

Commerce Faculties: The hidden pipeline of entrepreneurs, a model of entrepreneurial intention



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Declaration of Authorship

I, Marlin Jacquae Hoffman, the undersigned hereby declare that Commerce Faculties: The hidden pipeline of entrepreneurs, a model of entrepreneurial intention, is my own original work and that it has not been submitted before for any degree or examination in any other university and that all the resources I have used or quoted have been indicated and acknowledged as complete references.

Marlin Jacquae Hoffman, April 2018

Signature



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I take this opportunity to thank my God Almighty for opening my mind to the idea, carrying me through all the challenges and granting me this occasion for spiritual growth that has changed me for the rest of my days.

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Abstract

Entrepreneurs and entrepreneurship have been the focus of economic development for the past 22 years. The aim is to spark economic growth that will be sustainable for the years to come. The current state of entrepreneurship will be better understood when the economic, educational and political past of black entrepreneurship is unpacked. Blacks constitute the majority of the South African population and South Africa requires entrepreneurs to reach its goals stipulated in the National Development Plan (NDP) 2030. Entrepreneurial education is vital to the development of entrepreneurs to enter the economy, which would alleviate unemployment and ensure economic growth, as many other countries have done in the past. Commerce faculties that offer entrepreneurship education are the focus of this study to determine the effect of four cognitive factors on the entrepreneurial intention of students. These four factors are attitude towards entrepreneurship, role models, entrepreneurial leaders, and resources and opportunities within commerce faculties. This study uses the Theory of Planned Behaviour as a model to determine entrepreneurial intention. This theory has been proven to be a sound instrument to use when determining intention and behaviour. The study took place at the University of the Western Cape's Economic and Management Science Faculty (School of Business and Finance), the University of Cape Town's Faculty of Commerce, Stellenbosch University's Faculty of Economic and Management Sciences and Cape Peninsula's University of Technology's Business and Management Faculty.

The data was collected by using a self-administered questionnaire which was designed for the purpose of this study which was tested for reliability and validity. The population size was 240 from the various institutions mentioned previously. SPSS 24 was used for the statistical data analysis.

There findings were that attitude towards entrepreneurship and resources and opportunities were statistically significant in affecting or influencing entrepreneurial intention. The model explained 57.6% of the variance in entrepreneurial intention.

Entrepreneurship education should be seriously considered as a tool to influence entrepreneurial intention as the study showed that entrepreneurship education can and will influence entrepreneurial intention. This implies that the higher education institutions are the custodians for future entrepreneurs in the education they provide and the manner in which the entrepreneurship education is presented.

Keywords:

Entrepreneurs, entrepreneurship, entrepreneurial intention, entrepreneurial education, commerce faculty, cognitive factors



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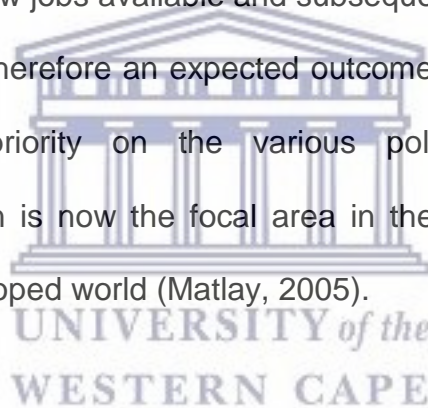


Chapter 1

1 Introduction and background

1.1 Introduction

South Africa, like many other countries around the world, has identified entrepreneurship as the vehicle to alleviate unemployment and stimulate economic growth. Fal, Sefolo, Williams, Herrington, Goldberg and Klaasen (2010) support this by stating that entrepreneurship is a solution to eradicate the challenges of impoverishment and unemployment and to generate new markets and firms, which increases the number of new jobs available and subsequently affects the economy in many different ways. It is therefore an expected outcome that entrepreneurship has been propelled as a priority on the various political agendas and that entrepreneurship education is now the focal area in the public policy of countries within the industrially developed world (Matlay, 2005).



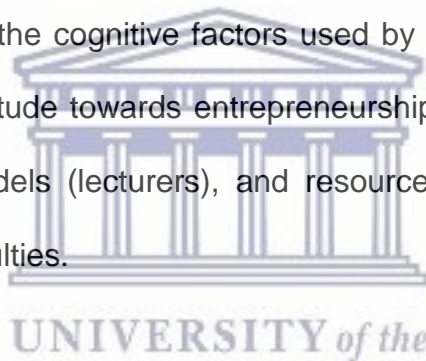
The National Development Plan (NDP) 2030 is the South African government's strategy for economic sustainability and one of the key areas in the alleviation of poverty and the stimulation of economic growth through entrepreneurship. To ensure that this materialises, the emphasis has been on entrepreneurship through government policies, strategies and various government initiatives that promote entrepreneurship. This will be discussed later in this chapter.

The pipeline of entrepreneurs identified in the case of this study is the commerce faculties at the various higher education institutions where entrepreneurial training takes place to prepare students to enter the marketplace with the necessary

entrepreneurial skills and knowledge. There has been an increased interest in entrepreneurial education and higher education institutions, which would facilitate the process of educating current and future entrepreneurs.

The aim of this study is to determine the entrepreneurial intention (EI) of students in the final year of their entrepreneurship diploma or degree, or final-year commerce students who have completed entrepreneurship modules.

The Theory of Planned Behaviour (TPB) is the theoretical model identified for use in this study, as it has been proven to be reliable and an accurate measure of intention of behaviour. In this study the cognitive factors used by the researcher to measure the influence on EI are attitude towards entrepreneurship, students' entrepreneurial leadership ability, role models (lecturers), and resources and opportunities within universities' commerce faculties.




The original model of TPB has been developed, through research, to understand the impact of the cognitive factors on the intention to act out a particular behaviour. This study however, stops short of the behaviour and focuses on the intention to act out the behaviour rather than the behaviour.

South Africa, after 24 years of democracy, is experiencing the legacy of a past that marginalised millions of South Africans for more than three hundred years – a legacy that will be felt for some time to come and cannot be eradicated or corrected by any one event. It requires a process that needs to be followed, not only to correct

injustices of the past, but also to prepare the youth for the future on all levels of society.

This chapter steps through history briefly and considers the various stages and the various obstacles that black entrepreneurs have had to endure over many years through to the current state of education that is required by entrepreneurs today. The chapter starts by identifying three stages of history, namely black entrepreneurship before colonialism, followed by black entrepreneurship in the colonialist era and black entrepreneurship in the apartheid era. The path of black entrepreneurs through these times gives us some background and reasons as to why South Africa is in the current economic state it finds itself in.



Democracy in South Africa started a new era for black business as laws were promulgated to assist in the development, promotion and growth of black entrepreneurs. Youth development, which makes up an important part, if not the most important part, of entrepreneurs and the mechanisms that have been implemented, has become the focus of government as youth entrepreneurship development is considered an investment in the future of the country to reach the goals put in place by the National Development Plan 2030.

To create understanding, the classification of small, micro and medium enterprises (SMMEs) is presented, as there are three different definitions currently being used, which create complications in their complexity. Survivalists' business – the perceived easiest form of business – makes up the largest percentage of business in South Africa today. Some reasons are considered as to why it makes up the largest percentage of business, as it is influenced by unemployment, lack of education and

lack of role models, which are the dimensions considered in this study, as there may be many other possible reasons.

The chapter continues by examining the current environment of entrepreneurship and bringing the future of entrepreneurship into the spotlight, according to the NDP 2030, therefore it is important to understand the current state of entrepreneurship in South Africa.

It has been recognised that education plays a pivotal role in the development of any country to grow and compete on the international stage. Higher education as a topic is discussed to consider how entrepreneurial education offering has affected and continues to affect the country's entrepreneurship attractiveness.



1.2 Background to the study

1.2.1 Entrepreneurship prior to colonialism

For thousands of years Khoisan people hunted animals to ensure the survival of their families, which led them to move to the best hunting grounds therefore they were considered nomadic.

They finally settled when the Khoikhoi or Khoekhoe(n), descendants of the Khoisan domesticated livestock and started farming where there was a supply of fresh water (Oliver and Oliver, 2017). Hunting eventually gave way to farming and the breeding of livestock, which meant the Khoikhoi grew into larger communities. The Khoikhoi, the original part of a pastoral culture, considered the land where they lived to be their land, as it was acquired by purchasing it from, or being given to them by, the chief or

king of the tribe at the time. Oliver and Oliver (2017) notes the kingdoms were claimed as the sole property of the king and those within his clan.

The breeding and ownership of livestock led to trading, in the form of bartering, which increased personal wealth and property ownership from these trades. According to Giliomee and Mbenga (2007) the Khoikhoi acquired their livestock from groups living in Botswana. The trade of livestock was not only conducted with those within the tribe and community but also with those from other tribes and communities. With the discovery of iron, these communities became skilled as iron workers and this led to further trade and bartering between communities and tribes.

From these early economic activities, many grew in personal wealth, which was passed on from one generation to another, thus perpetuating the wealth within the families and communities. The wealth that was generated was not only for the individual but also for those in the community at large. The amount of livestock that was owned determined the individual's wealth and status, which was a form of capitalism.

Venter, Urban, Beder, Oosthuizen, Reddy and Venter (2015) state that socialism was a part of African society, as it was a collectivist society where the businessmen supported the community and received support from the community in return, thereby becoming successful. Verhoef (2015) states that the early African trading entrepreneurs, prior to colonisation, were middlemen, arbitrators and businessmen who discovered the price in the market by being alert to profitable opportunities.

The result was that many such communities came into existence and kingdoms strengthened throughout Southern Africa, and an economy came into existence that lasted a few centuries until the arrival of the Europeans in the 16th century.

1.2.2 Effects of colonialism and apartheid on black business

1.2.2.1 Effects of colonialism

South Africa has been plagued by inequalities and injustices since it was first colonised by the Dutch in 1652. The Europeans arrived on the shores of Southern Africa with laws, from their country of origin, which were enforced on the indigenous people. Worden (1994) attributed racism in South Africa to the expansion of European colonialism in Africa and to civilise the inferior natives. The indigenous people were classified as lesser or in a lower social and political class than the Europeans based on the laws and customs that were practised. Giliomee and Mbenga (2007) comments that the colonisers brought along Western culture and Western intellectual baggage to their new found land. This continued for more than 300 years and was interwoven into the fabric of society. Throughout this time the majority of the South African population were marginalised through the non-ownership of land, the inability to actively participate in the economy, as well as an inferior education, to mention a few.

As early as the 1590s the locals traded with the Europeans mariners that sailed to the East and back (Oliver and Oliver, 2017), they traded cattle and sheep for copper, iron and tobacco (Giliomee and Mbenga, 2007). Bundy (1979) mentioned the bartering activities between the indigenous people and European settlers were

replaced with formal trade. This meant that the indigenous people lost a source of income and had to source this income by different means.

This led African entrepreneurs to seek opportunities in trading in the informal sector (Austen, 1987). Verhoef (2015) states that they lacked education and training to offer effective competition, coupled with the fact that they had limited access to capital and credit, which was embedded and contained in colonial legislation. Indigenous people were better off uncivilised and confined to agricultural activity (Zungu, 1977). The colonial government controlled, through legislation, the entrance of African entrepreneurs into new market economies. There were control measures in place such as control over access, distribution channels, price and commodities, transactions in the export goods and internal markets and the introduction of taxation (Verhoef, 2015).

An example of colonial taxation, which was first introduced in the Cape Colony in 1894, was the so-called Glen Grey Act, which taxed freehold labour (Verhoef, 2015). The economic and political oppression continued and was deepened when the colonial government gave way to the Afrikaner National Government rule.

1.2.2.2 Effects of apartheid

The National Party won the government elections in 1948 and enforced racial discrimination and the segregation of people through various laws, based on these racial classifications, which was called apartheid (Kopel, 2012). According to Worden (2000), apartheid laws instituted, as a legal principle, the theory that whites should be treated more favourably than blacks and that separate facilities need not be equal. This was promulgated in the Reservation of Separate Amenities Act of 1953 (Act No.49 of 1953).

According to Zungu (1977) it was the Nationalist Party's greatest desire to take over the major institutions of economy, politics and education to achieve its goals thereby elevating whites and depriving other racial groupings from these institutions. Nationalistic governments implemented radical socialist economic policies after independence that hampered and even prevented individual African enterprise development and boosted the state as entrepreneur, which widened the social and economic inequality (Verhoef, 2015). Mahluli, Salani, and Mokotedi (2015) notes that apartheid not only implemented a system of racial discrimination but also imposed separation, segregation of races in area of government, labour, market and residency. Some of the laws that were promulgated to enforce this ideology are mentioned in the next section.

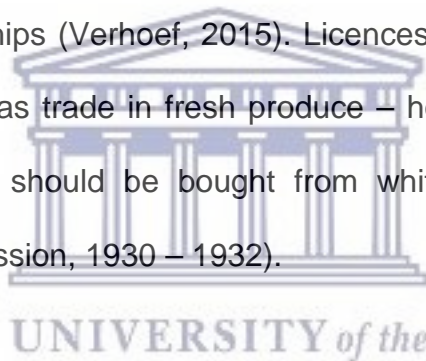


Some of the laws that were used to enforce separation and segregation were the Immorality Act of 1950 (Act No. 21 of 1950) and the Group Areas Act (Act No.41 of 1950). The Industrial Conciliations Act (Act No.11 of 1924) allowed the minister of labour to reserve categories of work for particular or specific racial groups (RSA, 1956). If the minister felt that white workers were being pressured by unfair competition from blacks he would classify jobs for whites only and increase the rates of pay (Kopel, 2012).

Another form of economic and political oppression was that the government of the day also relocated blacks to homelands and in many cases the homelands were made up of land geographically distant, agriculturally barren and economically destitute (Kopel, 2012). The displacement of many black communities meant that

black businessmen lost their businesses due to a loss of infrastructure, market and other long-established dynamics that added to the success of their business.

To ensure that there was enough cheap labour available for white businesses, various municipalities established townships, in terms of the Native Urban Areas Act (Act 21 of 1923), where trade licences were issued to black businesses to trade only within the boundaries of the townships. African businesses were small and engaged in “petty trade” such as basic consumer goods and services to cater for the daily needs of the people within locations and townships. African entrepreneurs had to obtain permission from the Minister of Native Affairs to conduct business outside urban locations and townships (Verhoef, 2015). Licences were awarded for specific businesses activities such as trade in fresh produce – however, not in the trade of fresh meat, so that meat should be bought from white-owned businesses (UG 22/1932: Economic Commission, 1930 – 1932).



Those Africans who did not get to move into townships were moved to the homelands. The idea was to give the homelands their independence, which would result in blacks voting for homeland governments, which meant that those who voted in homeland elections would lose their South African citizenship (Worden, 2000). According to Omer (2014), “This form of social and economic repression led to the expropriation of black property under the Natives Land Act, 1913 (subsequently renamed Bantu Land Act of 1913 and Black Land Act of 1913) (Act No. 27 of 1913).” Hoskinson (2008) and Richards (2006) (as cited by Omer, 2014) note that the Act deprived the majority of Black South Africans from owning land, which created a system of land tenure and had many socio-economic repercussions.

Motsuenyane (1989) states that in the mid-1970s there were more than 500 laws that impeded the involvement of the black community from participating in the economy as owners and managers, which included major laws such as the Master and Servant Act (Act No.15 of 1856), Mines and Work Act (Act No.12 of 1911) and Regulations Governing Black Business in Urban Areas (1962). Black South Africans were therefore forced to work and live in areas that were assigned to them.

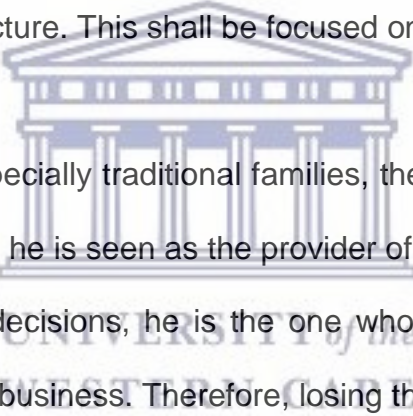
The “inequality” left only one context for commercial survival, which was situated in the urban market space outside the traditional communal home and authority of the traditional leader (Verhoef, 2015). The impact on business within the communities was immeasurable as communities were broken up and different racial groups were sent to various areas that were designated for them.

Due to the enforcement of these laws, many black South Africans suffered economically, which meant that if they stayed in the homelands there would have been an increase in unemployment as there was no job market that catered for all. Many decided to leave the homelands to seek employment and secure the financial survival of their families away from home.

This meant that most of the men – young and old, of working age – had to leave the homelands to seek employment, which was predominantly in the mining industry. When employment was secured in the mining industry, these men moved to locations and townships that were allocated to miners. One of the effects was that for generations there were fatherless households, and the mothers and children were

left in the homelands to fend for themselves. This had an effect on the dynamic of raising a family.

Everett Hagen's theory (as cited by Co, 2003) implies that one of the four initial conditions that eventually led to entrepreneurial behaviour was the loss of status by a group or collective. One of the conditions is that the group may be displaced by force, usually by physical force, which causes a change in power. The entrepreneurial behaviour that resulted was the start of the survivalists' businesses, which is the majority of entrepreneurial activity. One of the reasons for the many survivalist businesses is the lack of a role model, which was usually the father or older male in the family structure. This shall be focused on later in the chapter.



Within the black culture, especially traditional families, the father is very important to the success of the family, as he is seen as the provider of the family. As leader of the family, who makes all the decisions, he is the one who would start a business or make the decision to start a business. Therefore, losing the father would make it very difficult for the mother to fulfil the role of the father in the house in more ways than one. Mothers in general did not know how, or were not equipped, to lead a family in the absence of a father, which meant that the mothers had to push their sons more to be successful.

One of the effects of status loss is retreatism, which is characterised by the psychological repression of trauma associated with loss of status. Hagan (Co, 2003) further states that, "The suppressed rage resulting from the loss of status ultimately

results in a later lifting up of achievement standards being held up by mothers within the group to their sons.”

The trauma and repression being suffered needed an outlet, which came in the form of political violence that forced the government of the day to restructure its political and economic policies, ultimately leading to democracy in 1994.

1.3 Entrepreneurship and black business in democracy

The first free and fair election of a new government, held in 1994, started an era of rebuilding and setting right the injustices and inequalities that had prevailed until then. The newly elected government, among other things, wanted to address and correct the inequalities of the past. One of the first steps was to allow everyone access to the economy by becoming economic contributors and enjoying the advantages of economic and other freedoms.



The oppression of the majority of South Africans, justified by the promulgation of various apartheid laws, prohibited this majority from being economically active. The result of these laws placed black South Africans at an economic disadvantage that could not be mended without government intervention.

The government proposed various frameworks and policies that would encourage and create an opportunity for the entire population of the country to become economically active. GEM (2009) noted that due to the inability of formal and public sectors to absorb the increasing number of job seekers, there has been increasing

attention on entrepreneurship and new firm creation and the potential contribution to economic growth and job creation.

The government iterated the importance of small business and the development thereof and the role it was to play in addressing economic inequality, which would lead to economic growth and job creation. This can be seen as the start of small business development within the new democracy. The government implemented various mechanisms to assist black entrepreneurs in the new dispensation.

1.4 Entrepreneurship and unemployment

The unemployment challenge in South Africa has been a major focus since 1994 and has increased and persisted in the region of 25% (Amra *et al.*, 2013). Unemployment in South Africa has a racial dimension due to the unequal educational background and historic legacy that disproportionately affected black Africans and the coloured population groups, with unemployment at 29% and 24% respectively, compared to the Asian/Indian and white population groups with unemployment at 12% and 7% respectively (Amra *et al.*, 2013). According to Statistics South Africa, the unemployment rate in the second quarter of 2017 was at 27.7% (StatsSA, 2017).

Bhorat *et al.* (2013) argue that the underlying reasons for the continued income poverty and inequality in South Africa are:

- Inequality in skills (primarily education);
- Inequality in the returns on skills;
- Unemployment; and
- Low productivity and low labour income in the self-employed informal sector.

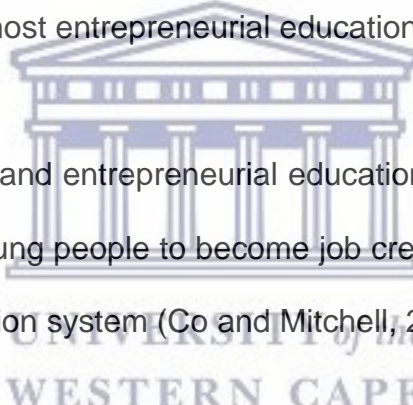
Inferior education or the lack of education is one of the major contributors to the unemployment dilemma that is being faced currently by the majority in the South African economy.

According to Peters (2010) the SMME sector makes up more than 95% of total enterprises, thus contributing more than 50% to employment and approximately 50% to the total Gross Domestic Product (GDP) in South Africa. The abovementioned figures provide a clear indication of the importance of the SMME sector and the potential effect it will have on the economy as a whole.

As mentioned earlier, support agencies have been established to assist various industries within South Africa, which has been envisaged to impact on economic growth and job creation. The process of government assistance, financial and non-financial support agencies was mandated to deliver these services to the SMME sector. The government has gone to great lengths to ensure that SMME development, through entrepreneurship, succeeds in the South African context. However, according to Venter *et al.* (2015), the South African government ties entrepreneurship support to its own ideologies of social justice, black economic empowerment and service delivery.

Against this backdrop, researchers have endeavoured to conduct empirical research on the effectiveness of the government assistance granted to SMMEs and the impact on job creation and economic growth. However, this does not fall within the scope of this research.

The creation and development of SMMEs, driven by government, can only be successful and sustainable by entrepreneurs who are educated and well equipped to run their businesses, thus ensuring the growth of their businesses. However, according to Nicolaidis (2011), a number of GEM reports highlight that the inhibitors of entrepreneurial growth in South Africa are due to the problems in education and training, which are especially noticeable in the age group 18 to 34 years. The identified group is within the range of the youth, which was discussed earlier in this chapter. Nicolaidis (2011) states that the inferior quality of education and the effect of apartheid on blacks in South Africa led to them to lose out on opportunities to acquire the skills that drive entrepreneurial activities. This means that critical skills were not encouraged and most entrepreneurial education was non-existent.



