Table 4.18 above shows, the presence of practicing entrepreneurial mentors and encouragement provided students in AASTU on entrepreneurial attitude reported excellent ($X = 4.78$, Std. = 0.41). The extent of business-related examples inclusion and first-semester placement the course entrepreneurship scored less than average ($X = 2.55$, Std. = 1.32). The extent of learning entrepreneurship course in AASTU to make students entrepreneur scored ($X = 3.74$, Std. = 1.02). The extent of orientation of the education approach in AASTU for the development of entrepreneurial attitude scored ($X = 3.14$,

Std. = 1.13). Therefore as the result of the findings as indicated university-wide entrepreneurial supports are significantly affected students' entrepreneurial attitude.

The explanation of technology transfer director, the opportunities of entrepreneur/innovator students' in AASTU are university resources as being the university student, the ongoing establishment of dedicated centers (innovation and incubation centers) and the availability of dedicated technical assistances are some of the opportunities in AASTU for entrepreneur/innovator students.

The supporting programs of AASTU for entrepreneur /innovator students' there are an exclusive yearly students innovation call, following the call the selected projects are supported with materials for product development, workshop facility provision, technical advisors/mentors are assigned, continuous awareness creation (trainings, group discussions, industry visits), awarding upon their success on innovation competition pitching days and creating a link with funders are some of the supporting programs of AASTU to innovator/entrepreneur students'.

The result of the study findings and the explanations of the interviewed students' and the interviewed director of technology transfer that implies university-wide entrepreneurial supports have a significant effect on students' entrepreneurship attitude.

CHAPTRE FIVE

5. SUMMARY, CONCLUSION AND RECOMMENDATION

5.1. Summary of Major Findings

5.1.1. Family Background

From the findings majority of the respondents indicated family background impacted positively correlation on students' entrepreneurial attitude. From Pearson's correlation coefficient, there is found to be a positive correlation and significantly related between family background and entrepreneurial attitude and with correlation figure of 1094.214, $P < 0.001$, $R^2 = 0.779$. From regression model, a unit increases family background will lead to a 0.779 increases in entrepreneurial attitude of students. This implies that family background account for 77.9% of variations in students' entrepreneurial attitude.

5.1.2. Role Model

From the findings majority of the respondents indicated role model impacted positively correlation on students' entrepreneurship attitude. From Pearson's correlation coefficient, there is found to be a positive correlation and significantly related between role model and entrepreneurial attitude with correlation figure of 297.951, $P < 0.001$, $R^2 = 0.490$. From regression model, a unit increases role model will lead to a 0.490 increases in entrepreneurial attitude of students. This implies that role model account for 49% of variations in students' entrepreneurial attitude.

5.1.3. Government Entrepreneurial Supporting Programs

From the findings majority of the respondents indicated government entrepreneurial supporting programs impacted positively correlation on students' entrepreneurial attitude. From Pearson's correlation coefficient, there is found to be a positive correlation and significantly related between government entrepreneurial supporting programs and entrepreneurial attitude with correlation figure of 416.476, $P < 0.001$, $R^2 = 0.573$. From regression model, a unit increases government entrepreneurial supporting programs will lead to a 0.573 increases in entrepreneurial attitude of students. This implies that role model account for 57.3% of variations in students' entrepreneurial attitude.

5.1.4. Business Ecosystem

From the findings majority of the respondents indicated business ecosystem impacted positively correlation on students' entrepreneurial attitude. From Pearson's correlation coefficient, there is found to be a positive correlation and significantly related between business ecosystem and entrepreneurial attitude with correlation figure of 150.960, $P < 0.001$, $R^2 = 0.327$. From regression model, a unit increases business ecosystem will lead to a 0.327 increases in entrepreneurial attitude of students. This implies that business ecosystem account for 32.7% of variations in students' entrepreneurial attitude.

5.1.5. University Wide Entrepreneurial Support

From the findings majority of the respondents indicated university wide entrepreneurial support impacted positively correlation on students' entrepreneurial attitude. From Pearson's correlation coefficient, there is found to be a positive correlation and significantly related between university wide entrepreneurial support and entrepreneurial attitude with correlation figure of 162.177, $P < 0.001$, $R^2 = 0.343$. From regression model, a unit increases university wide entrepreneurial support will lead to a 0.343 increases in entrepreneurial attitude of students. This implies that university wide entrepreneurial support account for 34.3% of variations in students' entrepreneurial attitude.