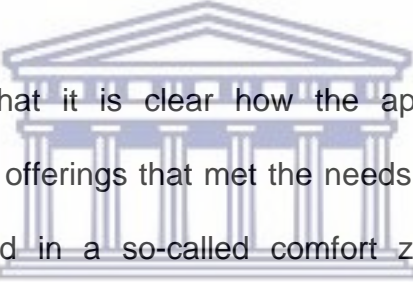
An urgent need for training and entrepreneurial education has been identified, which will hopefully encourage young people to become job creators instead of job seekers when they leave the education system (Co and Mitchell, 2006).

There is a dire need in South Africa to encourage entrepreneurship among blacks, who make up the largest component of the labour force but who account for a small proportion of entrepreneurial initiatives (Mentoor and Friedrich, 2007).

Black South Africans regained their status of respect after the democratic elections, marking the end of apartheid, but have not opted for the entrepreneurial route. Instead, a large number are now successful in the private sector as lawyers, doctors and engineers – careers that were traditionally not an option for them – and are now considered more respected than entrepreneurs (Co, 2003). Many have also been

employed in the public sector as politicians and provincial and national ministers, and in government parastals.

Post-apartheid policies have allowed more black South Africans to enter tertiary institutions, through various government-funded agencies such as the National Student Financial Aid Scheme (NSFAS), which means that there are more qualified young people entering the job market. The failure of the public and private sectors to absorb these graduates has seen an increase in graduate unemployment (Fatoki, 2010). South Africa needs its economy to grow to absorb the graduates that universities are producing.



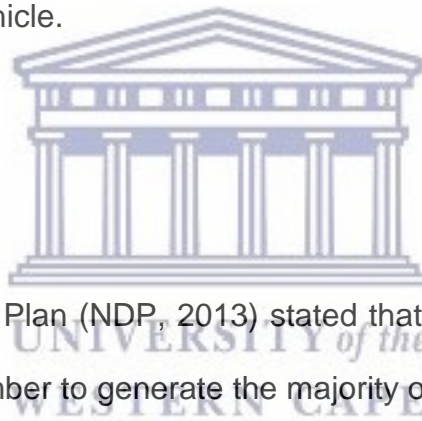
Nicolaidis (2011) states that it is clear how the apartheid economic policies influenced higher education offerings that met the needs of industry and provided a workforce that was trapped in a so-called comfort zone, working for a boss. Previously, universities – by serving the economic structure of South Africa – focused on producing graduates with the mindset that favoured big business in the formal sector (Co and Mitchell, 2006). This will be a topic of discussion later in the chapter.

Big business in the formal sector is on the decrease due to a transformation in the economic landscape, nationally and internationally, with companies wanting to and able to remain competitive with fewer employees. This creates further uncertainty among future graduates as to their career choices and selection of studies that would secure future economic survival.

Apart from this, role models play an important part in motivating future entrepreneurs in participating in the market place and conducting business. The next section will explore the impact of role models.

1.5 Problem statement

South Africa finds itself in the grips of high unemployment and poverty since the democratically elected government took power, this due to the legacy of apartheid where the majority of the population has been excluded and marginalised. To alleviate poverty and create employment the government has identified entrepreneurship as the vehicle.



1.6 Aim of study

The National Development Plan (NDP, 2013) stated that small and expanding firms will need to increase in number to generate the majority of newly created jobs. South Africa therefore needs more entrepreneurs to start businesses. The study aims to identify the impact of the students' attitude towards entrepreneurship, entrepreneurial leadership, role models and resources and opportunities, within commerce faculties, on the students' entrepreneurial intention. Timmons and Spinelli (2004) states that it is clear in literature that education, including entrepreneurship, is critical as it contributes to job creation and the alleviation of poverty.

1.7 Research Objectives

The primary objective of this study is to determine the impact of attitude towards entrepreneurship, entrepreneurial leaders, role models and resources and opportunities on the entrepreneurial intention of students in commerce faculties. The main area of focus can be delineated into the impact of attitude of entrepreneurship on entrepreneurial intention, the impact of entrepreneurial leadership on entrepreneurial intention, role models impact on entrepreneurial intention and the impact of resources and opportunities on entrepreneurial intention.

1.8 Research Hypothesis

The research hypothesised and tested the impact of the relationship between attitude towards entrepreneurship, entrepreneurial leaders, role models and resources and opportunities on entrepreneurial intention. The research also tested the impact of each factor on entrepreneurial intention. The hypothesis formulated in the study included:

H1: Attitude towards entrepreneurship positively influences entrepreneurial intention;

H2: Entrepreneurial leadership of students positively influences entrepreneurial intention;

H3: Role models (lecturers) have a positive influence on entrepreneurial intention;

H4: Resources and opportunities within commerce faculties have a positive influence on entrepreneurial intention.

1.9 Overview of methodology

The investigation for this study was exploratory therefore the researcher used a combination of research methods. Various journal sources were consulted which make up the literature review. A questionnaire was developed using the Target, Action, Context and Time elements as prescribed by Ajzen in 2004. A sample of 30 students was randomly selected out of the population to test for the reliability and validity of the questionnaire. Questions were eliminated based on the statistical results where no correlation was found. The final questionnaire was given to students to complete individually and collated afterward. The data was captured and SPSS 24 was used to do all the statistical analysis. All the information is presented in this research document.

1.10 Significance of study

According to Azjen (1991) literature supports the understanding that entrepreneurial intention leads to entrepreneurial behaviour, even though entrepreneurial behaviour is outside of the scope of this study, the study focuses on the impact on entrepreneurial intention which influences the entrepreneurial behaviour. It is important to many countries, especially South Africa, that a pipeline for entrepreneurs is identified and nurtured for the future economic success of the country and its people. Students getting entrepreneurship education will ultimately become entrepreneurs and fulfil a vital deficiency in South Africa today. Understanding the influences of entrepreneurial intention and eventually entrepreneurial behaviour is critical to this goal set out by the NDP 2030.

1.11 Chapter Overview

Chapter 2: Literature Review

This chapter begins with an introduction of the study's four cognitive factors that will be used later in the model that has been modified from the Theory of Planned Behaviour. The chapter then continues with a deeper look at each of the cognitive factors and how the component has been developed over the course of time in literature. The chapter discusses the new concept of entrepreneurial leaders as a new construct with the components of entrepreneurship and leadership. Entrepreneurial intention, attitude towards entrepreneurship, role models and resources and opportunities are introduced and discussed with reference to where it is mentioned and discussed in literature. The chapter continues with a discussion of entrepreneurship education in the commerce faculty, the current state of entrepreneurial education and environment. The future of entrepreneurship, as discussed in the National Development Plan 2030 is also discussed. The conceptual review, theoretical review, empirical review is discussed that brings the chapter to a conclusion and it is finally summarised.

Chapter 3: Research Methodology

The chapter discusses in detail the research process; which includes the research design, and the methodology followed in the research process.

Chapter 4: Presentation of results

This chapter presents the results of the analysis conducted on the data that has been collected throughout this research based on the questionnaire that was used.


Chapter 5: A proposed model for developing entrepreneurial intention at higher education institutions

The model that was used in this research was adapted from the model designed by Icek Azjen in 1991. The researcher discusses the findings of the adapted model and the support it enjoys in literature based on the findings. The model is then further discussed and interpreted.

Chapter 6: Conclusion

The chapter brings the research to a close with a discussion, contribution of the study, implications, theoretical and practical implications, limitations and future research that has been identified through this research.

1.12 Summary



The background to the study has been established and the context is therefore created as to the dire need for entrepreneurship in strengthening the country economically. The injustices of the past and the effects of those injustices that are currently being experienced are of great concern to South Africa as a country. South Africa has to create the opportunity to redress these inequalities through the offering entrepreneurship education that is linked to the needs of the market and the economy as a whole.

Entrepreneurship has been identified as the vehicle to facilitate the process of addressing inequalities and creating employment, which has been proven to be the case of many developing economies. To equip entrepreneurs with the necessary skills and attributes to be successful, the focus needs to be shifted to

entrepreneurship education. Entrepreneurship education is determined by those who decide on the various offerings of the higher education institutions.

Offering market-related entrepreneurship programmes requires an understanding of the market, be it the economy or entrepreneurship as a discipline. This requires the ability to identify the opportunity and exploit the opportunity, which is entrepreneurial leadership in itself.

The following chapter comprises the literature review, which looks at the entrepreneurial leadership as a construct, the impact of role models on entrepreneurial behaviour, and entrepreneurship in higher education institutions.



Chapter 2

2. Literature Review

2.1 Introduction

The previous chapter reported on the legacies that have been inherited by the current South African government and the many obstacles that need to be overcome. Unemployment and poverty are among the greatest inherited problems and legacies of the apartheid era. Coupled with the above, it has also been highlighted that the effect of inferior education impacts on economic growth.



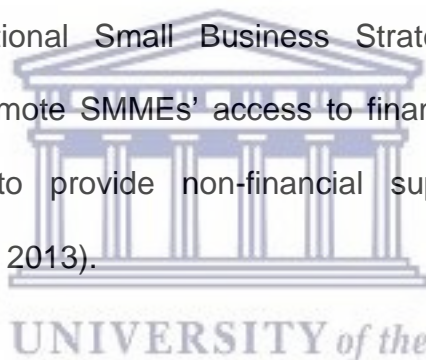
Since the democratic elections all South Africans are free to participate economically as a result of all of the oppressive laws that have been abolished. New laws have been promulgated to encourage economic participation for the previously disadvantaged. The problem remains that even though there have been many changes, the need for entrepreneurs is still of great economic concern to the government. Preparing entrepreneurs to participate in the market and be successful has become the focus of government intervention. This will ultimately lead to economic growth and unemployment alleviation.

2.2 Government's efforts to facilitate economic equality

The first step that the government took to address and redress the exclusion of black South Africans from participation in the economy was the White Paper on the National Strategy for the Development and Promotion of Small Business in South

Africa. The White Paper was tabled in Parliament by the Department of Trade and Industry (DTI) on 20 March 1995 (RSA, 1995). The DTI's growth strategy for the country focused, among other things, on broadening participation by redressing equity and allowing access to all economic citizens, particularly those previously marginalised (DTI as cited in Kruger, 2011). This White Paper led to the promulgation of the Small Business Act in 1996.

Within the Small Business Act of 1996, provision was made for the establishment of the Small Business Council. This also led to the creation of the Ntsika Enterprise Promotion Agency, which was to provide non-financial support and training in accordance with the National Small Business Strategy. Khula Finance was established in 1996 to promote SMMEs' access to finance, and at the same time Ntiska was established to provide non-financial support to SMMEs (Amra, Hlatshawayo and McMillan, 2013).



The National Small Business Amendment Act established the Small Enterprise Development Agency (SEDA) in 2004, in which three entities were amalgamated, namely:

- Ntsika Enterprise Promotion Agency (NEPA)
- National Manufacturing Advisory Centre (NAMAC)
- Community Public Private Partnership Programme (CPPPP)

SEDA, as part of the Department of Trade and Industry (DTI), aims to provide non-financial small business development and support by partnering with other organisations. As at the end of 2012, SEDA had:

- 43 branches,
- 18 mobile units,
- 48 electronic kiosks,
- 3 enterprise information centres,
- 12 enterprise development centres,
- 42 incubation centres, and
- 47 access points throughout the country (CPLO, 2013).

In 2012 the government created the Small Enterprise Finance Agency (SEFA) to simplify the expanding and growing financing needs for small businesses (DTI, 2013). SEFA is a direct financing agency to business owners and entrepreneurs and offers:

- 
- Bridging loans, which are short-term loans designed to finance working capital for businesses,
 - Term loans, which are loans for a fixed period of one to five years, and
 - Structured finance, which aims to finance business needs that fall outside the scope of bridging and term loans.

The finance facilities offered to businesses and entrepreneurs range between R50 000 and R5 million (SEFA, 2014).

As mentioned earlier, the Ministry of Small Business Development was established to deliver dedicated and focused support for small businesses and to ensure that challenges experienced in the sector are addressed in a co-ordinated way, such as:

- Legal and regulatory environment,

- Improving access to markets,
- Availability of finance,
- Addressing the skills deficit,
- Enabling better access to information, and
- Improving the effectiveness and reach of support institutions (SBP, 2014a).

According to the Broad-Based Black Economic Empowerment (B-BBEE) Act (Act 53 of 2003), “black South African” is a generic term that consists of Africans, Coloureds and Indians who are citizens of the Republic of South Africa (RSA, 2003). Therefore, the B-BBEE Act focused on making it possible and easier for black South Africans to enter the economy by addressing the inequalities experienced in the past.



According to Katua (2014), the Small and Medium Enterprise (SME) sector is widely considered to be the engine of economic growth and poverty eradication in the world. South Africa is no different from other countries in the world in terms of identifying the SME sector to assist in alleviating poverty, lowering unemployment and encouraging economic growth.

Bhorat, Hirsch, Kanbur and Ncube (2013) identified a major concern in the area of unemployment as being the youth unemployment rate, which reached a high of 42% in 2010. The youth unemployment rate increased to 52.2%, of which 67.4% represents the youth under the age of 25 years in the second quarter of 2017, according to Statistics South Africa (StatsSA, 2017). Youth unemployment has been the focus of increased attention, as the youth are the future of this country and its economic sustainability.

2.3 Government's efforts to facilitate youth economic development

As part of the future socio-economic development of South Africa, the government has been focusing on youth development. Gwija, Eresia-Eke and Iwu (2014) stated that in a job-scarce environment where unemployment is rife, the need to foster entrepreneurship among the youth is a prime concern.

Entrepreneurship has been adopted the world over as a strategy to facilitate economic participation among young people (Musengi-Ajulu, 2010; Nafukho and Muyia, 2010).

The definition of "youth" has been categorised by various organisations as follows:

- The United Nations has ring-fenced youth to include young people between the ages of 15 and 24 years (UNOWA, 2005);
- The African Union (AU, 2006) has ring-fenced youth to include young people between the ages of 15 and 35 years; and
- The National Youth Policy (RSA, 2009) has ring-fenced youth to include young people between the ages of 14 and 35 years, which also based on the mandate of the South African National Commission Act of 1996 and the National Youth Policy of 2000.

Several programmes have been created for the youth, such as the Youth Development Forum (YDF), Expanded Public Works Programme (EPWP), Accelerated and Shared Growth Initiative for South Africa (ASGISA) and Joint Initiative on Priority Skills Acquisition (JIPSA), to help address the youth's challenges (RSA, 2009). During the 2015 State of the Nation address in Parliament, President

Jacob Zuma advised that R2.7 billion had been made available to SMEs and encouraged young people to become entrepreneurs (Hunter, 2015).

To facilitate funding and non-funding assistance for entrepreneurs, government segmented small businesses into various categories. These categories are discussed in the next section.

2.4 Classification of small, micro and medium enterprises (SMMEs)

This section has been extracted from the Davis Tax Committee (DTC) Report issued in January 2014, as it provides the various definitions that are currently available in various government departments related to SMMEs. The DTC Report (DTC, 2014) highlights three definitions of SMMEs that will be discussed in turn.

Currently, there is no universally accepted definition of small and medium-size businesses in South Africa (DTC, 2014), and as previously mentioned there are three definitions that are considered, namely:

1. NDP (2013) – the definition accepted by government,
2. National Small Enterprise Act (Act 102 of 1996, as amended), and
3. Income Tax Act (Act 58 of 1962, as amended).

2.4.1 The NDP's (2013) definition of SMMEs

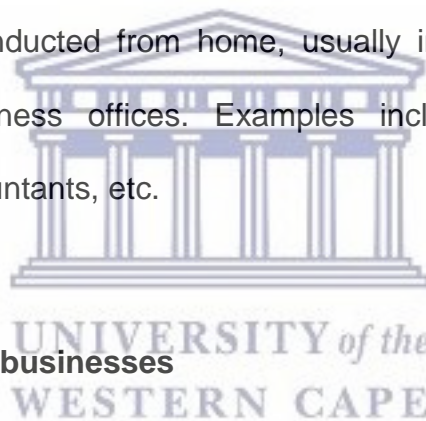
The NDP recognises three categories of business within the SMME sector, namely:

2.4.1.1 Survivalist businesses

The NDP considers a survivalist business as one that is conducted from a person's home or on the street. Businesses such as these do not need or lack the use of capital equipment and work mainly on a cash basis, which means that very basic or no financial records are kept. Businesses that would fall into this category include spaza shops, taverns, casual construction workers, hawkers, informal subcontractors and gardeners.

2.4.1.2 Lifestyle businesses

These businesses are conducted from home, usually in middle- and upper-class areas, or in single business offices. Examples include doctors, electricians, plumbers, engineers, accountants, etc.



2.4.1.3 Entrepreneurial businesses

These are businesses that concentrate on expansion and growth of a business headed by an entrepreneur. The entrepreneurs want to develop the brand of the business, increase the business' market share and possibly develop it into a franchise. Entrepreneurs are responsible for the innovation of new products and processes and even new markets. The NDP considers this category of business to be the generator of employment.

2.4.2 National Small Business Act's definition of SMMEs

The National Small Business Act (102 of 1996) introduced various categories or classifications of small business. This was further refined to five categories by the National Small Business Amended Act (26 of 2003). The five categories are:

- The standard industry sector;
- The subsector classification and sector classification according to the industry sector;
- Size of class;
- Equivalent of paid employees; and
- Turnover and asset value excluding fixed property (DTI, 2003)

The National Small Enterprise Act classifies SMMEs into five categories of the National Small Enterprise Act of 1996, and the key classification criteria are the total full-time equivalent of paid employees, the total turnover and the total gross asset value. The Act identifies four sizes of class categories, namely:

- Micro enterprises
- Very small enterprises
- Small enterprises
- Medium enterprises

Table 2.1: Categories of SMMEs as per the Small Business Act of 1996

Type of enterprise	Total full-time equivalent paid employees	Turnover	Gross asset value (excluding fixed property)
Medium-size business	200+	>R5 million	R5 – R23 million
Small business	50 - 199	R3 – R32 million	R1 – R6 million
Very small business	20 - 49	R500k – R6 million	R500k – R2 million
Micro business	5 - 19	<R200k	R100k

2.4.3 Income Tax Act's definition of SMMEs

According to DTC (2014), there are two definitions of SMMEs that are relevant to this analysis:

1. Micro businesses, as set out in Part 2 of the Sixth Schedule to the Income Tax Act, in terms of which a person qualifies as a micro business if that person is (among other qualifying requirements):
 - (a) A natural person (or the deceased or insolvent estate of a natural person that was a registered micro business at the time of death or insolvency); or
 - (b) A company (where the qualifying turnover of that person for the year of assessment does not exceed an amount of R1 million.
2. The second definition in the Income Tax Act that is relevant to this analysis is that of a small business corporation (SBC) that is set out in section 12E(4) of Income Tax. This section defines an SBC as any close corporation or co-operative or any private company, all shareholders of which are at all times during the year of assessment, natural person where the gross income for the

year of assessment does not exceed R20 million per annum (with effect from the 2014 year of assessment. Other qualifying requirements are also applicable).

The three definitions above, used by various agencies and departments, makes it difficult for a potential entrepreneur to enter into the business market, as this can be complicated and a deterrent to those who would want a registered business. Furthermore, entrepreneurs will prefer to start a survivalist business, which is easier, rather than a registered business, which has an effect on unemployment and formal entrepreneurship.

2.5 Survivalist entrepreneurs

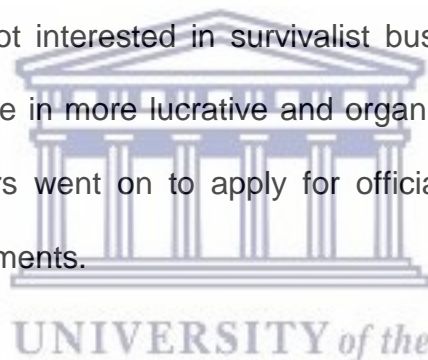
Peters (2010) describes a survivalist enterprise as an enterprise that generates income generally less than the bread or poverty line and which has employees to pay. Survivalist enterprises are seen as an income generation endeavour while being unemployed.

Many black South Africans who lived in the homelands and those living in townships started survivalist businesses to sustain themselves due to the difficulty of registering a business proper. This led to millions of South Africans, living in these areas, starting and running small survivalist operations.

The over two million SMMEs, representing 98% of businesses, employ about 55% of the South African labour force and contribute to approximately 42% of the wage bill;

however, 87% are survivalist enterprises with the majority being black (Nicolaides, 2011). According to Rogerson (1996) the reason for many individuals from disadvantage racial groups participating in informal trade for survival is due to the challenges of not being able to secure regular wages or access to employment opportunities of choice.

Survivalist enterprises are the easiest form of a business to start and maintain and the profits from the business can be used at the discretion of the business owner. The owner has great flexibility in the decision-making process regarding all business matters and how business will be conducted. However, there were black entrepreneurs that were not interested in survivalist business but wanted to grow their businesses to compete in more lucrative and organised markets, which meant that these business owners went on to apply for official business status through various government departments.



Godsell (1991) states that another stumbling block for black entrepreneurs was to obtain business permits and to do so the entrepreneur had to be corrupt either in an economic sense or politically and in cahoots with the township's white administrative bureaucracy to obtain services. Bank (1994) mentioned that black entrepreneurs were the only businessmen in South Africa targeted by the community and family with hostility, as he was first defined as a businessman and secondly as a black man. That being said, black businessmen that were not associated with the government or appeared not to be in cahoots with the government were respected and enjoyed a "more esteemed status" within the community.

According to the Global Entrepreneurship Monitor (GEM) Report of 2002, there is a negative culture towards black entrepreneurship, and due to generations of discrimination and legal barriers to entrepreneurship, this has resulted in a culture of dependency and more recently entitlement. The GEM Report (GEM, 2002) also shows that due to the negative culture towards black entrepreneurship, the preference for being employed is still strong over being self-employed, which means that black South Africans have a preference for a sense of a secure full-time employment rather than the risk of creating an income from their own business. The aforementioned further supports the idea that a survivalist enterprise was seen as the way in which to conduct business and support one's family during the period of unemployment.



In South Africa, with a diverse population, coupled with a complex history and long tradition of inequality and un-free political regimes, entrepreneurs have established businesses under conditions of inequality and oppression (Verhoef, 2015). Adding to this, the lack of education or inferior education creates a further disadvantage to the oppressed group, adding to this uncertainty.

Higher education institutions (HEIs) have been identified and can be considered as the pipeline for future, well-prepared entrepreneurs. Within HEIs and in the case of this study, commerce faculties have been identified as the cohort to conduct this study, as commerce faculties will prepare their students with the necessary entrepreneurship training and skills to be successful in the market.

The study aims to determine the effects of four factors on the entrepreneurial intention (EI) of students. The study used an adaptation of the Theory of Planned Behaviour (TPB), introduced by Icek Ajzen in 1991, to determine the EI of final-year entrepreneurship students. The literature review will further focus on the four cognitive factors that influence EI, which will be used later in the adapted model. The factors that are used in this study are:

- Entrepreneurial intention,
- Attitude towards the behaviour,
- Entrepreneurial leadership,
- Role models, and
- Resources and opportunities.

The four cognitive factors that influence EI will be discussed in detail later, with reference to literature that supports the purpose of this study.

Kolvereid and Isaksen (2006) and Bosman, Hessels, Schutjens, Van Praag and Verheul (2012) used the TPB to successfully predict EI and also understand entrepreneurial activity. Trivedi (2016) confirms, in his research, that TPB integrates the four cognitive factors in an intention-based model.

The following section introduces entrepreneurial intention (EI) which is followed by attitude towards behaviour, which is affected by a person's belief in that behaviour, which has either a positive or negative effect on the attitude towards the behaviour.

The next section introduces and extensively discusses entrepreneurial leadership, which is a fairly new construct. The section starts with a discussion of

entrepreneurship and leadership respectively. The intersection of leadership and entrepreneurship is followed by a historic perspective of entrepreneurial leadership. The definitions of entrepreneurial leadership and finally entrepreneurial leadership as a construct are then introduced and discussed.

Considering the impact of education on employment and economic growth, the researcher turns to understanding the impact of entrepreneurship education on future entrepreneurs. Universities, entrepreneurship programmes and lecturers are discussed in detail so as to understand the condition and impact of entrepreneurship education on EI.

The effect that role models have on EI is discussed in the next section. The researcher introduces the section with commonly used and popular definitions of role models and then uses literature to introduce academic definitions of role models. The impact of role models on EI is then introduced and discussed.

Finally, the chapter ends with the introduction and discussion of resources and opportunities presented at universities. As this section will show, the impact of resources and opportunities at universities is a vital component to encouraging and affecting the EI of students in the ecosystem.

The education and development of entrepreneurs, as a result of research, has become the focus for further educational development to ensure that entrepreneurs are equipped to negotiate changes in economic conditions. The education that is on

offer at the commerce faculties of various institutions needs to be relevant and entrepreneur-specific to equip future entrepreneurs.

2.6 Entrepreneurial intention

In 1991 Icek Ajzen introduced a model called the Theory of Planned Behaviour (TPB) which introduced three factors, namely the attitude towards (intended) behaviour, subjective norms (SN), and perceived behavioural control (PBC), and the impact that the three factors have on the intention to behave and ultimately the behaviour. In the case of this study the researcher sought to determine the impact of various factors on entrepreneurial intention (IE) using the TPB model. The TPB will be discussed in detail in the next chapter.

Bird (1988) defines (entrepreneurial) intention as the state of mind that focuses on a person's attention, experience, and a specific behaviour or object. Ajzen (1991) defines EI as the quest for information that will assist in the formulation of creating a venture. Van Gelderen, Brand, Van Praag, Bodewas, Poutsma and Van Gils (2008) argue that (entrepreneurial) intention towards a particular behaviour is a key factor that ultimately determines what a person has already intended to perform. Therefore, Ajzen (1991), Bird (1988) and Van Gelderen *et al.* (2008) see EI as the impetus behind a person's eventual entrepreneurial behaviour.

This study aims to understand the factors that influence final-year entrepreneurship students' EI, and Karimi, Biemans, Lans, Chizari and Mulder (2010) confirm that there has been little focus on factors that influence the EI of those still in the

education system. Karimi *et al.* (2014) argue that it is crucial that factors which influence the EI and behaviour of college students be understood to develop and implement effective programmes that would enhance these factors. To determine these factors, entrepreneurship researchers have adopted intentional models of social cognition to identify determinants of EI and behaviour (e.g. Karimi *et al.*, 2014; Kolvereid, 1996; Krueger and Carsrud, 1993). Malebana (2014) mentioned that knowledge gained regarding the factors influencing EI is necessary to guide the development and promotion of entrepreneurship education in South Africa. There are other benefits to identifying the EI of individuals to start a business, as it would assist the South African government in directing business support to those who require it in order to contribute to job creation (Douglas, 2013).

2.7 Attitude towards behaviour

For the purposes of this study, the researcher refers to attitude towards behaviour as the attitude towards entrepreneurship (ATE). Ajzen (2005) argues that attitude towards a particular behaviour comes from a person's belief that they hold about the consequences or outcomes of that behaviour. Students' beliefs about the consequences or outcomes of becoming entrepreneurs encourage the idea of becoming an entrepreneur or increase EI. The outcomes of these behaviours are referred to as behavioural beliefs or cost or benefits (Ajzen and Fishbein, 2005). Schwarz, Wdowiak, Almer-Jarz and Breiteneker (2009) found that students' attitude towards entrepreneurship influenced the EI of these students to start a business.

2.8 Entrepreneurial leadership

2.8.1 Entrepreneurship

The ancient Greeks were considered to practise the first form of entrepreneurship as they initiated tax farming, which involved bidding for rights for the collection and payment of tax to the ruling monarch. The risk was that the bidding amount exceeded the tax collected; however, more often than not, the tax collected exceeded the bidding amount, which resulted in a clear profit (Herbert and Link, 1988). The tax collectors therefore increased in wealth, as a result of excess money that was collected. Tax collection spread in the ancient world and tax collectors did not have a good reputation – we need only to refer to how they were perceived in the Bible.



Merchants in Roman times were seen as lower class and a vulgar form of doing business or making money (Venter *et al.*, 2015). Arab society, on the other hand, held the merchant in high esteem and, together with the location, it created an ideal space for entrepreneurial activity to thrive (Herbert and Link, 1988).

Filion (1997) states that the origin of the term “entrepreneur” stems from the 17th century when Richard Cantillo proposed a view of the entrepreneurial function and its relation to innovation. Venter *et al* (2015) further state that the term “entrepreneur” comes from the French word *entreprendre* which means *to undertake*. The French economist, Jean Bapiste Say, in the 1800s defined an entrepreneur to be an individual who undertakes an enterprise, especially a contractor acting as the intermediary between capital and labour (Karmarkar, Chabra and Deshpande, 2014).

At one point, managers and entrepreneurs were considered to have the same or similar functions, until Schumpeter investigated the differences between managers and entrepreneurs. Schumpeter (1934) notes the difference between managers and entrepreneurs to be that a manager aims to control, guarantee discipline and introduce order, whereas an entrepreneur is a special case of leader, albeit a social leader, which is further distinguished from other forms of leadership in terms of one who creates a company rather than manages an existing company. Dykes (2008) defines an entrepreneur as a person who sees a need in the marketplace and sets out to fulfil that need with a product or service.

According to Shane and Venkataraman (2000) entrepreneurship not only focuses on the enterprising person (the entrepreneur) but on the intersection of that enterprising person and entrepreneurial opportunity identified; therefore the entrepreneur is defined as one who discovers, evaluates and exploits opportunities for creating goods and services. Vecchio (2003) further supports this by arguing that entrepreneurship needs to be defined by referring to the context or setting, and in terms of actions taken by the individual within such settings. There are researchers who argue that entrepreneurship is leadership in a special context (Czarniawska-Joerges and Wolff, 1991; Vecchio, 2003). Venkataraman (1997) defines the context as the detection, assessment and utilisation of an opportunity to create future goods and services.

In the 20th century, other than economists such as Kirzner (1997) and Schumpeter (1947), few others recognised the pivotal role of the entrepreneur in economic expansion. The economic-based descriptors were applied to all entrepreneurs.

African societies have a history of entrepreneurship, as it is believed that they practised capitalism prior to colonialism, with the possession of cattle as a measurement of wealth (Venter *et al.*, 2015). Kuratko (2007) noted that persistence and success have become the symbols of entrepreneurship. Venter *et al.* (2015) mentioned that the economic-based descriptors, started by Schumpeter, became the fad in the mid-20th century; however, environmental and human factors have gained importance such as the behaviourists' influence on entrepreneurship stemming from a number of sources, including psychoanalysis, psychology and sociology.

Entrepreneurs will continue to be critical contributors to economic growth through their leadership, management, innovation, research and development effectiveness, productivity, and formation of new industries. This has led to the Entrepreneurial Revolution, experienced throughout the world in the 21st century, which is more powerful than the Industrial Revolution was to the 20th century (Kuratko and Hodgetts, 2007).



Karmarkar *et al.* (2014) note that entrepreneurship gained widespread recognition as the engine that drives the economy of many nations. South Africa, being no different, started with a White Paper that was tabled in Parliament in 1995 to present the guidelines as to how the new government will redress the economic wrongs of the past. The entrepreneurial pursuit of economic growth, equal opportunity and upward mobility has been the greatest source of economic strength; therefore, in this economic access process, entrepreneurial ventures play the crucial and indispensable role of providing the social glue that binds together both high-tech and traditional business activities (Kuratko, 2007).

In line with Kuratko (2007), South Africa is experiencing a context where a lack of entrepreneurial ventures has led to a gap between traditional business activities and high-tech business activities. This gap can be overcome by effective leadership through the influencing of followers by focusing on innovation and fulfilling the identified needs of the market. Leadership is therefore vitally important to the entrepreneurial process.

2.8.2 Leadership

Rindova and Starbuck (1997) mention that the concept of leadership finds its roots in ancient times where the concepts of leadership traits, behaviour and processes were discussed in the ancient writings of China, Egypt, Greece, India, Israel, Iraq and Italy. Peterson and Hunt (1997) support this by stating that the research in the leadership domain can be traced back to ancient civilisations. Leaders have served as symbols of research in the Old and New Testaments, the Upanishads, the classics of Greece and Rome, and the Islandic sagas (Bass, 1997). Therefore, the study of leadership has been a practice for a long time, according to Hunt and Dodge (2000), and it is considered to be a mature field with a systematic study methodology, as from the 20th century (Cogliser and Brigham, 2004).

The initial methodical attempt to study leadership peaked during the 1920s through to the 1950s, and the trait approach experienced a resurgence during the 1990s (Antonikas, Cianciolo and Sternberg, 2004), which established the domain at this point in the social sciences (House and Aditya, 1997). According to Bass (1990) and Yukl (2002) the focus of research was twofold, namely:

- The characteristics that differentiate leaders and non-leaders, and
- The extent of those differentiations.

The majority of the behavioural theories that developed from the 1950s through to the 1980s focused on two categories of leadership behaviour (Cogliser and Brigham, 2004), namely:

- Consideration, and
- Initiating structure (e.g. employee-centred vs. production-centred).

Stogdill's (1974) critical review of the trait approach questioned the universality of traits across leadership studies, which led to the first major crisis experienced by the domain of leadership. According to Antonakis *et al.* (2004) this started the process of migrating and focusing leadership studies from what leaders *are* to what leaders *do*. Although there was a great effort to investigate the relationship between leader behaviour and the outcome of leadership effectiveness, the results were weak and inconclusive (Antonakis *et al.*, 2004; Yukl, 2002) and this led to leadership's second major crisis (Antonakis *et al.*, 2004).

Cogliser and Brigham (2004) state that leadership scholars started investigating the conditions in which the leadership anomaly took place in an effort to reconcile the findings that were uncovered during the behavioural period of leadership research. House, Rousseau and Thomas-Hunt (1995) also called for the attention of context in leadership research.

Leadership, as a single domain, has more models than any other areas in the behavioural sciences (Hunt and Dodge, 2000). According to Bass (1990) early

scholars used the term “leadership” in leadership research, from common vocabulary, and applied it to suit their purpose, often not clarifying its definition with a specific construct and domain. Bennis (1959) discusses the complexity of leadership constructs that gave rise to endless proliferations of terms without any clear definitions. As a result, leadership as a term served to be vague and imprecise, which included a wide range of settings with unimportant implications causing ambiguity (Janda, 1960). It is therefore very important that leadership researchers acknowledge that the nature of their research will strongly impact their choice of the leadership definition they use (Hunt, 2004).

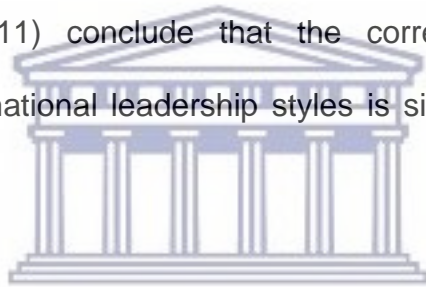
Cogliser and Brigham (2004) state that with the myriad of models that have been developed within modern leadership, there are just as many definitions that accompany these models, and therefore the field of leadership has faced many conflicts over the definitional issues, creating confusion and inconsistency in the conceptualisation and the practical application of leadership theory over the years.

Rather than argue over the correct definition of leadership, scholars have begun to realise the complex, multifaceted nature of the leadership construct and have accordingly used various conceptualisations of leadership to design research relevant to the range of definitions (Hunt, 2004).

Leadership researchers acknowledge the importance and integration of individual-level factors and contextual factors in explaining the differences in effectiveness (Vecchio, 2003). Yang (2008) mentioned that there are notions of climate and context connected to a related idea of leadership. Transactional and transformational

leadership styles became the focus of researchers as these leadership styles contained context in their construct.

Burns (1978) draws a distinction between transactional and transformational leadership, and describes a transactional leader as one that is given power to perform certain tasks and to reward and punish the team for the team's performance, whereas a transformational leader is one that is highly visible and uses communication as the base for achieving goals. The two leadership styles fulfil the prerequisite of context and climate in their construct as acknowledged by leadership researchers. Coupled to Burns' (1978) definition of transformational leadership style, Roomi and Harrison (2011) conclude that the correlation between business performance and transformational leadership styles is significantly higher than any other leadership style.



Transformational leadership is best suited to environments where change takes place and the leader adapts to change and takes advantage of it. Transactional leadership is end-results-driven and involves managing workers under strict rules and regulations to avoid change as far as possible and to maintain the status quo of the organisation. Transactional leadership is practised by managers who reward employees for work completed before a deadline or punish employees should the deadline be missed. According to Northouse (2013) transactional leadership models make up the bulk of leadership models focusing on the exchange that occurs between leaders and their followers.

Taffinder (1995) notes that a chief source of having competitive advantage is the entrepreneurial leader's ability to implement and support change in ever-changing

markets, which according to Roomi and Harrison (2011) is more appropriately suited to transformational leadership rather than transactional leadership.

Transformational leadership is a process whereby the leader interacts and engages with others to create a connection that raises the level of motivation and morality in the leader and the follower, therefore this type of leadership is follower-centric to assist the follower to reach his or her fullest potential (Northhouse, 2013). There is, however, a darker side to transformational leadership which history has shown us, for example Adolf Hitler, whose personalised leadership focused on the individuals' own interests rather than the interest of others (Bass and Steidlmeier, 1999). This type of leadership, referred to as *pseudotransformational* leadership, changes the status quo but has negative effects (Bass, 1998).

Charismatic leadership has also received a lot of attention from leadership researchers (Conger, 1999; Hunt and Conger, 1999) and is often described in ways to make it similar to, if not synonymous with, transformational leadership (Northhouse, 2013). However, Bass (1995) gave more attention to the emotional components and origins of charisma, based on an extension of House's (1976) work, thereby suggesting that charisma is a necessary but not essential condition for transformational leadership (Yammarino, 1993). It is therefore considered that transformational leadership is focused on improving the performance and the development of followers to reach their fullest potential (Avolio, 1999; Bass and Avolio, 1990). Those who exhibit transformational leadership often have a strong set of individual values and ideals, and they are also effective in motivating followers to act in ways to support the greater good rather than self-interest (Kuhnert, 1994).

Bass (1985) developed a transformational leadership model where various factors were identified, such as:

Idealised influence: leaders who act as strong role models for followers, with which followers identify and emulate.

Inspirational motivation: leaders who communicate high expectations to followers, inspiring them through motivation to become committed to and part of the shared vision of the organisation.

Intellectual stimulation: leadership that stimulates followers to be creative and innovative, to challenge their own beliefs and values as well as those of the leaders of the organisation.

Individual consideration: leaders who provide a supportive climate in which they listening carefully to the individual needs of followers.

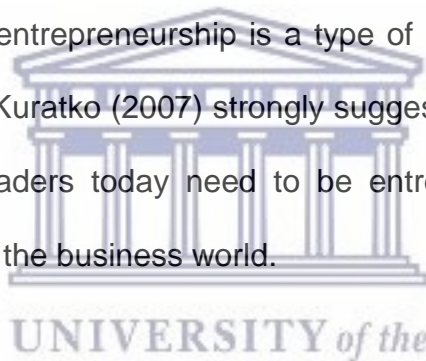
Transformational leadership has therefore been identified as a leadership construct that has the elements of both entrepreneurship and leadership. The overlap of entrepreneurship and leadership was explored as sharing characteristics common to both.

2.8.3 The intersection of leadership and entrepreneurship

Entrepreneurial leadership exists and occurs at the intersection of entrepreneurship and leadership (Renko, Tarabishy, Carsrud and Brännback, 2015). Identifying the similarities of entrepreneurship and leadership, through conceptual overlaps, will assist the entrepreneurship researchers to not become victims of similar pitfalls as what was experienced by leadership researchers. Coglisier and Brigham (2004) add

that leadership, as a field of study, is not unique to the problems experienced in its progression to maturity and that the field of entrepreneurship, as a young field in management and in its early stages of development, would suffer the same fate.

Roomi and Harrison (2011) argue that the intersection approach is limited as it is descriptive and only shows that there are aspects common between entrepreneurs and leaders; however, it does not analyse and/or explain the reasons for common characteristics, nor does it suggest how to build on these common characteristics. Robinson, Goldeby and Hosgood (2006) view entrepreneurship as one type of leadership orientation, while Vecchio (2003) developed an entrepreneurial leadership model that concludes that entrepreneurship is a type of leadership that occurs in a specific context. However, Kuratko (2007) strongly suggests that leadership is a type of entrepreneurship, as leaders today need to be entrepreneurial in order to be effective and competitive in the business world.



Cogliser and Brigham (2004) chose four areas, from many others identified, as primary categories and used three lifecycle stages, developed by Reichers and Schneider (1990), to observe the development of the overlap between entrepreneurship and leadership from a historical perspective. For the purposes of this study, further development of the concepts is not required as it is outside the scope of this study.

Cogliser and Brigham (2004) identified four areas of overlap, namely:

- Vision,
- Influence,
- Leading in the context of innovation and creativity, and

- Planning

Vision

- Charismatic, transformational and visionary leadership styles were the contexts in which the vision was started (Cogliser and Brigham, 2004).
- Despite implications in new venture performance, little attention was paid to vision in the field of entrepreneurship (Hellstroem and Hellstroem, 2002).
- The role of vision has been explored in entrepreneurial venture growth by Baum, Locke and Kirkpatrick (1998).
- Leaders' goals are communicated to others by means of a vision (Cogliser and Brigham, 2004).
- Bryant (2004) mentioned that vision clarifies goals and inspires constituents' confidence in a certain and uncertain future.

Influence

- Influencing others to move toward a common goal (Hunt, 2004).
- The learning and sharing of knowledge by followers, and the support and cooperation of external supporters are the result of influence in a social system (Yukl, 2002).
- Influencing others by marshalling resources is a necessary action by the entrepreneur, in an entrepreneurial setting, to reach the potential of an identified opportunity.
- Champions have greater influence than non-champions (Howell and Higgins, 1990).

Creativity

- Bolin (as cited by Cogliser and Brigham, 2004) states that creativity is one trait that is associated with entrepreneurs.

- An entrepreneurial mindset, entrepreneurial culture, entrepreneurial leadership, and the strategic management of resources, coupled with creativity, are vital dimensions for creating value in entrepreneurial ventures (Ireland, Hitt and Simon, 2003).

Planning

- Planning, direction and control are important components of the entrepreneurial process (Kotler, 1982).
- Entrepreneurs have a strong need for planning, as it is a mental simulation of future actions that can help entrepreneurs anticipate potential biases in their strategic choices (Cogliser and Brigham, 2004).



Table 2.2: Conceptual overlap of leadership and entrepreneurship

Construct	Leadership Application	Entrepreneurship Application
Vision (followers and larger contingencies)	Vision is the main concept in inspiring followers toward exemplary performance or other goal-directed behaviour, as well as organisational performance (Baum <i>et al.</i> , 1998; Kirkpatrick, Wofford and Baum, 2002; Zaccaro and Banks, 2001).	Vision attributes (brevity, clarity, abstractness, challenge, future orientation, stability, and desirability or ability to inspire) and content (growth imagery) are related to new venture growth (Baum <i>et al.</i> , 1998); followers need to motivate through involvement, participation, and a professionally meaning mission (Keller, 1997).
Influence	A commonality across many of the various definitions of leadership is the ability to influence others toward a goal (Hunt, 2004). Rational persuasion is widely used for both upward, lateral and downward influence (Yukl and Falbe, 1990).	Entrepreneurs not only see opportunities (understand the ways and means), but are able to marshal resources to carry out their vision. Use of rational persuasion and inspirational appeals (Gartner, Bird and Starr, 1992) are likely to be effective when the request is legitimate and in line with the entrepreneur's values and the constituencies' needs.
Leading in the context of innovation / creativity	Leading creative people requires technical expertise and creativity, employing a number of direct and indirect influence tactics (Mumford, Scott, Gaddis and Strange., 2002b).	Entrepreneurial leadership should involve idea generation, idea structuring and idea promotion (where idea generation is critical in the early stages of a venture, and idea structuring and promotion are more important in latter stages).
Planning	In complex, dynamic environments where people must coordinate their activities, planning represents a key influence on performance (Mumford, Schultz and Osburn, 2002a).	Entrepreneurs have a clear need for the mental simulation of future actions to anticipate potential biases in strategic choices (Busenitz and Barney, 1997).

Source: Cogliser and Brigham (2004)

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Fernald, Solomon and Tarabishy (2005) took the “overlap approach” after examining the literature on both entrepreneurship and leadership and they derived a set of characteristics or traits similar to Cogliser and Brigham’s (2004) conceptual overlap, namely:

- Vision
- Problem-solving
- Decision-making
- Risk-taking
- Strategic initiatives

Comparing the findings of the conceptual overlap, leadership and entrepreneurship studies conducted by Cogliser and Brigham (2004) and Fernald *et al.* (2005) the following was found:

- Vision has been identified by both sets of authors as a primary characteristic in the conceptual overlap between leadership and entrepreneurship.
- Problem-solving (Fernald *et al.*, 2005) = Influence and leadership in the context of innovation and creativity (Cogliser and Brigham, 2004) as the entrepreneurial leader needs problem-solving ability in leading a group to innovate and be creative through influence.
- Decision-making (Fernald *et al.*, 2005) = Influence and leadership in the context of innovation and creativity (Cogliser and Brigham, 2004), as entrepreneurial leaders should make decisions that will influence and lead teams in the best interest of the business.
- Risk-taking (Fernald *et al.*, 2005) = Leading in the context of innovation and creativity, as the entrepreneur, who has identified opportunities, needs to fulfil the need in the market before competitors to gain market share and competitive advantage.
- Strategic initiatives (Fernald *et al.*, 2005) = Planning (Cogliser and Brigham, 2004) can be matched when doing the comparison, as it involves the future of the business that will secure a competitive advantage in the business.