5.2. Conclusion

The research examined factors affecting students' attitude towards entrepreneurship: the case of Addis Ababa science and Technology University graduating students and the following findings were obtained:

The correlation analysis result indicated that there was strong association among the study variables however family background and government entrepreneurial supporting programs explained 77.9% and 57.3% of the variation in students' entrepreneurial attitude respectively. In addition role model showed that there was moderate association of 49% variation in students' entrepreneurial attitude. In the other side business ecosystem and university wide entrepreneurial support explained showed modest association of 32.7% and 34.3% variation in students' entrepreneurial attitude respectively.

The simultaneous multiple regression result reported that 83.6% of the variation in students' entrepreneurial attitude is explained by the proposed model. This implies that there is strong association among the study variables.

5.3.Recommendation

Based on the finding of the study, the following recommendations are forwarded to improve more the students' entrepreneurial attitude.

- ✓ Family of the students should financially support and morally encourage their youth children to enhance their entrepreneurial attitude.
- ✓ Students shall develop a good entrepreneurial attitude towards entrepreneurship.
- ✓ The role models such as family, stakeholders, investors, and other influential individuals shall provide their experience to initiate students to bring their mindset towards entrepreneurship.
- ✓ The government should support students financially who have an innovative idea using the national indigenous economic reform, providing vocational training, allocate inspiring budgets, make experience sharing programs, revise the higher education curriculum to provide adequate knowledge and skill to enhance their entrepreneurial attitude.
- ✓ Investors and financial institutions (banks, microfinance, etc.) should support students by motivating them to become entrepreneurs and enhance their business ecosystem.
- ✓ The university should give training, active the incubation centers, allocate better entrepreneurial budget, provide real-time entrepreneurial experiences sharing with other entrepreneurs that found in our university, country and abroad
- ✓ Revise higher education curriculum to provide adequate knowledge, skill, and attitude about entrepreneurship.

5.4. Future Research Direction

This study limits itself to five variables, which are simultaneous multiple regression results reported that 83.6% of the variation in students' entrepreneurial attitude is explained by the proposed model. That means 16.4% is explained by other variables that are not included in this study and the simultaneous multiple regression business ecosystems result in the standardized coefficients beta is shows a negative result, therefore the future researcher shall be carried out.

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APPENDIX

Addis Ababa Science and Technology University
College of Natural and Social Science
Department of Business Management
Master of Business administration (MBA) Program
Graduate studies MBA Program

Dear respondents:

My name is Wallelign Wondie, a graduating class master student in Master of Business Administration (MBA) at Addis Ababa Science and Technology University. Currently, I am conducting research work entitled "Factors affecting students' attitude towards entrepreneurship ".Therefore, this questionnaire is designed to gather data about your opinions on the items provided. Hence, would like to you have at most opinion on the questions stated. The purpose of this study is purely academic these, the responses will be treated in strict confidentiality and respondent will be kept anonymous.

Instruction:

Please put a tick mark (√) and write your opinion on the space provided.

I thank you!

Should you contact me for any question in this regard, I am easily researched cell: 09 13 38 10 43 OR Email: wondiewalleign@gmail.com

Part 1: Demographic profile

1.1. Gender

Female	Male
53	259

1.2. Age

From 18-25	From 26-35	Above 35
255	33	24

1.3. Year of study

Undergraduate		Postgraduate
4 th	5 th	2 nd year
73	186	53

1.4. Family education level (Father and Mother)

No formal education	Read and write	High school completed	First degree	Second degree	Third degree and above
77	45	576	69	45	20

1.5. Family Employment background

Agriculture	Government Employed	Private Employed	Private Business Owner	Others, Please specify
25	28	36	49	12

1.6. Average family monthly income

Less than 1,000 Birr	Between 1,001 to 5,000 Birr	Between 5,001 to 10,000 Birr	Greater than 10,000 Birr
49	73	113	77