Table 2.3: Comparison of conceptual overlaps by Coliger and Brigham (2004) and Fernald et al. (2005)

Cogliser and Brigham (2004)	Fernald <i>et al.</i> (2005)
(a) Vision	(a) Vision
(b) Influence	(c) and (b) Problem-solving
(c) Leading in the context of innovation and creativity	(c) and (b) Decision-making
(d) Planning	(c) Risk-taking
	(d) Strategic initiatives

The mainstream of leadership theory contains many of the constructs used in entrepreneurship, and it is limiting to view entrepreneurship as a leadership style that occurs in a particular context. Similar to many other small group manifestations of leadership, it is a leadership that is not beyond the reach of the plethora of leadership models available (Vecchio, 2003).

The overlap of entrepreneurship and leadership has given insight into the construct of entrepreneurial leadership, and it is therefore important to consider and focus on the history of entrepreneurial leadership and its development as a construct.

2.8.4 Historical perspective on entrepreneurial leadership

Transformational leadership is considered to be a more applicable model to operate within the entrepreneurial context (Roomi and Harrison, 2011), and transformational leaders are always considering new ways to overturn the status quo of organisations through major change by empowering and encouraging others to achieve a shared vision. They do this through being role models and their ability to influence and motivate their followers to do more than expected (Burnes, 2004). The organisational system, procedures and cultures are affected by the driving force of the entrepreneurs behind the vision, mission and initiatives (Roomi and Harrison, 2011).

Zaccaro, Kemp and Bader (2004) built on the ideas of Brockhaus (1982) and Nicholson (1998) by looking at trait leadership as integrated patterns of personal characteristics fostering leadership effectiveness. Derue, Nahrgang, Wellman and Humphrey (2011) further developed leader effectiveness as the amount of influence on the leader's followers and the effectiveness thereof. Ireland and Hitt (1999) considered entrepreneurial leadership to be measured by the ability to influence others, set direction, communicate, motivate, develop change, handle resources strategically, and encourage others to act in a competitively advantageous and opportunity-seeking way.

McGrath and McMillan (2000) identified the need for an entrepreneurial leader to negotiate and deal with uncertainty and competitive pressures presented by the market. Surie and Ashley (2008) note that leadership is capable of sustaining innovation and adapting to fast-moving and uncertain environments.

Galton (as cited by Karmarkar *et al.*, 2014) states that many scholars have argued that leadership is a skill that is unique to a select number of people and that it cannot be copied or taught to anyone else. Brockhaus (1982) and later Nicholson (1998) used the Trait Theory of Leadership to determine the differences in traits and attributes of entrepreneurs and found that entrepreneurs are single-minded, thick-skinned and dominating individuals, unlike managers.

Vecchio (2003) believes that leadership behaviours specific to entrepreneurship, rather than conceptual overlaps that have been completed, need to be established by research. Antonakis and Autio (2006) found that entrepreneurial leadership is a neglected area of entrepreneurial research. Bagheri and Pihie (2010) found missing links between traditional education and entrepreneurial leadership learning, which will be focused on later in the chapter.

Eijdenberg and Masurel (2013) emphasise the importance of the push and pull factors highlighting entrepreneurial motivation. The pull factors are intrinsic and pull people toward entrepreneurship, while the push factors are extrinsic and push people towards entrepreneurship.

Table 2.3 depicts the history of entrepreneurial leadership styles in a tabulated form to depict the chronological order of development.

Table 2.4: Studies focusing on a historical perspective on entrepreneurial leadership

Year	Paper	Key Findings
1869	Galton (as cited by Karmarkar <i>et al.</i> , 2014)	Leadership traits cannot be developed and are unique to only select number of individuals.
1982	Brockhaus	Observed personality traits in sample of entrepreneurs.
1998	Nicholson	Entrepreneurs are singled-minded, thick-skinned, dominating individuals...unlike managers.
1999	Ireland and Hitt	Entrepreneurial leadership effectiveness measured by ability to influence others, set direction, communicate, motivate, develop change, handle resources strategically, and encourage others to act in a competitively advantageous and opportunity-seeking way.
2000	McGrath and McMillan	Entrepreneurial leadership as the need of the hour owing to increased uncertainty and competitive pressure.
2003	Vecchio	Leadership patterns specific to entrepreneurship yet to be established by research.
2004	Zaccaro, Kemp and Bader	Trait leadership as integrated patterns of personal characteristics fostering leader effectiveness.
2006	Antonakis and Auto	Specifically identifying entrepreneurial leadership as a 'neglected area of entrepreneurial research'.
2008	Surie and Ashley	Leadership capable of sustaining innovation and adaptation in high-velocity and uncertain environments.
2010	Bagheri and Pihie	Identifying missing links in traditional entrepreneurship education that make it non-conducive to leadership learning.
2011	Derue, Nahrgang, Wellman and Humphrey	Defining leader effectiveness as the amount of influence of leader on followers.
2013	Eijdenberg, and Masurel	Emphasising the importance of pull over push factors, thus highlighting entrepreneurial motivation.

Source: Karmarkar *et al.* (2014)

The historical perspective on entrepreneurial leadership showed us the evolution and development of the concept. With the evolution and development of entrepreneurial leadership there has been a development in its definition. Learning from the definitional challenges leadership has faced, it is important to understand the

definitional development of entrepreneurial leadership so as to not fall into the trap, as warned earlier.

2.8.5 Definitions of entrepreneurial leadership

Since its conceptualisation, the definition of entrepreneurial leadership has evolved and has come to include many of the aspects that have been lacking within the construct of leadership and taking into account the context and climate.

Cunningham and Lischeron (1991) were the first to conceptualise entrepreneurial leadership, followed by numerous other researchers who further developed the concept of entrepreneurial leadership through research and the development of models and constructs. Setting goals, creating opportunities, empowering people, preserving organisational intimacy and developing a human resource system are components of entrepreneurial leadership according to Cunningham and Lischeron (1991). McGrath and McMillan (2000) define an entrepreneurial leader as one who has an apt entrepreneurial approach, keeping abreast of the rapidly changing markets and exploiting opportunities to reap advantages before and faster than others. Ireland *et al.* (2003) describe an entrepreneurial leader as having the ability to influence others and to manage resources strategically in order to emphasise both opportunity-seeking and advantage-seeking behaviours. Gupta, McMillan and Surie (2004) consider entrepreneurial leadership to be leadership that creates visionary scenarios that are used to assemble and mobilise a supporting cast of participants who become committed by the vision of the discovery and exploitation of strategic value creation.

A leader requires, among other characteristics, passion, vision, focus and the ability to inspire others; however, an entrepreneurial leader requires all of the abovementioned characteristics and a skill and mindset to identify and develop new business opportunities (Thornberry, 2006). Surie and Ashley (2008) note that entrepreneurial leadership is leadership capable of sustaining innovation and adaptation in high-velocity and uncertain environments.

Influencing and directing the performance of group members to achieve an organisational goal that involves recognising and exploiting opportunities are fundamental components of entrepreneurial leadership (Renko *et al.*, 2015).

Entrepreneurial leadership therefore has to identify opportunities in the ever-changing environment, influence others through various mechanisms to identify opportunities, and together exploit those opportunities to realise the organisation's performance and growth.



Table 2.5 tabulates the chronological development and definition of entrepreneurial leadership. The development thereof has been established and sets the foundation for the discussion of entrepreneurial leadership in the next section.

Table 2.5: Evolving definitions of entrepreneurial leadership

Cunningham and Lischeron (1991)	Entrepreneurial leadership involves setting clear goals, creating opportunities, empowering people, preserving organisational intimacy and developing a human resource system.
McGrath and McMillan (2000)	An entrepreneurial leader is one who has an apt entrepreneurial approach and a precise ability to keep abreast of fast-changing situations or markets.
Ireland <i>et al.</i> (2003)	Entrepreneurial leadership entails the ability to influence others to manage resources strategically in order to emphasise both opportunity-seeking and advantage-seeking behaviours.
Gupta <i>et al.</i> (2004)	Leadership that creates visionary scenarios that are used to assemble and mobilise a supporting cast of participants who become committed by the vision to the discovery and exploitation of strategic value creation
Thornberry (2006)	Leadership requires passion, vision, focus, and the ability to inspire others. Entrepreneurial leadership requires all these, plus a mindset and skill set that helps entrepreneurial leaders identify, develop and capture new business opportunities.
Surie and Ashley (2008)	Leadership capable of sustaining innovation and adaptation in high-velocity and uncertain environments.
Renko <i>et al.</i> (2015)	Entrepreneurial leadership entails influencing and directing the performance of group members toward the achievement of organisational goals, which involves recognising and exploiting entrepreneurial opportunities.

Source: Renko *et al.* (2015). Adapted.

2.8.6 Entrepreneurial leadership and entrepreneurial intention

Entrepreneurial leadership is crucial as it recognises the importance of individuals in the entrepreneurial process and it is aligned with current research in leadership and entrepreneurship with the emphasis on *doing* and actions rather than traits and/or personalities (Cogliser and Brigham 2004; Gartner, 1985; Stogdill, 1974). Renko *et al.* (2015) note that the existing academic research on entrepreneurial leadership falls into three categories, namely:

- Leaders;
- New business owners that have to adapt to leadership roles; and
- Distinctions or similarities between leaders and entrepreneurs.

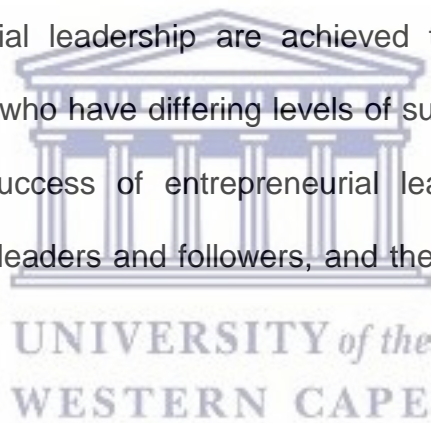
These attributes, behaviours and actions that characterise entrepreneurial leadership and distinguish it from other leadership styles focus on entrepreneurial goals for leadership, with the characteristics being opportunity recognition and exploitation (Shane and Venkataraman, 2000). Renko *et al.* (2015) state that recognising entrepreneurial opportunity encompasses perceiving the opportunity, while Choi and Shepherd (2004) explain exploitation as those activities and resources committed to gaining advantage from new opportunities. Renko *et al.* (2015) further argue that entrepreneurial leaders themselves engage in opportunity-focused activities and by doing so they influence their followers, motivating and encouraging them to pursue entrepreneurial behaviours.



Entrepreneurial leaders influence, direct and motivate their followers by acting as role models to their followers (Kuratko *et al.*, 2001; McGrath and McMillan, 2000). As mentioned in the previous chapter, Co (2003) posits that the influence of the environment on entrepreneurial behaviour, especially the exposure of an individual to entrepreneurship or to entrepreneurs, is role theory. Role models are vital to the perpetuation of entrepreneurs and entrepreneurial leaders in the business world, as the role model can be emulated, which will further encourage novice entrepreneurs to negotiate challenges that may be faced in the future. Role models are also used as resources to advise those they inspire, which will impact on the entrepreneurs' self-efficacy. Role models will be discussed in more detail later on in this chapter.

Other than acting as role models, entrepreneurial leaders openly encourage followers to work toward entrepreneurial goals (Gupta *et al.* 2004; Hunt, 2004; Ireland *et al.*, 2003; Yukl, 2002). Renko *et al.* (2015) note that entrepreneurial leaders firstly consider their followers in terms of their entrepreneurial passion and self-efficacy, while Bandura (1986) add that these leaders enhance their followers' belief in their own entrepreneurial skills and abilities and ignite passion for innovation and creativity.

The creative emphasis of entrepreneurial leadership is the invention and commercialisation of products, services or processes of a business. Therefore, the outcomes of entrepreneurial leadership are achieved through the interaction of leaders and their followers who have differing levels of susceptibility to the influence of such a leader. The success of entrepreneurial leadership depends on the interrelationships between leaders and followers, and the context thereof (Renko *et al.*, 2015).



Entrepreneurs enter the entrepreneurial space based in two factors, as identified by Eijdenberg and Masurel (2013), namely push factors and pull factors, as mentioned earlier.

Push factors occur when people do not have an alternative but to become entrepreneurs due to unemployment and, as mentioned in the previous chapter, these people are predominantly survivalist entrepreneurs until they gain employment. The high unemployment rate in South Africa can therefore relate to the high number of survivalist entrepreneurs.

Pull factors are considered where people want to become entrepreneurs, based on them having role models within their communities or families. As there are more survivalist entrepreneurs in the South African economy, which does not add to employment creation, we can deduce that as a country we need entrepreneurs who will employ people and who are formally educated to deal with the business challenges that will enable their business to grow.

Entrepreneurs are vital to the survival of the South African economy, to alleviate unemployment and increase economic growth. To achieve this, entrepreneurs need entrepreneurship education that will equip them to understand the business world, which is ever-changing, and give them the skills of entrepreneurship and entrepreneurial leadership to cope with the changes that are occurring.

The entrepreneurial education that is on offer at universities needs to keep up with the changes that occur in the business world so that the entrepreneurs graduating from these institutions are well equipped to deal with any changes taking place. It is therefore important that the universities have entrepreneurial leaders as academic staff members in departments offering entrepreneurship programmes, so that they can facilitate these entrepreneurship programmes and act as role models for students embarking on the journey to becoming entrepreneurs.

It is important to look at the context in which entrepreneurship is being taught, as many, if not all, of the models currently in use were designed and developed in Western Europe or the USA. It is therefore important that the current entrepreneurial context, role models and entrepreneurial culture are considered when introducing

students to the concepts of entrepreneurship and entrepreneurial leadership in South Africa.

2.9 Impact of role models on entrepreneurial intention

Pfeffer (1982) argues that in role theory, individuals in organisations occupy positions and that those positions have a set of activities, including interactions with others, that are required or expected as part of the job. Whoever becomes the occupant of that position will have the same expectations and demands placed on them as the previous occupant; therefore, the new occupant has to learn that role. Roles are taught by predecessors (role models) to those who succeed them, and this happens not only in the business world.

Parents that started survivalist enterprises were seen as role models by their children, therefore the children have continued by starting their own survivalist enterprises. Co (2003) posits that the influence of the environment on entrepreneurial behaviour, especially the exposure of an individual to entrepreneurship or to entrepreneurs, as role theory. He further argues that the same is true for entrepreneurship and that family and friends serve as role models for aspiring entrepreneurs. This is evident in Indian communities where businesses are passed down to children after the parents, who were role models to their children, retire or pass on.

It is interesting to note that Indian and white traders were given free access to townships to do business and sell products. According to Verhoef (2015), this was

opposed by the National Federated Chamber of Commerce (NAFCOC). The practice of entrepreneurship was therefore established within the Indian communities and more so in white communities, and role models were therefore embedded into families and business practices long before other black South Africans were given the opportunity.

A high percentage of entrepreneurs had fathers who were entrepreneurs or farmers themselves, as indicated in the literature (Co, 2003). On the other hand, the effect of fatherless households on the children as future entrepreneurs, and the future of entrepreneurship within the black communities, is evident today. The existence of role models who are entrepreneurs, and in this case survivalist entrepreneurs, perpetuates survivalist enterprises.

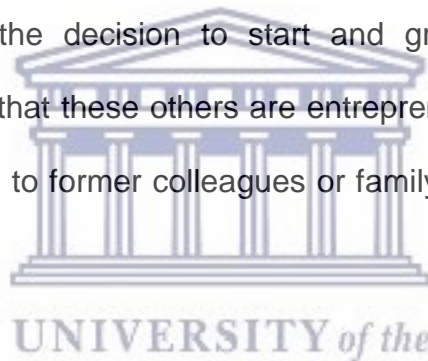
There is a need for role models who are running their own businesses, to encourage the further creation of SMMEs, which will result in increased employment and growth in the South African economy.

Co and Mitchell (2006) state that for the black population to be compensated for the economic imbalance due to the marginalisation of its workforce – not taking into account those currently unemployed – the black population will have to increase their entrepreneurial cadre by 11 times over the next 20 years, in the formal sector.

To understand the effects of the past, the next section considers the current entrepreneurship environment.

In Chapter 1, the effect of role models was briefly introduced to show the impact of role models on the perpetuation of survivalists' enterprises. This type of enterprise makes up the majority of businesses within the South African economy, as already mentioned. There is a need for larger and formalised business that will alleviate unemployment and contribute to economic growth. This section concentrates on the available literature pertaining to the effect of role models on the EI of students.

Numerous articles and books have been written about the influence of role models on entrepreneurs, which encapsulates the entrepreneurial endeavours and successes that influence these entrepreneurs (Bosman *et al.*, 2012). Many entrepreneurs claim that the decision to start and grow their businesses was influenced by "others" and that these others are entrepreneurs ranging from famous people such as Steve Jobs to former colleagues or family members (Bosman *et al.*, 2012).



The question that needs to be asked is: What is a role model? The literature provides many answers to this question; however, a common thread exists in the definition where a role model is an individual who can be aspired to by others and who can inspire and motivate individuals to make certain decisions and thereby achieve certain goals (Basow and Howe, 1980; Shapiro, Haseltine and Rowe, 1978; Wright, Wong and Newill, 1997).

The term "role model" was first coined by Merton (1957) in reference to those in a specific role who demonstrate the behaviour associated with the role. Gauntlett (2002) defines a role model as an individual that one can look up to and from whom

one can learn about character, values and aspirations. Lockwood (2006) defines role models as those who impart an achievable blueprint of success and in doing so establish the conduct required for success. Role models are those who are successful professionally who are imitated by others who are attempting to become as successful (Ibarra and Petriglieri, 2007). Morgenroth (2015) defines role models as those who influence the performance and motivation of admirers or those who aspire to be like them by acting as behavioural models and representations of possible goals.

Ajzen (1991) and Akerlof and Kranton (2000) support the view that the decision to engage in a particular behaviour is influenced by the behaviour and opinions of others (subjective) through the demonstration of identity and the examples they provide. Gibson (2004) states that the term “role model” is drawn from two theoretical constructs, namely:

- The concept of role and the tendency of individuals to identify with other people; and
- The concept of modelling and matching cognitive skills and patterns of behaviour between a person and an observing individual.

Bosman *et al.* (2012) state that individuals are attracted to role models who are perceived to be similar in characteristics, behaviour and goals (the role aspect) and from whom they are able to learn certain abilities and/or skills (the model aspect). Bandura's (1977) models of social learning add to this as his models are concerned with the acquisition of skills (the model aspect) and the motivational consequences of observing other individuals (the role aspect). Gibson (2003; 2004) adds that

theories of (role) identification and social learning can be used to explain role models.

Role models provide proof that certain goals are achievable and this would increase the desire to strive for a particular position or condition. Weber, Lu, Shi and Spinath (2013) add that both skills and motivation may contribute to the achievement of goals. Morgenroth (2015) iterates that the literature has identified a variety of factors that contribute to role model effectiveness and most notably has shared the similarities between role model and role aspirant, role sociability and warmth, role success and competence, and characteristics coupled with success.

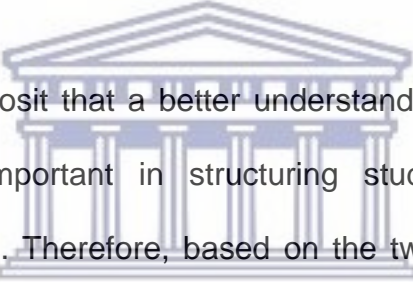
Role models can therefore encourage the drive to become an entrepreneur and make entrepreneurial ambitions a reality (Arenius and De Clerq, 2005; Koellinger, Minniti and Schade, 2007; Mueller, 2006). Scherer, Adams, Carley and Wiebe (1989) state that studies have shown that 35 to 70 percent of entrepreneurs have entrepreneurial role models. One of the reasons for this high percentage of entrepreneurs having role models is, according to Nauta and Kakaly (2001), the fact that role models provide entrepreneurs with practical support and advice similar to the relationship between a mentor and mentee. Furthermore, prospective entrepreneurs are thought to be further attracted to, and gravitate towards, entrepreneurship through the transference and understanding of entrepreneurial knowledge, which will become valuable later as they enter the entrepreneurial world (Dyer, 1994).

Various studies have established that role models have an effect on the EI of students (Krueger, Reilly and Carsrud, 2000; Scherer *et al.*, 1989; Van Auken, Stephens, Fry and Silva, 2006a, 2006b). Role models are normally seen as those who motivate and inspire people to perform certain behaviours, setting ambitious goals in educational and occupational settings that are relevant to members of a stigmatised group (Morgenroth, 2015). This can be done if the role model changes the attitudes and beliefs about a person's perceived ability to be successful in a new venture (Bosman *et al.*, 2012; Van Auken *et al.*, 2006b).

Expectancy-value theories have shown to predict various outcomes relevant to role modelling process such as behavioural intention (Meece, Wigfield and Eccles, 1990) and the intended effort (Renko, Kroeck and Bullough, 2012). To explain expectancy-value, Morgenroth (2015) states that expectancy refers to the perceived subjective likelihood of success, while value refers to the perceived desirability of said success. Knowledge can be conveyed in two distinct forms used to transfer knowledge to the student. Firstly, Davidsson and Honig (2003) state that knowledge that is easily documented and transferable and which can be reproduced is known as codified knowledge, whereas knowledge that is gained through experience, which cannot be documented easily and which is context specific is known as tacit knowledge. Davidsson and Honig (2003) add that tacit knowledge can be substituted by role models, as it is best transferred by face-to-face interactions with frequent contact. This means that lecturers with the proper entrepreneurial experience can facilitate the role of role models to students, especially students studying entrepreneurship, as the lecturer would provide the codified knowledge and tacit knowledge through

interactions. This will also assist students with no exposure to entrepreneurs, to have a role model in the lecturers to which they can aspire.

Lockwood (2006) argues that role models demonstrate that something is attainable, therefore having an entrepreneur role model will motivate students. Paice, Heard and Moss (2002) note that role models of good quality will always inspire and teach role aspirants by example while stimulating admiration and encouraging emulation. Morgenroth (2015) warns that if a role model is not aligned to the aspirant's goal, the role model will not be able to change the role aspirant's expectancy, in turn increasing motivation regardless of the level of attainability.



Van Auken *et al.* (2006a) posit that a better understanding of the influence of role models on EI can be important in structuring students' experiences in an entrepreneurship curriculum. Therefore, based on the two opposing views and the relationship that has been developed between human capital (individuals' knowledge and competencies obtained from experience) and role model presence, it has been found that more highly educated people will benefit more from information provided by role models. On the other hand, research also shows that where role models are too successful it may decrease the role aspirants' expectancy of success (Hoyt and Simon, 2011).

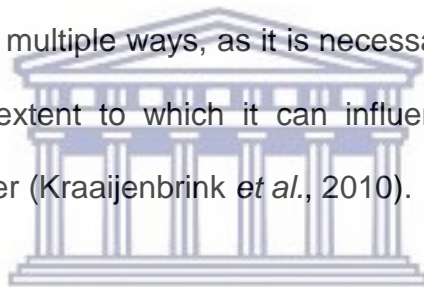
Scherer *et al.* (1989) found that the role model's performance is not as important as having a role model, and such studies add strength to the argument that role models affect EI and that a role model is sufficient to develop the desire and self-efficacy to become an entrepreneur.

According to Van Auken *et al.* (2006b) previous studies have indicated that intention, including EI, is among the best predictors of a planned behaviour. Noel (2002) found that students studying entrepreneurship have higher intentions to start a business than non-entrepreneurship students. Intention becomes an essential component when explaining behaviour, as an indication of the person carrying out the entrepreneurial behaviour (Liñón, 2004). In addition, intention also captures the three motivational factors that influence behaviour, namely perceived behavioural control, attitude towards behaviour, and perceived social norms (Ajzen, 1991).

This study researched, in part, the impact of role models on the EI of students. As such, this section showed the importance of role models in establishing and inspiring entrepreneurs. The impact of role models is far reaching, as it contributes to the success of the role aspirant, which in this case is the entrepreneurship student. The literature has shown that successful entrepreneurs have role models to whom they aspire and that they achieve the goals they have set for themselves. An important component in becoming an entrepreneur is therefore that students identify role models as early as possible in their pursuit of becoming entrepreneurs. This is especially true for students that do not have access to entrepreneurs in their family or friendship circles. It therefore makes perfect sense that lecturers act as role models for students as an initial step to motivate these students further. Resources and opportunities within the university ecosystem play a pivot role that impacts EI.

2.10 Resources and opportunities at universities

Researchers have researched and analysed the impact of entrepreneurship education on students' EI (e.g. Peterman and Kennedy, 2003; Souitaris, Zerbinati and Allaham, 2007) however, the role that a university's environment, namely the contextual and situational factors, plays in the development and nurturing of the EI of students has not been the focus of very many studies (Trivedi, 2016). Researchers such as Garavan and O'Cinneide (1994) and Turker and Selcuk (2009) have argued that entrepreneurship education in general, and the university education system in particular, has an important role to play in shaping EI among students. Universities need to support students in multiple ways, as it is necessary to understand the effect of such support and the extent to which it can influence students' attraction to entrepreneurship as a career (Kraaijenbrink *et al.*, 2010).



Luthje and Franke (2003) underline the importance of contextual factors in the university ecosystem, which could either inhibit or facilitate the occurrence or intensity of entrepreneurial behaviours of technology students. Johannisson (1991) and Autio, Keely, Klofsten, and Ulfstedt (1997) also highlight the importance of the impact on students' perception of entrepreneurship that the resources, other support structures and available mechanisms play in the university environment and how these positively influence the students' attitude towards entrepreneurship.

Fini, Grimaldi, Marzocchi, and Sobrero (2009) add that university support mechanisms influence entrepreneurial activities. Luthje and Franke (2003) also found that as much as the university environment can positively influence and

motivate students entrepreneurially, it can also create obstacles for students. This is supported in an empirical study conducted by Luthje and Franke (2004), who found that if universities do not provide either the start-up knowledge or key resources and support services to start a new venture, students' EI will diminish. Luthje and Franke (2004) concluded that the university ecosystem has a greater impact on EI than personality traits or socio-economic factors. With the lack of empirical research linking university environment and support to students' EI, Kraaijenbrink *et al.* (2010) suggested a framework that has been used by several researchers. The framework provides three types of support for entrepreneurial attitude, namely:

- Education support;
- Targeted cognitive support; and
- Targeted non-cognitive support.

Education support is one of the major functions of a university and teaching institutions and is expected to build entrepreneurial awareness and develop skills necessary to become an entrepreneur.

Targeted cognitive support is related to encouraging students to start a small business or develop a new business model, which greatly enhances confidence to start a small business (Gorman and Hanlon, 1997). Targeted non-cognitive support related to the provision of seed-funding or incubation facilities is given in the later stages of the entrepreneurship process. Wang and Wong (2004) agree that educational support directly influences the entrepreneurial ambitions of students. Trivedi (2016) adds that this type of support will move from traditional teaching roles to a more business promotion role by providing cognitive and non-cognitive support.

The researchers have therefore confirmed the importance of university support, the university environment and university ecosystem as an important component when considering the impact on university students' EI. The university has thus progressed from a traditional knowledge generation institution to a living entrepreneurial ecosystem that enhances the concept of an entrepreneurial / entrepreneurship university.

2.11 Entrepreneurship education in the commerce faculty context

As mentioned previously, education was used as an oppressive tool and was part of the legislated laws that enforced segregation among the people of South Africa. The majority of South Africa were marginalised and received a lower or lesser quality of education. Reddy (2004) reports that in 1948, when the Nationalist Party won the elections, the percentage of enrolled black students was 4.8%. According to Van Gensen (2005) the National Party introduced a new interventionist character into the State and civil society as it relates to the terrain of higher education.

The subjects taught at various levels of education to the various racial groups were decided upon by what Jansen (2002) refers to as a State-controlled and maintained education policy, which was designed to ill-equip non-white learners.

It was therefore a strategy, by government, that universities served the economic structure of South Africa by focusing on producing graduates with a mindset that favoured big business in the formal sector (Co and Mitchell, 2006).

After the democratically elected government came to power, it focused on the education sector to address the past injustices. Van Gensen (2005) adds that the provision of higher education should be expanded based on the structural changes in the South African economy and the shifts in the labour market. Van Gensen (2005) stated that, these shifts emphasise the shortage of high-level professionals and managerial skills, particularly in the economic-based and science fields. This speaks directly to those responsible for curricula design, and in this case entrepreneurship education at institutions, which will be the focus of the next chapter.

The economy is an organic system that grows and declines, expands and shrinks, and is in constant flux, which means that the needs of the economy changes. The needs of the economy have to be monitored constantly to ensure that there is a relationship or interrelationship between higher education institutions and the economy and whether it is aligned or in synch. Nicolaidis (2011) supports this view by positing that universities should link research more closely to the market.

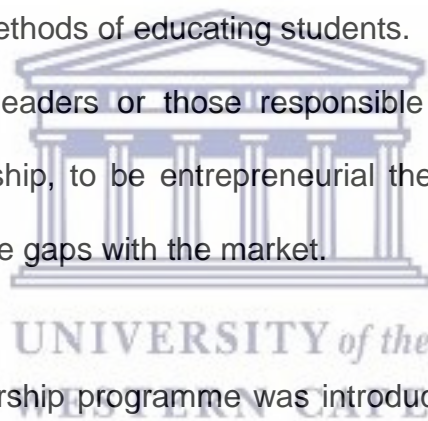
Universities, more than ever, need to reposition themselves in the role they play in the economy, the society and the education of future generations in their offering. To achieve this new position, universities cannot stand in isolation when educating future entrepreneurs in such a dynamic economic environment. The needs of the economy and its survival require South Africa to focus on entrepreneurship education at higher education institutions (HEIs). It has become clear through this chapter that education in entrepreneurship is one of the most important aspects in the future of entrepreneurship.

2.12 The current situation of entrepreneurial education

Entrepreneurial education is important to the success of future entrepreneurs. It is therefore important that HEIs remain current with the offering of entrepreneurship programmes and modules. The currency is based on the challenges and opportunities that are being faced in the current economy.

To pre-empt and to compensate for any changes within the economy, to prepare future entrepreneurs, a link between academic research and the practical working environment has to be established through research, to be further embedded to ensure the best possible methods of educating students.

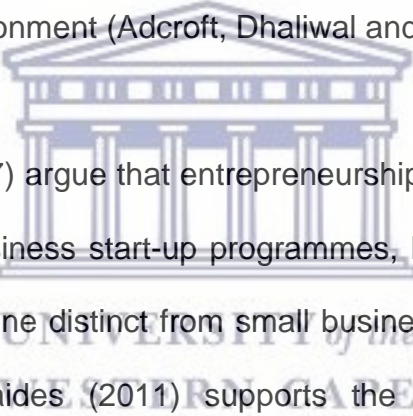
It is therefore up to the leaders or those responsible for offering the curricula, pertaining to entrepreneurship, to be entrepreneurial themselves in the process of identifying and exploiting the gaps with the market.



Since the first entrepreneurship programme was introduced in 1947 at the Harvard Business School, entrepreneurship programmes at higher education institutions (HEIs) have grown rapidly (Kuratko, 2005; Solomon, 2007). With the changes in the business and socio-economic landscape, it is now expected that universities, with the traditional role of knowledge generation, play a key role in transferring knowledge from the business world to industry and society as a whole (Main, Fayolle and Lamine, 2012).

HEIs are regarded as the custodians of knowledge in society and play a very significant role in developing a nation, therefore the realisation has dawned upon

HEIs that entrepreneurship is not a niche activity even though there has been an increase in entrepreneurship programmes since 1998 (Nicolaidis, 2011). Katz (2003) supports this view that there has been an increase in entrepreneurship programmes globally, however Kuratko (2005) and Matlay and Carey (2007) add that participation in such programmes does not always lead to the emergence of entrepreneurship. The increase in university entrepreneurship education programmes reflects an understanding that entrepreneurship education promises to support potential entrepreneurial outcomes (Nabi and Liñán, 2011; Rideout and Gray, 2013). The understanding has often been driven by the belief that education is the best way to provide students with the necessary knowledge and skills required to prosper in the working environment (Adcroft, Dhaliwal and Willis, 2005; Kirby, 2003).



Mentoor and Friedrich (2007) argue that entrepreneurship must not be made up of a loose grouping of small business start-up programmes, but rather that it should be treated formally as a discipline distinct from small business development, deserving its own curriculum. Nicolaidis (2011) supports the argument by noting that entrepreneurship should be a separate stand-alone course or programme and that there should be careful separation of business skills, however important, and entrepreneurial skills, rather than making them part of business management. Liñán (2004) argues that management training is seldom concerned with the traits, skills, attitude or intentions of participants, but mainly focuses on the technical knowledge of administering a business, and therefore management training is not interested in the creation process of an independent entrepreneurial project, whereas the opposite is true for entrepreneurship.

In entrepreneurship education literature there is still a question about the successful integration of entrepreneurship into a curriculum (Gibbs, 1999; Hannon, 2006), how it benefits the student (Chell and Allman, 2003) and the effectiveness of formal and informal entrepreneurship education (Hytti and O’Gorman, 2004).

Davies (2001) noted that HEIs can provide the necessary support for students of entrepreneurship by developing their entrepreneurial traits, as well as validating their entrepreneurial endeavours. Co and Mitchell (2006) mention that HEIs can help create a more entrepreneurial temperament among young people by inculcating a clear understanding of the risks and rewards associated with businesses, teaching opportunities seeking and recognising skills, as well as the creation and destruction of enterprises. Liñán (2007) supports this view and adds that developing opportunity recognition abilities through creativity and other acquired skills will promote both the possibility of becoming an entrepreneur and a more favourable personal attitude towards entrepreneurship. Previous studies have concluded that entrepreneurship education and training can influence the behaviour and future attitude of students (Fayolle, Gailly and Lassas-Clerc, 2006).

Entrepreneurship as a phenomenon will be fully understood by the students who will become competent stakeholders of entrepreneurship at every level (Maranville, 1992). Although universities can support entrepreneurship in many objectively measured ways, it is important to understand the effect of such measures, as it is crucial to monitor the extent to which it can impact on the students (Kraaijenbrink, Bos and Groen, 2010).

HEIs will also have an influence on students and will create and develop an entrepreneurial culture among the students and within society when the education system is supported by economic and political institutions to ensure the facilitation and actual establishment of enterprises (Co and Mitchell, 2006). This speaks to the context of entrepreneurship development. Based on the fluctuations of various economies in the past, several stakeholders, including educational institutions, have reinforced the need to develop a sound entrepreneurial culture to stabilise economies and create opportunities for growth (Liñán, 2007).

Tijssen (2006) adds that several scholars have considered universities to be the seedbeds for fostering entrepreneurial spirit and culture. Audretsch (2012) argues that with the traditional transferring of knowledge in terms of patents, spin-offs and start-ups, universities should also contribute towards the provision of (entrepreneurial) leadership thinking for creating entrepreneurial capital within society. Liñán (2007) adds that in-service education and connecting entrepreneurship training and enterprise development could help equip students with the skills and experience necessary to operate their own successful businesses. Therefore, student venture creation skills, knowledge and attitudes that are enhanced (Greene and Saridakis, 2008) and overall job creation coupled with graduate business start-ups (Greene, Katz and Johannisson, 2004; Rideout and Gray, 2013) are all contributing factors towards economic development and growth (Bosma, Acs, Autio, Conduras and Levine, 2008).

Norton, Kaplan and Hofer (1999) note that the problem is that there are no acceptable paradigms or suitable theories as to what entrepreneurship education

should encompass. Nicolaidis (2011) adds that to overcome such a major challenge, South African universities have to embark on meaningful research that is closely linked to the market, thereby creating an understanding of how to develop a relationship between education and the workplace.

This would entail expanding the scope of universities from their current role as knowledge generators to one of entrepreneurial enablers (Liñón, 2007). This would enable the conceptualisation of an entrepreneurship / entrepreneurial university (Urbano and Guerro, 2013) that shapes EI among students by encouraging and developing a positive attitude and influencing self-perception about the inner ability to start and successfully manage a business venture. According to Tijssen (2006), the value of entrepreneurial universities lies in their economic outputs (such as licences, patents and start-up firms) and technology transfer mechanisms.

Gibbs (1999; 2005) suggests that there are three major objectives for effective entrepreneurship education, namely:

- Developing a broadly knowledgeable entrepreneur (Chen, Greene and Crick, 1998; Jack and Anderson, 1999);
- Developing an entrepreneurial mindset (Loudon and Smither, 1999); and
- Being knowledgeable in starting and running a business effectively (Solomon Duffy and Tarabishy, 2002).

Liñón (2007) suggests that when different existing education initiatives are studied, a definition for entrepreneurship education could serve as a reference framework for analysis and classification as follows:

- The framework needs to include all educational activities and not only those developed within an education system;
- The framework must include broader objectives than the diffusion of an entrepreneurial culture or the creation of enterprises; and
- The role of instructors must be clearly established.

Liñón (2007) argues that this definition allows for a clear distinction between entrepreneurship education and management training.

McMullan and Gillin (1998) specify six differentiating elements of an entrepreneurship education project, namely:

- Objectives that are pursued;
- Faculty or teaching team that will be importing the project;
- Participating students;
- Course content;
- Teaching methods; and
- Specific support activities for the participants to start their venture.



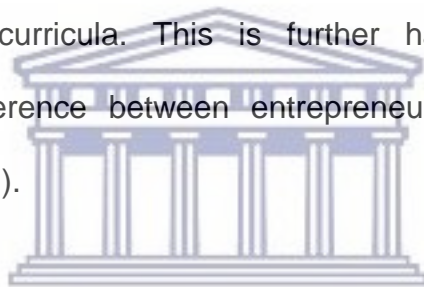
Curran and Stanworth (1989) define the main types of objectives pursued by entrepreneurship education as follows:

- Entrepreneurial awareness education;
- Education for start-ups;
- Continuing education for entrepreneurs; and
- Education for entrepreneurial dynamism.

Curran and Stanworth (1989) concede that the four objectives mentioned above still need a lot of research to broaden the knowledge base, to perfect teaching techniques, to improve effectiveness and for the full potential to be realised.

Young (1997) defines entrepreneurship education as a structural form of carrying over entrepreneurial knowledge, while Anderson and Jack (2008) describe entrepreneurial knowledge as concepts, skills and the mentality required by an enterprise owner / manager.

Antonites and Van Vuuren (2004) maintain that entrepreneurship education and training is possible; however, there is a lack of consensus about the appropriate content of context and curricula. This is further hampered by the lack of understanding of the difference between entrepreneurship and small business management (Davies, 2001).



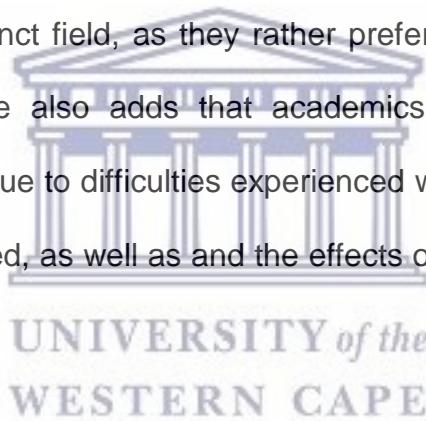
Laukkanen (2000) identifies and distinguishes between two areas of entrepreneurship education, namely:

- Education *about* entrepreneurship; and
- Education *for* entrepreneurship.

Education *about* entrepreneurship is mainly based on constructs and transference of knowledge about the field of entrepreneurship, whereas education *for* entrepreneurship focuses on the learning experience and development of competencies, skills, aptitudes and values (Postigo and Tamborini, 2002). Mentoor and Friedrich (2007) state that many enterprise education programmes also have a product-oriented or “know-what” approach rather than a customer-oriented or “know-

how” approach. Therefore, universities have to move toward teaching “for” entrepreneurship and use the “know-how” approach to equip students to become better and more successful entrepreneurs. This was labelled by Norman and Spohrer (1996) as the arrival of the education revolution. McIntyre and Roche (1999) affirm that entrepreneurship education is the process of providing individuals with the skills to recognise opportunities and entrepreneurial concepts that others have missed, and to have the insight and self-esteem to act where others have hesitated.

Davies (2001) commented that the mindset of academics hampers the implementation of entrepreneurship programmes and the introduction of entrepreneurship as a distinct field, as they rather prefer to blend it with traditional business management. He also adds that academics are reluctant to develop entrepreneurship courses due to difficulties experienced with the revision of curricula when courses are introduced, as well as and the effects of funding and the feasibility of these new programmes.



Coupled with the revision of curricula as mentioned above, and to make this even more challenging, Anderson and Jack (2008) argue that entrepreneurship education is a difficult area to lecture due to issues of variability, complexity and contingency.

Co and Mitchell (2006), in their article “Entrepreneurship education in South Africa: A nationwide survey”, reported on research with the following specific aims:

- To assess entrepreneurship education at South African HEIs;
- To ascertain the importance of entrepreneurship in South African HEIs; and
- To make recommendations on improving entrepreneurship education.

A survey was conducted, and 15 universities that had launched entrepreneurship programmes responded to the survey questionnaires. The two sets of results or findings from the research paper that are considered and which add value to the purpose of this study are:

- Courses offered within the area of entrepreneurship; and
- The importance of entrepreneurship in the respondents' universities.

The programmes offered at universities under the banner of entrepreneurship and small business management, in the research article, support Mentoor and Friedrich's (2007) argument that entrepreneurship is made up of a loose grouping of small business start-up programmes. The results of the survey, when asked about the courses offered in the area of entrepreneurship and small business management, were as follows: Entrepreneurship, as a programme, was offered by 90 percent of universities that participated in the survey. Small business management was offered by 77 percent; new venture creation and small business finance was offered by 52 percent; franchising was offered by 39 percent; innovation and technology was offered by 35 percent; growth management was offered by 29 percent; family business and creativity management was offered by 23 percent, and venture capital was offered by 19 percent of the universities that participated in the survey.

Table 2.6 and Figure 2.1 below tabulate and graphically depict, respectively, the findings of the survey that was conducted.