1.7. Are your family trader?

Yes	No
65	247

1.8. Have you ever taken any training on entrepreneurship or related?

Yes	No
158	154

1.9. College and Departments

College of Biological and Chemical Engineering				College of Applied Science		
Biotechnology	Food processing Engineering	Chemical Engineering	Environmental Engineering	Geology	Industrial chemistry	Food science and Applied nutrition
3	3	6	8	6	5	2

College of Architecture and Civil Engineering					
Architecture	Urban planning and Design	Civil Engineering	CTM	Water supply and sanitary Engineering	Mining Engineering
5	1	2	6	7	1

College of Electrical and Mechanical E engineering					
Electrical Engineering	Electro mechanical Engineering	Mechanical Engineering	Manufacturing Engineering	Computer Engineering	Software Engineering
4	10	2	1	2	3

Part 2: Substantive part

NB: Indicate your agreement or disagreement with each of these statements

Strongly Disagree Disagree Neutral Agree Strongly agree
 1 2 3 4 5

No	Research questionnaires	Likert scale measurement type				
		1	2	3	4	5
		Strongly disagree	Disagree	Neutral	Agree	Strongly Agree
Attitudes towards entrepreneurship						
1	I want to start my own business.					
2	I have an idea to start my own business after graduation.					
3	I have a good and strong personality/motivation to start my own business.					
4	Entrepreneurship is an honorable career.					
Family backgrounds						
5	My family is currently engaged in business.					
6	My family supports me financially to create my own business.					
7	My family morally encourages me to create my own business.					
8	My family appreciates me running on business.					
Role models						
9	My role model became a shooting target for me to investigate proven ways of how to design, get funding and launch my start up.					
10	I have an entrepreneurial role model in Ethiopia or elsewhere.					
11	My role model inspired me to create my own business.					
12	My entrepreneur role model reoriented me to prioritize entrepreneurship over employment.					
13	My families are my role model to start my own business.					
Entrepreneurial government supporting programmes						
14	The government entrepreneurship policy inspires me to create my own business.					
15	The government provides training or sharing experience about entrepreneurship to students with collaboration of countries at abroad.					
16	The government creates a convenient working place for entrepreneurs.					
17	The government has been creating marketing links					

	for innovative entrepreneurs.					
18	Government offers reliable revolving funds for innovative student commercial projects.					
Business ecosystem						
19	Banks have good loan opportunities to entrepreneurs to start their business.					
20	Ethiopian Investors invest their assets on student-generated commercial ideas.					
21	I know our market preferences are focused on innovative business startups than profit-margin-oriented trade transactions.					
22	I know there are different innovator-investor platforms in our country.					
23	Individual has easily access to participate in presentation about creative works or workshops in line with national platform.					
Entrepreneurial University-wide Support						
24	Learning entrepreneurship course in AASTU helps me to become an entrepreneur.					
25	Giving entrepreneurship course in the first semester of the first academic year students stimulates entrepreneurial attitude.					
26	Entrepreneurial /business related examples are included in entrepreneurship course.					
27	In AASTU, there are practicing entrepreneurial mentors that help to start my own business.					
28	AASTU encourages students to consider entrepreneurship.					
29	The education approach in AASTU is orientated for the development of entrepreneurial attitudes.					

Part 3: Open ended questions

1. Any idea or suggestion factors affecting students' attitude towards entrepreneurship?

2. Your recommend to improve students' attitude towards entrepreneurship?

Part 4: Interview Questions for students

1. How do you evaluate your entrepreneurial attitude?

2. What could you recommend to graduating students to have an attitude of entrepreneurship?

3. What are the practical challenges of graduating students to improve their attitude of entrepreneurship?

4. Do you know how to secure funding [banks, investors, and crowd funders etc.] for your start up, if you have any?

5. Are there ways you know of partnering with investors in case you have a viable innovative entrepreneurial idea for the market?

6. How do you think does the indigenous economic reform of Ethiopia affect your entrepreneurial opportunity?

7. Do you believe the future belongs to entrepreneurs or job seekers?

Part 5: Interview Questions for Technology Transfer Directorate

1. What are the challenges of entrepreneurs/ innovator students in AASTU?

2. What are the opportunities of entrepreneurs/ innovator students' in AASTU?

3. What are the supporting programs of your office to entrepreneurs/ innovator students' in AASTU?

4. What are the factors that influence entrepreneur/innovator students' in AASTU?