Table 2.6: Courses offered in the area of entrepreneurship and small business management

Course	Percentage
Entrepreneurship	90
Small business management	77
New venture creation	52
Family business	23
Innovation and technology	35
Franchising	39
Small business finance	52
Venture capital	19
Creativity management	23
Growth management	29

Source: Co and Mitchell (2006)

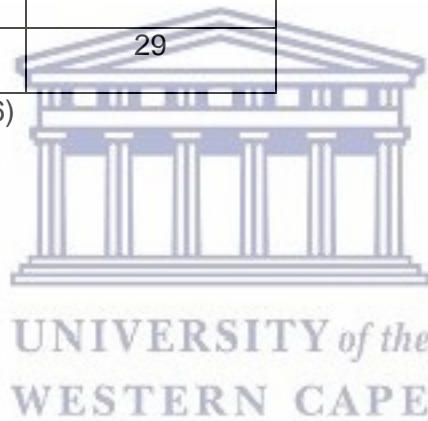
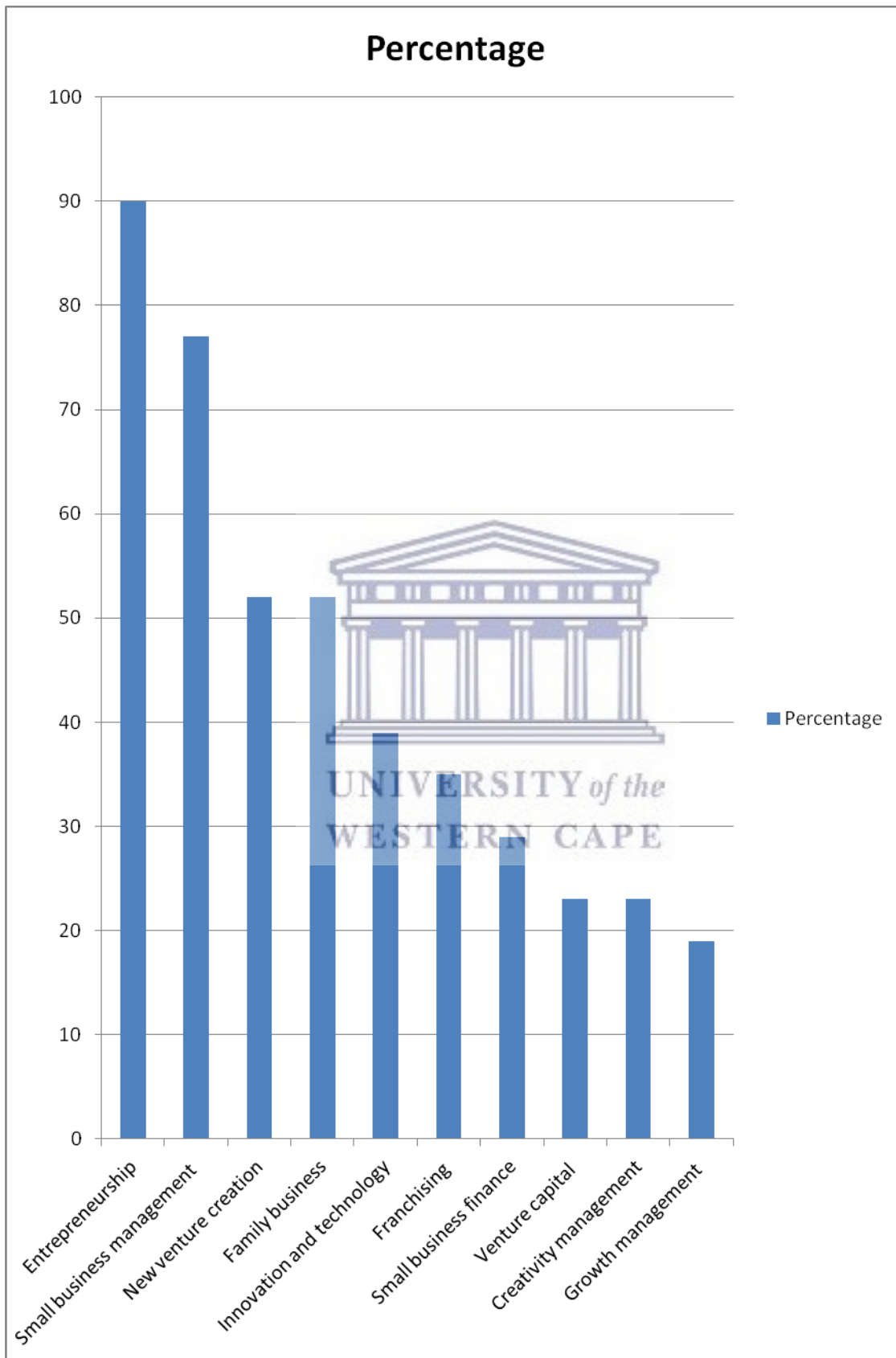
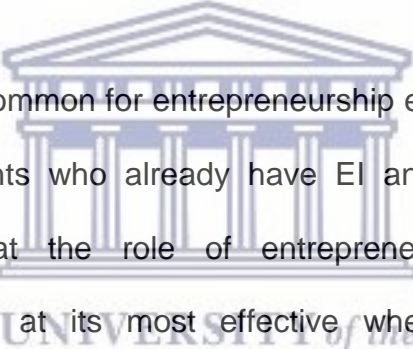


Figure 2.1: Graphical representation of Table 2.5



Kroon and Meyer (2001) conducted a study of university students taking an entrepreneurship course and concluded that even though there was a strong drive or push for entrepreneurship education at tertiary institutions during the 1990s, that exposure to one course did not ensure entrepreneurial orientation or entrepreneurial ability and did not lead to entrepreneurship as a career choice. Nicolaidis (2011) stated that there is a strong relationship between education level and entrepreneurial activity, which leads to the failure or success of business ventures. In the literature it is stated that entrepreneurship knowledge and skills can be taught and developed provided that an entrepreneurial environment is provided as well (Gibbs, 2005; Kuratko, 2005).



Liñán (2007) believes it is common for entrepreneurship education to concentrate on and cater for those students who already have EI and who have identified an opportunity. He adds that the role of entrepreneurship education in the entrepreneurial process is at its most effective when the two modalities of entrepreneurial awareness and entrepreneurial enthusiasm are integrated together (Liñán, 2007).

Friedrich and Visser (2005) state that the ratio of entrepreneurs to non-entrepreneurs in South Africa is approximately 1 to 52, whereas in other developed countries the ratio is 1 to 10. Therefore, South Africa needs to become more competitive as the face of the workforce and the type of work changes, which means that the skills necessary for socio-economic growth have to be reassessed (King and McGrath, 2002). Rather than seeking waged employment in the corporate world, an increasing

number of students prefer to start their own business venture based on a unique idea with minimal seed capital (Liñón, 2007).

Universities all over the world are offering entrepreneurship programmes which are driven by two factors, namely the needs of society and the growing number of aspirant students wanting to enter entrepreneurship (Postigo, 2002). Hatten and Ruhland (1995) analysed the effect of entrepreneurship programmes on the students' attitude towards entrepreneurship and concluded that attitude towards entrepreneurship can be measured and changed (Ede, Panigrahi and Calcich, 1998; Robinson, Stimpson, Heufner and Hunt, 1991; Wang and Wong, 2004).

Nicolaidis (2011) mentioned that another major challenge facing entrepreneurship in HEIs is the lack of suitably qualified academic staff to teach and make the subject understandable and meaningful to students.



In their survey, Co and Mitchell (2006) questioned the importance of entrepreneurship as a subject field at their respective universities. To further develop entrepreneurship programmes and materials for entrepreneurship programmes at universities, more entrepreneurship academics with PhDs are required to fulfil the role and take up the task. Table 2.6 below shows the interest of the various levels of students regarding the importance of entrepreneurship. Focusing on the level of importance to PhDs students, based on the respondents' answers, entrepreneurship is not regarded as very important or even important, as Co and Mitchell (2006) report that most students tend to focus on more traditional subjects such as strategic management, human resources management, etc. The results from the survey show

that there will be problems for entrepreneurship and its development within tertiary institutions in the future, as there will not be the required number of academics to facilitate growth through research. The results could also be interpreted as the lack of exposure of students to the field of entrepreneurship, as the aforementioned traditional subjects are aimed to be practised within big business with sufficient exposure through the education system.

Table 2.7: Importance of entrepreneurship in respondent's institutions

Level	Very important	Important	Not important
Undergraduate	35	32	10
Master's	19	42	10
PhD	13	23	13
Diploma	16	16	10

Source: Co and Mitchell (2006)

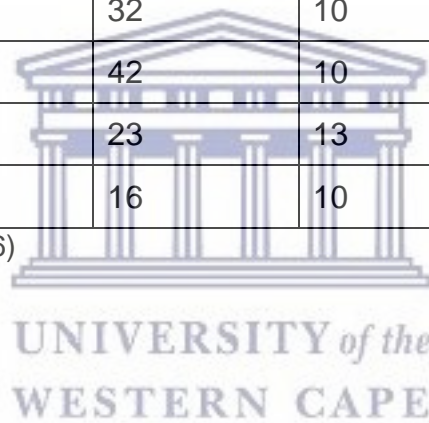
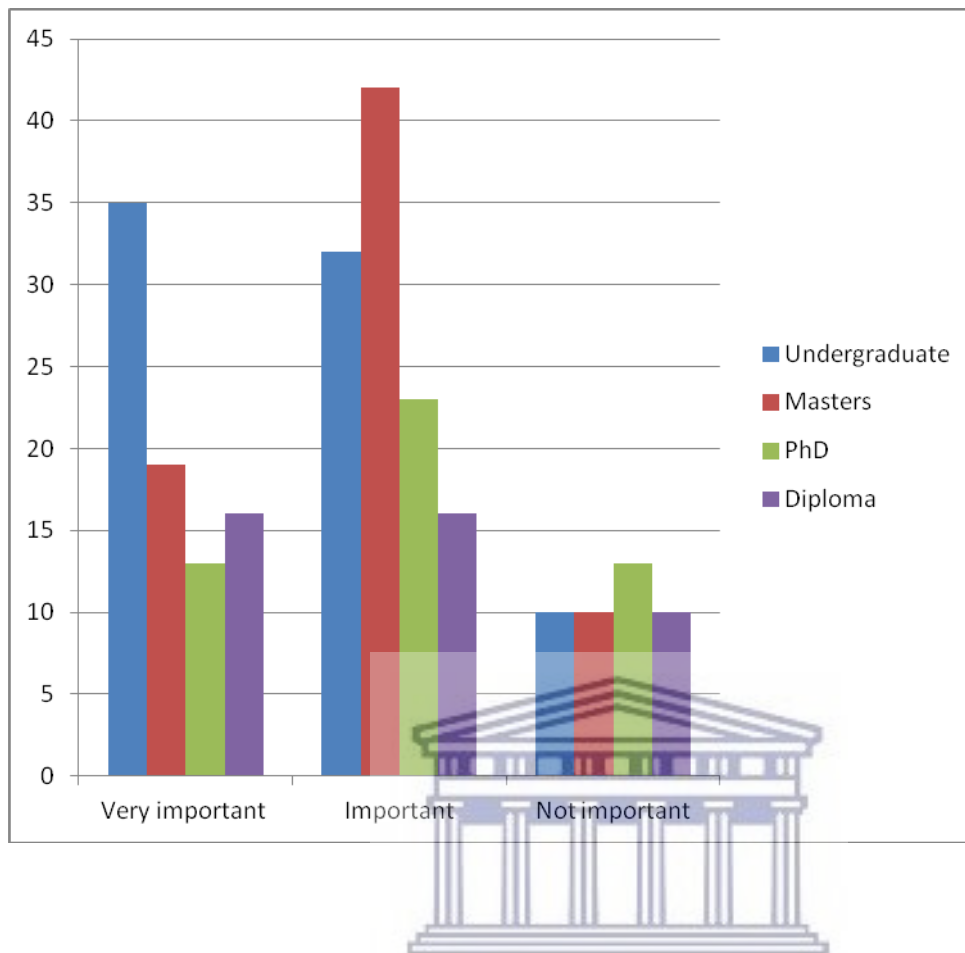


Figure 2.2: Graphical representation of the results in Table 2.6.



Some faculties have an excess of PhD academics who cannot find suitable employment within their field of expertise, and entrepreneurship on the other hand has far too few suitable academics (Pfannestiel, 1998). Therefore these mismatched PhD academics end up teaching entrepreneurship without the necessary skills or passion, which has an effect on the inculcation of entrepreneurial culture, and the potential of the lecturer assuming the role of entrepreneurial role model is therefore lost. Mentoor and Friedrich (2007) iterate that the influence of role models can play a major part in the selection or rejection of self-employment as a career path; however, these role models come not only from the business community but also from academics themselves who are involved in entrepreneurial activities. Hannon (2006) admits that the effectiveness of entrepreneurship programmes can be diluted by

issues associated with quality, coherence and purpose. Fayolle *et al.* (2006) argue that entrepreneurship education varies from one country to another and from one university to another in relation to objectives, audience format and pedagogy.

Davies (2001) states that the majority of South Africans have grown up with little home experience of business innovation or entrepreneurship and therefore have a limited view of themselves as resource creators. Hytti and O’Gorman (2004) and Pittaway and Cope (2007) mentioned that there is an ongoing debate around entrepreneurial experience as an essential component of an effective entrepreneurship education programme.

The need for practical entrepreneurial development and practical entrepreneurial training has been identified, mostly by people outside of commerce faculties that facilitate entrepreneurship programmes and in some cases non-academics, leading to the establishment of entrepreneurship centres at universities. Liñán (2007) argues that formal education systems foster the belief that higher education is the only way to achieve professional advancement and success, creating the perception that vocational expertise is distinctly inferior to academic knowledge. These entrepreneurship centres have become the custodians of entrepreneurship at universities, promoting entrepreneurship among students. The programmes on offer are attended by registered students and those that are not necessarily registered at the university; however, they are also attended by those who want to start their own businesses and those who are existing business owners. These centres have operated across “social borders” by facilitating an outreach programme approach that has seen programmes being offered by centres at the other universities within

the province, within poor communities and communities in need of development and where there are entrepreneurs.

The education is usually offered at a minimal fee or at even no charge as these centres have taken it upon themselves to lobby for funding at the various local government agencies and/or through corporate sponsorships and/or trust funds that has been set up to facilitate a process of social upliftment by encouraging entrepreneurship.

The Bertha Centre for Innovation and Entrepreneurship is one such centre, which focuses on social innovation and entrepreneurship and is funded by the Raymond Ackerman Fund however, the Bertha Centre is part of University of Cape Town and works closely with and is affiliated to the Graduate School of Business (GSB). The University of the Western Cape (UWC) has established the Centre for Entrepreneurship and Innovation (CEI), which focuses on entrepreneurship development and training for students and practising entrepreneurs through workshops, entrepreneurship expos and student start-up master classes. Stellenbosch University's commerce faculty's Business School (USB) has established the Centre for Entrepreneurship, which hosts master classes and practical start-up programmes to assist student entrepreneurs in establishing their own businesses. Cape Peninsula University of Technology (CPUT) has a similar centre called the Business and Entrepreneurship Centre where entrepreneurs are groomed and developed for the future.

It has to be emphasised that these centres operate independently, either with funding from educational funders and sponsors or on their own, separate from the commerce faculties of the respective institutions. This further emphasises the disconnection between those offering academic programmes and the relevance to the practicality of the business world being offered at these centres.

As stated previously, entrepreneurs are needed for the growth of the South African economy and to alleviate unemployment, therefore a pipeline of young entrepreneurs needs to be created with the support of the government. It is therefore important to reiterate that there is a need to grow entrepreneurship programmes at South African universities that enhance the skills of venture creation, entrepreneurship skill and attitudes, as suggested by Greene and Saridakis (2008), to encourage graduate business start-ups and overall job creation, as mentioned by Greene *et al.* (2004) and Rideout and Gray (2013). This will ultimately contribute to economic growth and development (Bosma *et al.*, 2008).

Government has made funds available for the development of youth entrepreneurs through the Department of Trade and Industry as an initiative to further stimulate growth in entrepreneurship among the youth. However, this initiative has been targeted at youth entrepreneurs that require more than R1 million in funding, which does not speak to youth entrepreneurs who are just starting out or youth entrepreneurs who do not require that amount of funding. Coupled with all the necessary documentation to be in place as a further requirement, the impoverished, uneducated youth could be excluded from this process.

Government has not identified with the student entrepreneurs as a specific group but rather under the broader banner of the youth and other groupings where support can be obtained from the Small Enterprise Finance Agency (SEFA) and Small Enterprise Development Agency (SEDA), which offer financial and non-financial support respectively. Non-financial assistance in the form of mentorships and management consultants would apply to those who are existing business owners and have been running businesses for some time.

There is currently no government assistance that is directly related to entrepreneurship education that affects entrepreneurship students directly at HEIs. HEIs and local government agencies, such as the Department of Economic Development, need to collaborate and start joint initiatives that support not only the education and training of established entrepreneurs in the formal sector, but include tertiary level students as well. Government needs to fully support such initiatives and promote education (Nieuwenhuizen and Kroon, 2002).



2.13 The current environment of entrepreneurship

Policymakers are starved of information regarding the growth cycles and dynamics that affect SMMEs at various stages of development, ranging from survivalist businesses to the potentially high-growth entrepreneurial firms (SBP, 2014b). In the case of survivalist enterprises, it is difficult to ascertain or obtain this kind of information, as many of these businesses operate in the informal sector with little or no financial or other information. This makes it difficult for departments and

government at large to “peg” where the businesses are at and whether there is growth or not.

Furthermore, SBP (2014a) adds that a lack of empirical information has led policy decisions to rely on anecdotal, theoretical or ideological information as foundations for the decisions being made. It can therefore be deduced that the information that is being used informs policy incorrectly and therefore policy does not speak to the “real” issues and problems experienced in the sector.

CPLO (2013) noted that the current entrepreneurial activity can be used as an indicator for future SMMEs as small business owners, or tomorrow’s or today’s entrepreneurs.



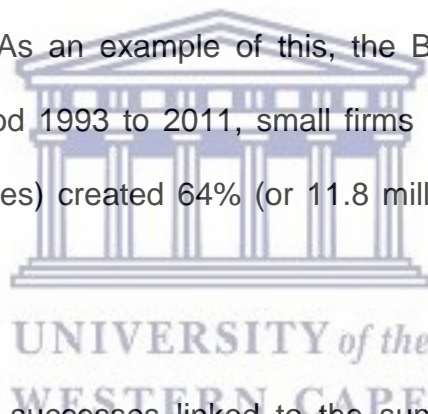
Peyper (2013) noted that the Minister of Trade and Industry, Rob Davies, has reported that more than 70% of small businesses fail every year in South Africa compared to 70% of small businesses that survive at least two years, according to the US Small Business Administration.

According to the GEM Report (GEM, 2013), 37.8% of the adult population in South Africa thinks that there are good opportunities to start a business, compared to the 74.5% on average in other Sub-Saharan countries. Similarly, 42.7% of adult South Africans believe that they have the capabilities needed to start a business, whereas 78.9% on average in other Sub-Saharan countries believe the same. The World Bank (2014) ranks South Africa 41st for ease of doing business and 64th for ease of starting a business out of 189 economies, meaning that it is not all bad news.

To further improve and encourage entrepreneurship and small business development, a headline report of SBP (2014a) identified chief impediments to growth such as:

- Lack of skilled staff,
- Burdensome regulations,
- Local economic conditions,
- Lack of finance, and
- Cost of labour.

The creation of small business development and entrepreneurship is vital to the success of the economy. As an example of this, the Bureau of Labour Statistics states that during the period 1993 to 2011, small firms (defined in the US as less than five hundred employees) created 64% (or 11.8 million of 18.5 million) of new jobs (BLS, 2013).



Based on other countries' successes linked to the support of entrepreneurs and small business development by governments, the South African government has developed a National Development Plan (NDP) 2030 that highlights issues of concern. As mentioned earlier, the plan does not give solutions – rather it only highlights the issues that should be addressed for success.

2.14 The future of entrepreneurship according to the NDP

The National Development Plan (NDP, 2013) states that small and expanding firms will increase in number and generate the majority of newly created jobs. They will

also continue to change the apartheid legacy patterns of business ownership. These small and expanding firms will be stimulated through public and private procurement (B-BBEE Act), improved access to debt and equity finance, and a simplified regulatory environment.

The NDP has proposed a highly aggressive economic growth strategy in which SMMEs play a significant role, and one of its major economic goals is to reduce unemployment to 6% by 2030 (NDP, 2013). This means that for South Africa to achieve this particular goal, it has to generate 11 million additional jobs, which would require real GDP to grow by 5.4% annually by 2030. However, the South African Reserve Bank (SARB) predicts growth of only 3% annually (SBP, 2014b).

To achieve these targets the NDP for 2030 has envisaged that SMMEs, small and expanding firms, will have to create 90% of new jobs. This, despite the fact that South Africa only has half of the total early-stage entrepreneurial rates of other developing economies (GEM, 2013). The NDP touches broadly on how this can be achieved; however, no specific recommendations or policy proposals are made.

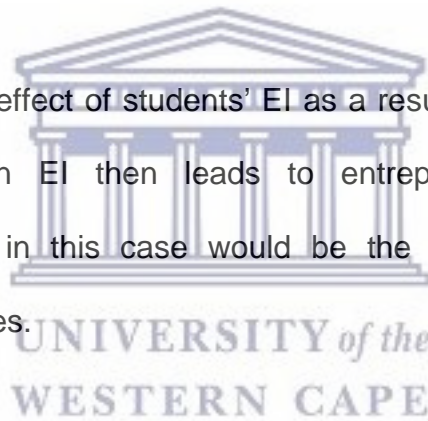
It has been mentioned in many GEM reports that education and training or the lack thereof and training is an inhibitor of entrepreneurial growth in South Africa (Nicolaidis, 2011).

2.15 Conceptual Review

Entrepreneurs are needed in the South African economy to alleviate unemployment and create economic growth. More entrepreneurs entering the economy will lead to an increase in the number of businesses, which will impact the number of people employed in the country.

Higher education institutions that offer entrepreneurship degrees, diplomas and entrepreneurship modules are considered as the pipeline of entrepreneurs that would enter the economy after graduating from universities with these qualifications.

This study researches the effect of students' EI as a result of four cognitive factors. The resulting increase in EI then leads to entrepreneurial behaviour. The entrepreneurial behaviour in this case would be the entrepreneurship students starting their own businesses.



Starting new businesses would eventually lead to business owners employing people, therefore impacting the level of unemployment in the economy. The increase in employment will lead to poverty alleviation and economic growth. It is hoped that the increase in entrepreneurs and small businesses would lead to others being encouraged to start businesses.

Figure 2.3 below is a graphical representation of the conceptual framework of this study.

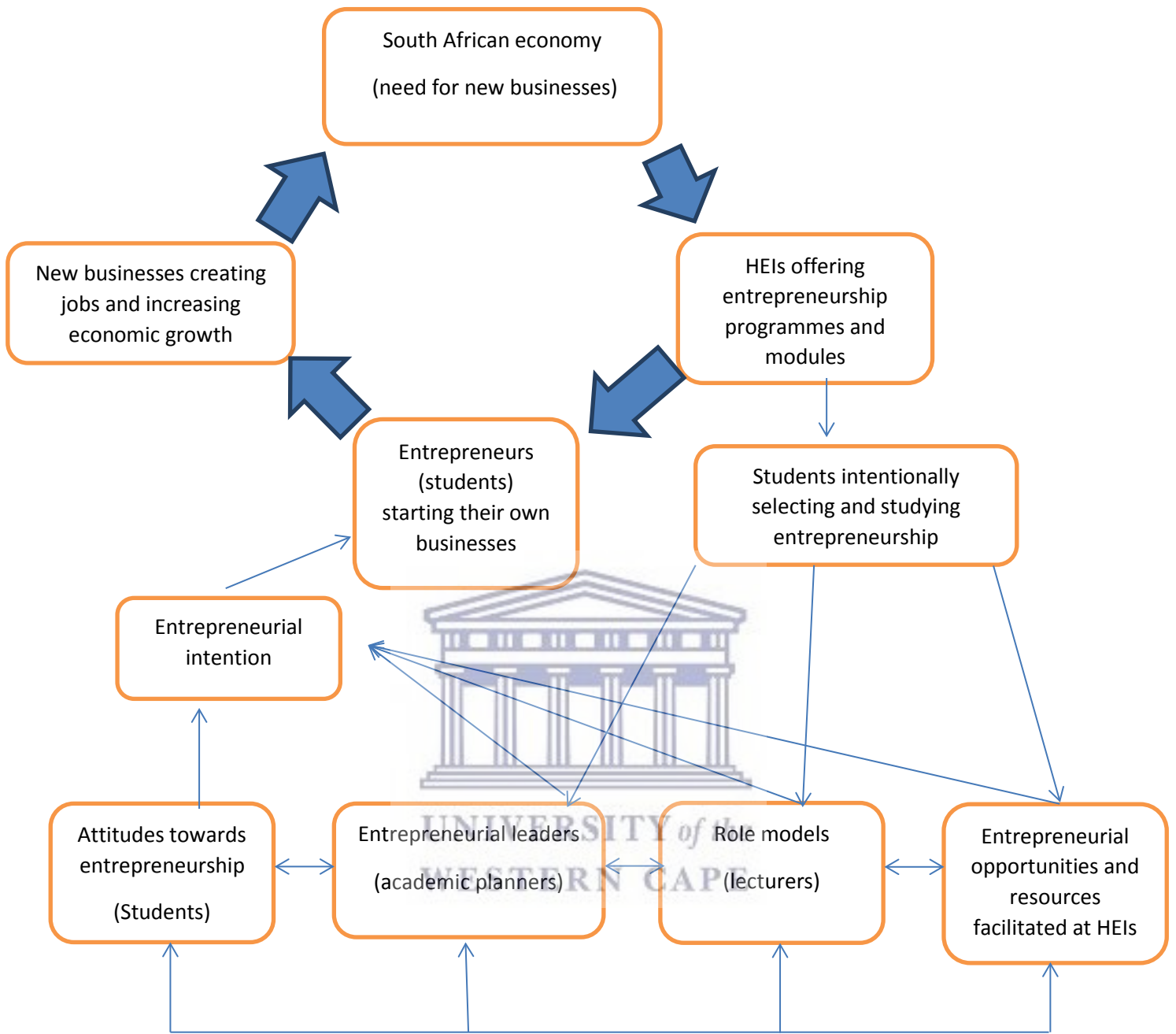


Figure 2.3: Conceptual framework of the study

2.16 Empirical Review

To understand and explain human behaviour in social psychology, Icek Ajzen and Martin Fishbein (Ajzen and Fishbein, 1980; Fishbein (and Ajzen, 1975) developed the Theory of Reasoned Action in 1975. The Theory of Reasoned Action was later further developed as an extension of the theory. Icek Ajzen introduced the Theory of Planned Behaviour in 1988 and later a refined version in 1991 (Ajzen, 1988; 1991). The difference between the two theories is the perceived control as a determinant of intention.

This section introduces the Theory of Reasoned Action as a precursor to the Theory of Planned Behaviour as the theoretical model that underpins this study.

2.16.1 Theory of Reasoned Action (TRA)

The Theory of Reasoned Action (TRA), a generalised theory, is based on the relationships between beliefs and behaviours that were developed by Ajzen and Fishbein (1980). The three components that make up the TRA are:

- Behavioural intention;
- Attitude, and;
- Subjective norms.

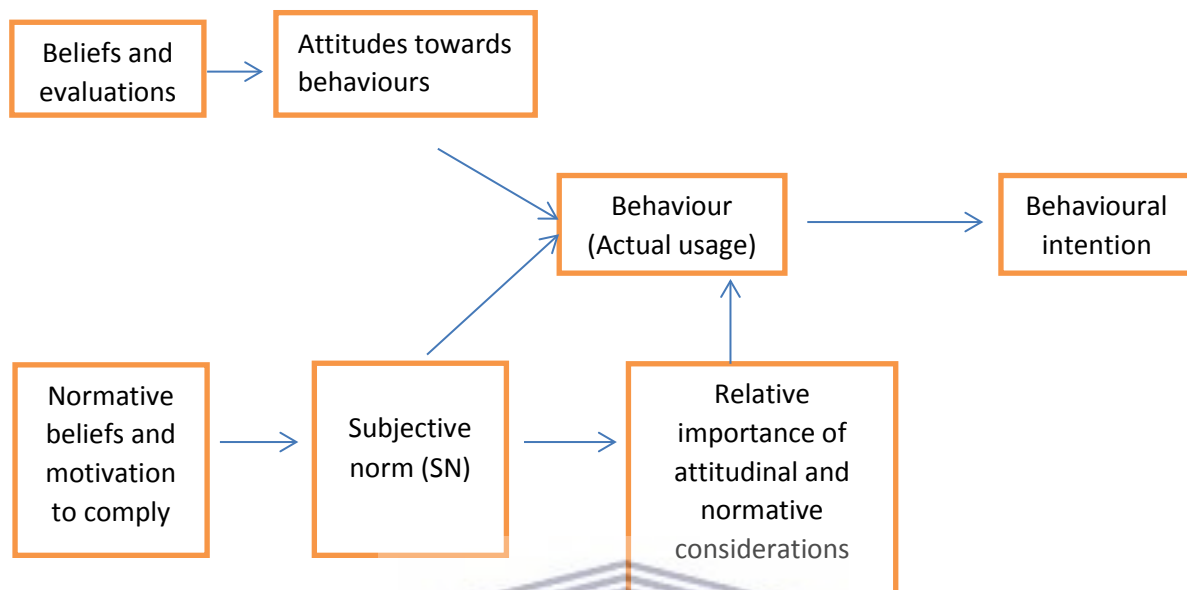


Figure 2,4: Theory of Reasoned Action

Source: Ajzen and Fishbein (1980)

2.16.2 Behavioural intention

Behavioural intention is a person's mental strength to follow through with the intention to perform a particular behaviour. Fishbein and Ajzen (1975) describe it to be understood as capturing motivational factors that influence behaviour and also indicate an individual's readiness to perform that behaviour. Behavioural intention is influenced by two main constructs, namely the attitude towards the behaviour and subjective norms.

2.16.3 Attitude towards behaviour

Ajzen (1988) and Fishbein and Ajzen (1975) explain an attitude to be the degree to which an individual holds a positive or negative evaluation of a particular behaviour. Fishbein and Ajzen (1975) draw a distinction between a general attitude, which is an attitude toward physical objects, institutions, groups, policies and events, and an attitude towards performing a specific behaviour. Ajzen (2002) further postulates that beliefs about the likely outcome of a behaviour and the evaluation of those outcomes are behavioural beliefs which in turn produce a conducive or unconducive attitude towards a behaviour.

2.16.4 Subjective norms

Subjective norms are people held in high regard and whose opinions matter to you, and those who can influence your decision and whom you consider when making a decision. Fishbein and Ajzen (1975) describe subjective norms as the social pressure or perceived expectation from relevant people to perform the behaviour or not.

2.16.5 Theory of Planned Behaviour (TPB)

The Theory of Planned Behaviour (TPB) was designed as an extension of the TRA which is to include behaviours where people do not have complete volitional control (Boudewyns, 2013). Boudewyns (2013) adds that the TPB is identical to the TRA except that perceived behavioural control (PBC) is a precursor to intention and

behaviour, and that the assumption of volitional control is no longer imposed on the model. The three cognitive factors that make up the TPB are:

- Attitude;
- Subjective norms (SN); and
- Perceived Behavioural Control (PBC).

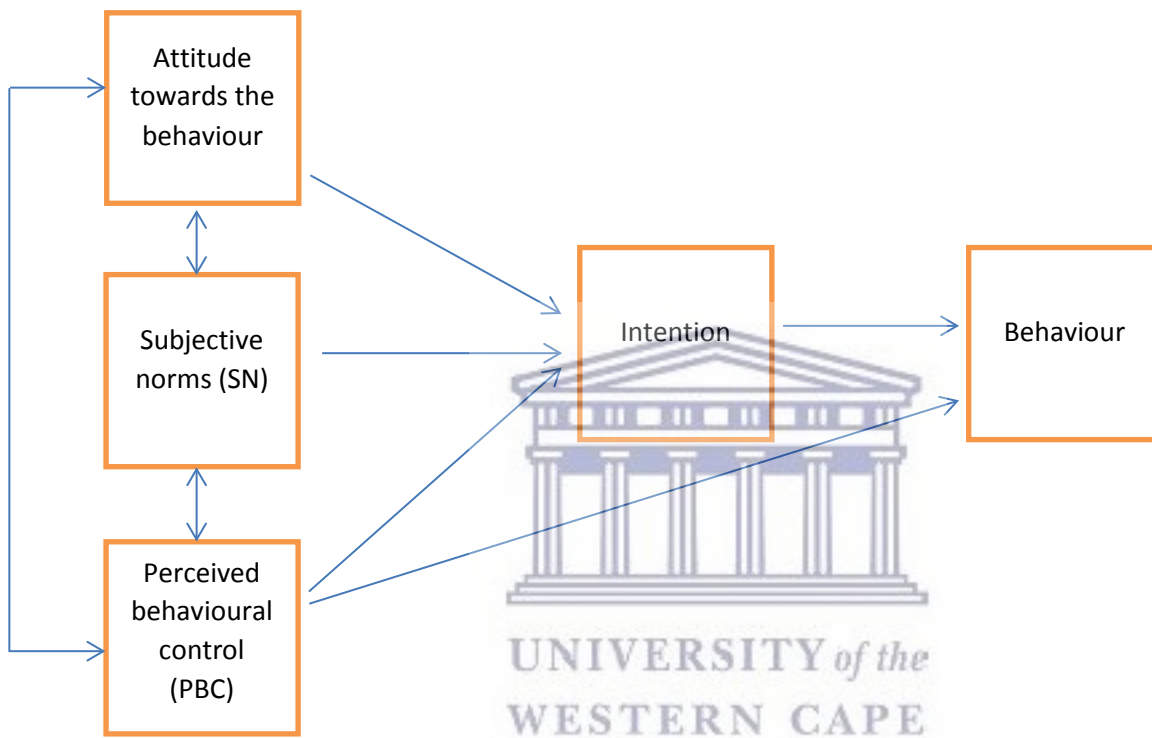


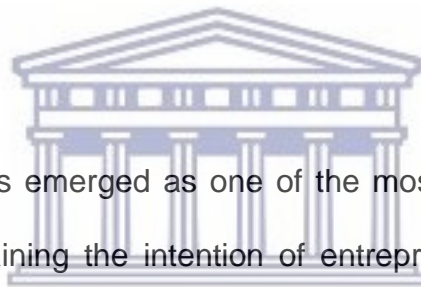
Figure 2.5: Theory of Planned Behaviour

Source: Ajzen (1991)

2.16.6 Attitude towards behaviour (ATB)

Ajzen (1988) and Fishbein and Ajzen (1975) explain an attitude to be the degree to which an individual holds a positive or negative evaluation of the behaviour in question. Ajzen (1991) further suggests that ATB does not work directly on behaviour but indirectly through intention.

The two models that have been dominating the literature are Ajzen's TPB and Shapero's entrepreneurial event model (1984), as they are the leading intention-based models in determining EI. Zhang, Duysters and Cloudt (2014) elaborate on this view, adding that ATB (Ajzen's TPB) is equivalent to the perception of personal desirability of the behaviour (Shapero's entrepreneurial event model). Comparing Shapero's and Ajzen's model it has been found that there is an overlap to a large degree between Shapero's perceived desirability and the perceived feasibility of Ajzen's attitude and PBC respectively (Autio *et al.*, 1997; Kolvereid, 1996; Krueger, 1993). The intentions of both models are explained by willingness and capability, and both Shapero's model and Ajzen's TPB have consistently received empirical support (Van Gelderen *et al.*, 2008).



Through research, ATB has emerged as one of the most significant and influential constructs of TPB in explaining the intention of entrepreneurs to start a business (Harris and Gibson, 2008; Liñón and Chen, 2006; Watchravesringkan, Hodges, Yurchism, Hegland, Karpova, Marcketti and Yan, 2013).

2.16.7 Subjective norms (SN)

SN is the perception of the individual and what other important people close to that individual think of the behaviour under consideration (Fayolle, 2002). SN measures the perceived social pressure from family, friends and significant others on the individual to perform or not perform certain behaviours (Ajzen, 1991). Social pressure or perceived expectation is therefore exercised by those close to the

person making the decision, which can influence the decision and whether or not the behaviour will be performed.

The resultant effect can be positive or negative as it is dependent on the influence of the people that are closest to you. Therefore, if it is positive, the result would be the individual starting a business (Ajzen, 1991). However, as indicated by Shane (1992), it can hamper the individual in starting a business. Sanchez and Escobedo, Diaz-Casero, Ernadey-Mogollon and Postigojimenez (2011) found it to be a barrier to innovation. Some researchers have found that perceived SN is not a strong influencer of EI (Conner and Armitage, 1998; Kolvereid and Isaksen, 2006; Krueger *et al.*, 2000), while others have demonstrated that it is not the most important predictor but can significantly influence EI (Kautonen, Van Gelderen and Tornikoski, 2013; Luthje and Franke, 2003). Scherer *et al.* (1989) and Matthews and Moser (1995) found that SN influences ATB and PBC and therefore indirectly influences intention. In a meta-analysis of TPB conducted by Armitage and Conner (2001), it was found that SN exerts the least influence on intention among the three antecedents.

2.16.8 Perceived behavioural control (PBC)

The development of PBC, as a concept in TPB, was greatly influenced by the work done by Bandura (1997) on self-efficacy, as it is very similar in construct. Bandura (1997) describes self-efficacy as a belief about a person's ability to perform a behaviour irrespective of the circumstance. PBC is defined as "the extent to which people believe that they are capable of, or have control over, performing a given behaviour" (Fishbein and Ajzen, 2010). PBC reflects the belief pertaining to access

to resources and opportunities needed to perform a behaviour, or internal and external factors that may impede performance of the behaviour (Trivedi, 2016). Fishbein and Ajzen (2010) found that from a theoretical perspective, self-efficacy and PBC are virtually identical as both perspectives refers to a person's perceived capability for the performance of a certain behaviour or achievement of a certain goal and that both can be assessed by activities that deal with the ability to perform the behaviour or achieve the goal.

When considering embarking on a start-up business, individuals judge the feasibility of the opportunity, the availability of the resources and the individual's ability to perform the required actions (Ajzen, 1991). These judgements create perceptions about the possible action be it positive or negative. This represents the likelihood in the entrepreneur's mind of starting and operating a business successfully when considering PBC by applying it to the entrepreneurship context (Trivedi, 2016).

Krueger *et al.* (2000) argues that the greater the perception of PBC, the greater the intention of performing the behaviour. However, stating this negatively, Trivedi (2016) adds that when the individual is unsuccessful in securing resources and performing the required behaviour, he/she will not have the intention to start a business. PBC has been found to be the most important factor in shaping EI (Arenius and Kovalainen, 2006; Souitaris *et al.*, 2007; Van Gelderen *et al.*, 2008).

Ajzen (2002) stated that a direct measure of PBC should capture people's confidence that they are capable of performing the behaviour under investigation. Furthermore, questions to measure PBC can be asked about the capability to

perform a particular behaviour, while people's beliefs can also be measured by the likelihood that specific factors may interfere with or facilitate the performance of that behaviour. This results in the fact that when people have the necessary resources and opportunities, when encountering obstacles they would possess the confidence to perform the behaviour, thereby exhibiting a high degree of PBC (Ajzen, 1991).

Autio, Keeley, Klofsten, Parker and Hay (2001) concluded that PBC equates to the sum of the individual's perceived and actual control of the behaviour, which means that PBC captures the actual situations as well as the expectations of the individuals regarding the success of the business.

The measurement of TPB's cognitive factors must be conceptualised and assessed in accordance with the principle of compatibility such that it involves the same target, action, context and time (TACT) elements as a behavioural criterion (Fishbein and Ajzen, 2010). TACT will be further explained and better understood later in Chapter 3, as it was used in the development of the questionnaire for this study.

2.17 Theoretical Review

In the literature there are numerous studies that have used TPB as a theoretical framework for studying entrepreneurial intent and entrepreneurship as a career choice (Bird, 1988; Davidsson, 1995; Kolvereid, 1997; Krueger, 1993; Krueger and Carsrud, 1993; Shapero and Sokol, 1982). Autio *et al.* (2001) argue that the emphasis of such studies has been intentional, expectancy-driven and entrepreneurial decisions in a particular context, which completes the deterministic view of traits and demographic approaches in entrepreneurship research. However,

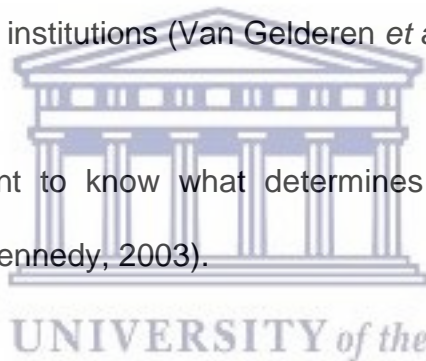
the problem of the trait and demographic approach to research is that the researcher collects data concerning the entrepreneur after the entrepreneurial event has happened, therefore the researcher assumes that the entrepreneur's traits, beliefs and attitudes did not change because of the entrepreneurial event (Gartner, 1988; 1989). Thus, to show cause, the entrepreneur or individual should be studied before the entrepreneurial event. Gartner (1989) concludes that personality traits are not good predictors of future action, while Autio *et al.* (2001) further supports this view by stating that the relationship between the traits of the entrepreneur and the entrepreneurial activity failed to establish a strong relationship in research.

Two models have dominated the literature, namely Ajzen's TPB model (Ajzen, 1988; 1991) and Shapero's expectancy model (Shapero and Sokol, 1982). TPB determines intention by means of attitude, SN and PBC, while the expectancy model determines EI on the basis of perceived desirability, perceived feasibility and propensity to act. Krueger *et al.* (2000) regard these two models as competing; however, they overlap to a large extent. There are corresponding components within the two models, as mentioned earlier. Van Gelderen *et al.* (2008) argue that additional variables such as gender, work experience, parent role models and personality traits enhance the understanding of EI; however, they assume that the effects of the variables are mediated by the influence of the TPB model's components on EI.

DePillis and Reardon (2007) proved that the cultural perception of entrepreneurship in Ireland and the USA affects EI and that this would be mediated in the SN component of TPB. Thus, the cultural perception of entrepreneurship within this particular study would be mediated within the SN of TPB. Therefore, by

concentrating on the components that make up TPB, there will be a facilitation of comparison with previous research (van Gelderen *et al.*, 2008).

Entrepreneurship has become an important vocational option where individual work preferences are increasingly favouring self-reliance and self-direction (Baruch, 2004; Gibb, 2002a, 2002b; Hall, 2002). Van Gelderen *et al.* (2008) state that graduating from university will not give business graduates other than accountants (such as doctors, lawyers and engineers) institutionalised professional identity. Well-educated business students who have many options typically choose entrepreneurship as they feel pulled towards it rather than pushed into it, and they are very important alumni to entrepreneurship education institutions (Van Gelderen *et al.*, 2008).



Furthermore, it is important to know what determines their career choices and intentions (Peterman and Kennedy, 2003).

TPB focuses on situations in which the individual has incomplete volition (Autio *et al.*, 2001). Many behaviours pose difficulties that will limit volition, therefore it is useful to consider PBC in addition to intention (Ajzen, 2002). Conner and Armitage (1998) define intention as making an effort to act upon a decision or plan driven by a person's motivation to do so.

In social psychology there has been some controversy about the measurement of intention (Armitage and Conner, 2001; Bagozzi, 1992; Bagozzi and Kimmel, 1995; Warshaw and Davis, 1985). However, empirical evidence (Armitage and Conner, 2001; Bagozzi and Kimmel, 1995) shows measures of PBC to be closely associated

with commitment measures such as behavioural expectations, i.e. intention. Phan, Wong and Wang (2002) argue that in the studies done on EI, attitude is a stronger indicator of interest in self-employment than the likelihood to be self-employed.

In this study the research focuses on the influence of attitude on the behaviour (entrepreneurship), SN (entrepreneurial leadership and role models) and PBC (resources and opportunities within commerce faculties/universities) on the intention (student intending to become an entrepreneur).

2.18 Summary

Universities are needed to develop future entrepreneurs who can sustain businesses and negotiate the changes that are occurring in the markets. Universities can also be used to inculcate an entrepreneurial culture, increase EI and act as entrepreneurial role models for students.



In order for universities to fulfil this need, they need to develop content-specific material that will assist the students in becoming successful entrepreneurs, and encourage the development of students to become academics with an entrepreneurship background and entrepreneurial experience. Coupled with this, universities require academics that are trained in the field of entrepreneurship and academics that are passionate about the field and have the necessary experience.

To achieve this level of entrepreneurial culture, universities require entrepreneurial leaders in their faculties that will identify and exploit various opportunities – in this case learning opportunities that will develop and graduate a higher quality of

entrepreneur who will be able to cope and survive in market. Timmons and Spinelli (2004) state that it is clear from the available literature that education, including entrepreneurship, is critical due to its contribution to job creation and that it helps considerably to reduce poverty.

This study, as mentioned previously, focuses on the impact of the four cognitive factors on the EI of final-year university students. The following chapter expands on this by introducing the methodology, questionnaire development and the model used, as well as the factors that have an influence on EI.



Chapter 3

3. Research methodology

3.1 Introduction

The previous chapter presented an extensive literature review including the four cognitive factors and the impact on entrepreneurial intention (EI), which is used in the development of the questionnaire in this chapter.

The chapter commences with an introduction and graphical representation of the conceptual model that has brought about the thinking behind the study. The conceptual model is used to posit and develop the research question for this study.

The objectives and purpose of this study are then discussed, as this is the driving force behind the completion of this particular research project and is also derived from the conceptual model 1 designed. This is followed by the hypothesis.

The stated hypothesis is what the researcher aims to answer or verify. This is the question that the researcher had at the start when commencing the research.

The theory that underpins this research is then introduced and discussed. The model that is used in this theory is the Theory of Planned Behaviour (TPB), which has three cognitive factors that will be discussed. Gird and Bagraim (2008) conducted a qualitative study at two South African HEIs, collecting data using 240 final-year commerce students, to test the predictiveness of the TPB model among these

students. They tested the predictiveness of the model by considering four cognitive factors that would influence EI.

In the model used by Gird and Bagraim (2008) the four cognitive factors are personality traits, demographic factors, situational factors and prior exposure to entrepreneurship. After various data analyses were conducted on the model, TPB significantly explained 27 percent of the variances in students' EI. The model further explained prior exposure to entrepreneurship, as a cognitive factor, contributing significantly to the predictiveness of TPB in explaining EI. The other additional factors did not add significantly to the variance explained by TPB. Gird and Bagraim (2008) concluded that the findings suggest that TPB is a valuable tool for the prediction of EI.



For purposes of this study, the researcher made a change to the model and added extra cognitive factors which are relevant to the study and supported by the literature in the previous chapter.

Many researchers in the available literature in the educational domain of entrepreneurship have looked toward the education of entrepreneurs and the material or programmes available to students, and the importance of these programmes to the future of entrepreneurs.

The level of socio-economic urgency to meet the growing need for educated entrepreneurs to sustain the economy is not currently being met by tertiary institutions. Nicolaides (2011) iterates that an effective investment in national higher

education initiatives concerning entrepreneurship, which will to an extent meet the needs of the population, will underpin the international standing of South African education institutions. Cloete and Bunting (2000) add that the higher education system must provide research, knowledge and a highly skilled workforce if the nation is to compete in the highly dynamic global arena.

The chapter ends with a detailed discussion about research methodology that has been used in the past and the methodology used in this research study. Research methodology is vital to the research process, as it maps out for the researcher the path that needs to be followed to collect and analyse the data for the study.

3.2 Objectives and purpose of the study

The primary objective of the study was to determine the effect of the four cognitive factors (attitude towards entrepreneurship, entrepreneurial leaders, role models and resources and opportunities) on the EI of students in their final year of study within the commerce faculties of various institutions. The universities targeted were the University of Cape Town, Stellenbosch University, University of the Western Cape and the Cape Peninsula University of Technology.

Unlike the study by Gird and Bagraim (2008), which used commerce students (with subjects ranging from Marketing to Information Systems), this research study considered the volition of the students that commenced an entrepreneurship degree or diploma or students choosing three or more entrepreneurship modules as electives.

The purpose of the study was to determine the influence or level of influence of the four cognitive factors on EI and to use this in practice to facilitate the process of increasing the EI of students and thereby increase the number of students progressing to starting their own businesses. Based on the literature review, it is now known that the four cognitive factors used in this study are based in theory.

3.3 Hypotheses

The South African government has identified entrepreneurship as the vehicle to alleviate unemployment and stimulate economic growth. To achieve these goals, entrepreneurs need to be developed and trained in order to start their own businesses that would create jobs and contribute economically. Previous studies have supported the understanding that entrepreneurship education equips graduates with the necessary entrepreneurial skills and creates a greater EI (Hynes and Richardson, 2007).



Higher education institutions (HEIs), in particular their commerce faculties, are the context of this study, as commerce faculties can positively further add to the EI of students doing entrepreneurship modules and programmes. A degree of EI has been established at the start, as these students have of their own volition registered for entrepreneurship modules or programmes offered at the commerce faculties.

It is more likely that those with degrees will own and run businesses successfully, as found in international empirical evidence (Almus and Nerlinger, 1999; Cooper, Gimeno-Gascon and Woo, 1994; Honjo, 2004; Ramachandra and Shah, 1999;

Westhead, 1995). However, Greene and Saridakis (2008) state that it is unclear whether higher education acts as a successful facilitator for the promotion of entrepreneurship soon after graduation, and one reason they point to is the very notion of entrepreneurship itself.

In their article, Greene and Saridakis (2008) do not state the type of higher education or choice of programme studied, therefore it can be assumed that students did not complete an entrepreneurship qualification, as in the case of Gird and Bagraim (2008), which makes it difficult for the students to understand entrepreneurship and the process involved in starting one's own business.

A key component in equipping students with the necessary knowledge, skills and competencies to exploit opportunities in the knowledge environment is entrepreneurship education (Hynes and Richardson, 2007). Hynes and Richardson (2007) argue that entrepreneurship education, with effective entrepreneurship education programmes, not only educates students to start a business, but equips graduates with knowledge, skills and competencies to effectively engage the changing workplace environment.

H1: Attitude towards entrepreneurship positively influences entrepreneurial intention

After being exposed to entrepreneurship modules or an entrepreneurship qualification, the attitude towards entrepreneurship would be affected positively, as Ajzen (2005) argues that attitude comes from a person's belief about the outcomes of the behaviour. Hynes and Richardson (2007) believe that HEIs play a role by

instilling a positive attitude towards entrepreneurship through the promotion of positive models, by creating an understanding that failure is a prerequisite for success, and by instilling the necessary skills needed by the entrepreneur in key functional areas of the business. Stokes and Wilson (2010) add that research reveals that involvement in enterprise programmes has a positive influence on students' enterprise potential and their attitudes towards entrepreneurship.

H2: Entrepreneurial leadership of students positively influences entrepreneurial intention

Noel (2002) conducted a qualitative study in the USA, focusing on the effect of entrepreneurship training on EI and the perception of self-efficacy, and found that the disposition to act as an entrepreneur, entrepreneurial intention and self-efficacy scored the highest among final-year students in entrepreneurship. They believe in their ability to become entrepreneurs and their knowledge that they will start a new business through increased self-efficacy and entrepreneurial intention. Fayolle *et al.* (2006) conducted a similar qualitative study in France and found that there is a strong measurable impact on the entrepreneurial intention of students studying entrepreneurship programmes.

With the increased belief in him/herself, the student scans the market for opportunities to start a new business. According to Renko *et al.* (2015), an entrepreneurial leader has the ability to recognise an opportunity within the market and exploit that opportunity, therefore a student will also need to display the characteristics of an entrepreneurial leader to ensure that he/she has identified an opportunity and exploited that opportunity, thus starting his/her own business based

on the opportunity. A student's ability to scan for opportunities and identify those opportunities will encourage that student even more and therefore it would further positively influence the EI.

H3: Role models (lecturers) have a positive influence on entrepreneurial intention

Galloway, Anderson, Brown and Wilson (2005) suggest that there is a need for HEIs to develop as entrepreneurial institutions and become proactive in addressing the needs within the business community when devising entrepreneurship courses. Hynes and Richardson (2007) suggest that HEIs have greater potential to be relevant and applicable to the entrepreneurial society, which will benefit the institution, its students, educators and researchers.

Krueger and Carsrud (1993) and Scherer *et al.* (1989) argue that EI is influenced by role models. In a case where students do not have entrepreneurial role models within family and friendship circles, lecturers can serve as role models. Galloway, Anderson, Brown and Wilson (2005) suggest that educators (lecturers) have an obligation to meet the students' needs and that there are expectations regarding student preparation for the economy in which they will operate, therefore it is important that lecturers have the necessary entrepreneurial education and experience to facilitate this process.

H4: Resources and opportunities within commerce faculties have a positive influence on entrepreneurial intention

Hynes and Richardson (2007) posit that the challenge for HEIs is to become more entrepreneurial in their philosophy and practices. Formica (2002) argues that entrepreneurial universities will be as important as entrepreneurial businesses in the knowledge economy. Hannon (2005) argues that the effective delivery of entrepreneurship programmes needs to encourage experiential, practice-based, action-learning modes, therefore creating different learning environments and opportunities for students. Hynes and Richardson (2007) suggest that the interaction between HEIs (knowledge producers) and industry (knowledge users) should be focused on non-technological areas and that this can be achieved by developing support from business, via consultation services, as well as the development of a network base and collaboration with source funders. This will assist the students and afford them the opportunity to develop an understanding of business requirements from established and experienced others (Hynes and Richardson, 2007).

H5: Higher education institutions can influence the entrepreneurial intention of students, which can ultimately serve as a pipeline for entrepreneurs to the economy

HEIs and in particular commerce faculties play the role of not only preparing entrepreneurship students academically, but more so, further developing their intention of becoming entrepreneurs. The result is that students will enter the market and become entrepreneurs who contribute to an increase in jobs, thereby alleviating unemployment and in turn adding to economic growth. The influence of the four

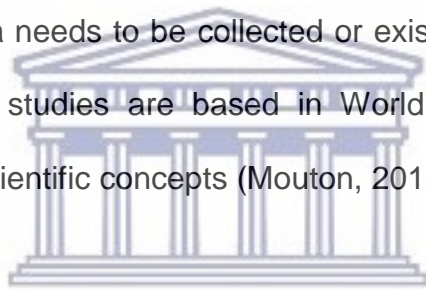
cognitive factors on the students' EI within the higher education context can serve as a pipeline for future entrepreneurs in South Africa.

3.4 Research methodology

There are two types of studies that are used when conducting research, namely:

- Empirical studies; and
- Non-empirical studies.

Empirical studies are based on real-life problems that ask something about World 1, which means that new data needs to be collected or existing data analysed. On the other hand, non-empirical studies are based in World 2 which investigates, for example, the meaning of scientific concepts (Mouton, 2015).



Mouton (2015) introduces a basic framework as follows:

- World 3: Critical interest (meta-science);
- World 2: Epistemic interest (science); and
- World 1: Pragmatic interest (everyday life).

Every idea, concept or construct that ends up in research started with a question. In all aspects of life where there are questions, there has been an endeavour to find answers. In the sciences this is the livelihood that results in growth in a particular field. The types of questions that the researcher ultimately wants to answer will guide him/her to the type of study that will be conducted.

Tables 3.1 and 3.2 reflect Mouton's (2015) examples of the types of questions that can be asked and the examples that are coupled to research examples, including empirical and non-empirical questions.

The question asked in this study is whether students doing entrepreneurship programmes at commerce faculties are intending to become entrepreneurs within five years after completing the programme.

Table 3.1: Empirical questions

Question Type	Question	Examples
Exploratory questions	What is the case?	What are the critical success factors of a profitable company?
	What are the key factors?	What are the distinguishing features of a good leader?
Descriptive questions	How many?	How many people died of Aids in South Africa last year?
	Are x and y related?	Is there a correlation between parental support and scholastic achievement?
Causal questions	Why?	What are the main causes of malnutrition in a rural community?
	What are the causes of y ?	Is smoking the main cause of lung cancer?
Evaluative questions	What was the outcome of x ?	Has the new TB awareness programme produced a decline in the number of reported TB cases?
	Has P been successful?	Has the introduction of a new refrigeration technology led to more cost-effective production?
Predictive questions	What will the effect of x be on y ?	What effect will the introduction of a new antibiotic have on the population P ?
Historical questions	What led to y happening?	What caused the demise of socialism in Central Europe during the late 1980s?
	What were the events that led up to y ?	What led NATO countries to decide on the aerial bombing of Kosovo?
	What caused y ?	

Source: Mouton (2015)

Table 3.2: Non-empirical questions

Question Type	Question	Examples
Meta-analytical	What is the state of the art regarding x?	What is the current state of research on environmental ethics?
		What are the key debates in current business risk studies?
	What are the key debates in domain x?	What are the leading positions/paradigms in research on structural adjustment programmes in developing countries?
Conceptual questions	What is the meaning of concept x?	What is the meaning of "sexual harassment"?
Theoretical questions	What are the most plausible theories or models of x?	What are the most widely accepted models, definitions or theories of "competitiveness"?
	Which are the most convincing explanations of y?	What do competing theories say about the effects of stress on productivity?
Philosophical/normative questions	What is the ideal profile of x?	What is meant by an equitable educational system?
		Do animals have rights?

Source: Mouton (2015)

Based on the question type that is explained in the tables above, this study falls within the field of exploratory questions where the study seeks to explore the impact of attitude on entrepreneurship, entrepreneurial leadership, role models, resources and opportunities within commerce faculties on the EI of students. This study takes place in World 1, according to Mouton's framework.

Now that the research question has been developed from the research problem, it is vital to the success of the project to select an appropriate research design. Research design speaks to the planning of the research project that will be taken on and it starts with the conceptualisation of an idea and is then broadened. The research methodology speaks to how the plan will be realised, which will end in a finalised research document.

A research design is a plan of how you intend to conduct your research (Mouton, 2015). Peters (2010) states that the selection of a research method and design is critical, as it not only determines the route by which the research outcome will be reached, but also influences and set outs the expected outcomes. Mouton (2015) goes on to say that researchers are often confused between research design and research methodology, yet these are two very different aspects of a research project. Table 10 tabulates the summarised differences between research design and methodology according to Mouton (2015).

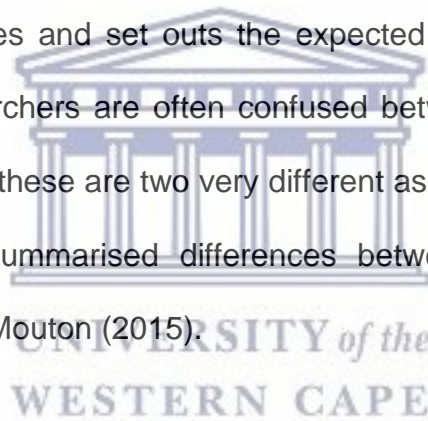


Table 3.3: Summary of the differences between research design and research methodology

Research Design	Research Methodology
Focuses on the end product: What kind of study is being planned and what kind of result is aimed at?	Focuses on the research process and the kind of tools and procedures to be used.
Point of departure = Research problem or question.	Point of departure = Specific tasks (data collection or sampling) at hand.
Focuses on the logic of research: What kind of evidence is required to address the research question adequately?	Focuses on the individual (not linear) steps in the research process and the most "objective" (unbiased) procedures to be employed.

Source: Mouton (2015)

3.5 Research design

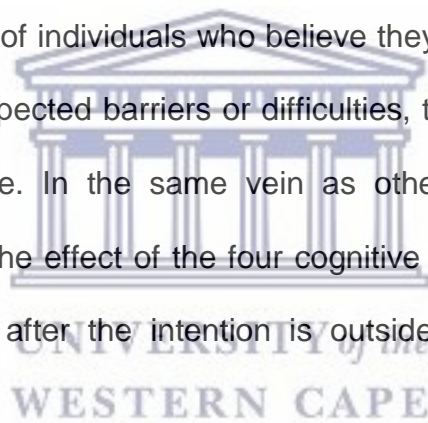


As mentioned, numerous studies have used TPB as a theoretical framework for studying EI and entrepreneurial career choice (Bird, 1988; Davidsson, 1995; Kolvereid, 1997; Krueger, 1993; Krueger and Carsrud, 1993; Shapero and Sokol, 1982). TPB uses three cognitive factors to determine intention, namely attitude towards the behaviour, SN and PBC (Ajzen, 1991).

For purposes of this study, the attitude towards the behaviour in the original model will be referred to as the attitude towards entrepreneurship, as entrepreneurship is the behaviour considered in the model. Ajzen (2002) states that a belief produces a conducive or inconducive attitude towards a behaviour.

Normative beliefs result in perceived social pressure or SN (Ajzen, 2000), therefore the perceived social pressure will come from people that are important to the person who will be acting out the behaviour. This group can consist of family, friends, lecturers, role models, or whomever the individual thinks is close to him or her. Within this category the SN are referred to as entrepreneurial leaders and role models respectively.

PBC constitutes resources and opportunities that are available within commerce faculties such as incubators, entrepreneurship funding, networks, etc. In this study, PBC is referred to as resources and opportunities at universities. Ajzen (1991) mentioned that in the case of individuals who believe they have more resources and opportunities with fewer expected barriers or difficulties, their perceived control over the behaviour will increase. In the same vein as other studies that have been conducted, this considers the effect of the four cognitive factors on the EI intention. The behaviour performed after the intention is outside the scope of this study.



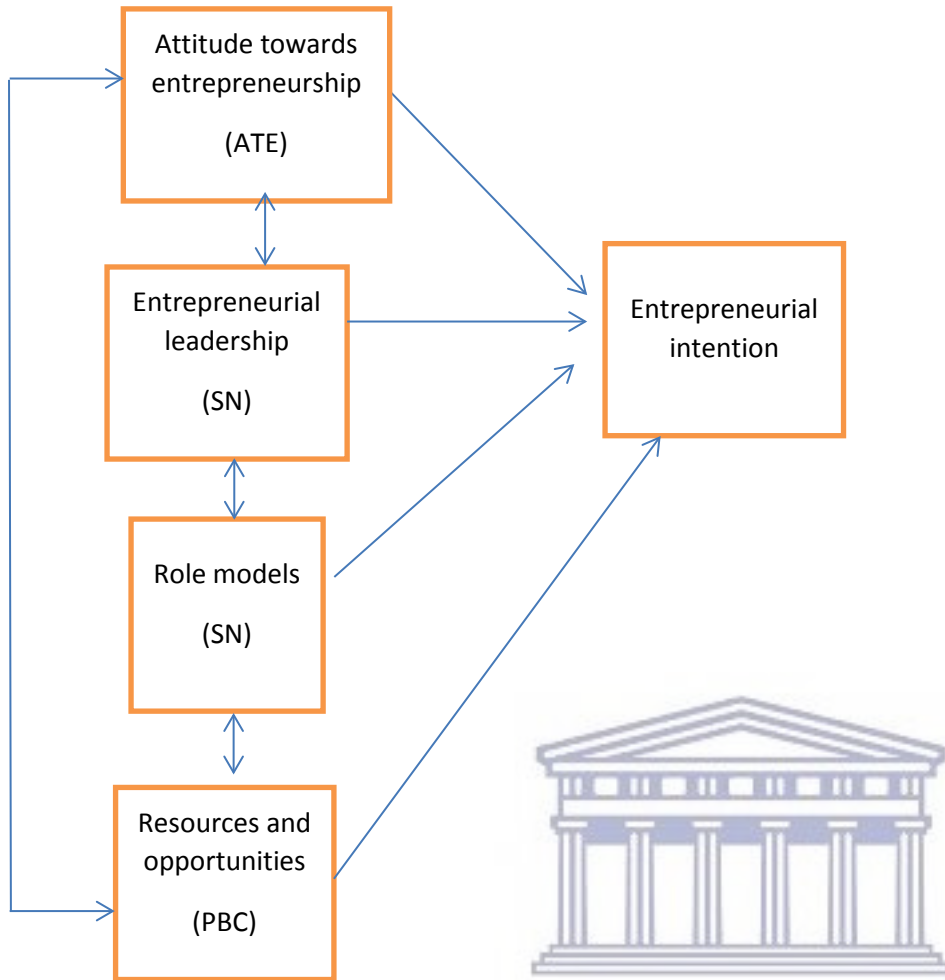


Figure 3,1: Adaptation of Theory of Planned Behaviour
 Source: Azjen (1991): Adapted

3.5.1 Questionnaire development and construction

As mentioned earlier, the measurement of behaviour can be done by means of direct observation and indirect observation in order to gather information pertaining to a particular behaviour. However, direct observation of behaviour means that the observer of the behaviour needs to observe the behaviour in person and on every occasion the behaviour is taking place. Gathering data from observation, in person, can become a difficult and laborious task. Indirect observation, in this case, is the best method of measuring behaviour that would be done by means of self-reporting.

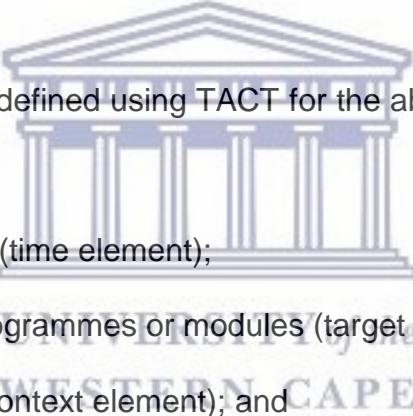
Indirect observation through inference from observable responses involves theoretical constructs that are latent variables (Ajzen, 2002).

The behaviour of interest is defined in terms of **T**arget, **A**ction, **C**ontext and **T**ime (TACT) elements (Ajzen, 2002).

For purposes of this study, consider the following scenario:

Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.

The behaviour of interest is defined using TACT for the abovementioned scenario as follows:

- 
- Students graduating (time element);
 - Entrepreneurship programmes or modules (target element);
 - Commerce faculty (context element); and
 - Becoming entrepreneurs within five after graduating (action element).

For purposes of compatibility, it is important that all other constructs (attitude, SN, PCB and intention) are defined in terms of exactly the same elements.

3.5.1.1 Entrepreneurial intention (EI)

To develop questions to assess behavioural intention for this research, TACT is used.

Scenario: Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.

EI1. I intend to become an entrepreneur within five years of graduating.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____ : _____ : _____ : strongly agree

EI2. I scan for entrepreneurial opportunities in the market environment.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____ : _____ : _____ : strongly agree

EI3. I intend to use the knowledge gained from my current studies to become an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____ : _____ : _____ : strongly agree

EI4. I constantly think about starting a successful business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EI5. I am ready to do everything possible to become self-employed.

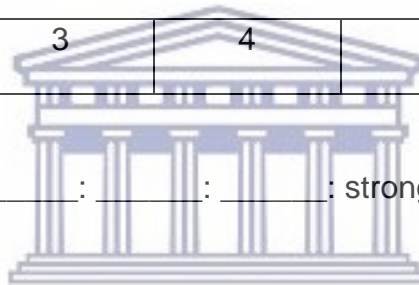
1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EI6. I will make every effort to start and run my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



EI7. A career as an entrepreneur is attractive to me.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EI8. I am determined to start my own business in future.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

3.5.1.2 Attitude towards entrepreneurship (ATE)

Hypothesis1. In measuring the attitude towards entrepreneurship, any standard attitude scaling procedure (Likert scale, Thurstone scaling) can be used to evaluate the respondent's behaviour, and the semantic differential is most commonly employed (Ajzen, 2002).

Scenario: Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.

ATE1: I feel that entrepreneurship is the way of the future for the economy of the country.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



ATE2: In my opinion, entrepreneurship is more rewarding financially than working for a boss.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE3: Entrepreneurship has more freedom in decision-making than being employed at a company.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE4: I feel excited when I consider all the possibilities that are on offer through entrepreneurship.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE5: Entrepreneurship will allow me to reach all my dreams.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE6: Entrepreneurship will allow me to excel at what I am good at.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



ATE7: I enjoy discussions that allow me to talk about entrepreneurial opportunities.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE8: Entrepreneurs have more status than those who are employed at a company or working for a boss.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE9: Being a business owner will give me great satisfaction

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

ATE10: Starting a business and keeping it going would be easy for me.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



ATE11: If I start my business I have a high chance of being successful.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

3.5.1.3 Entrepreneurial leadership (EL)

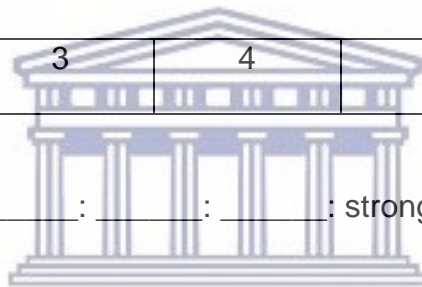
Hypothesis 2. Items of this kind have an injunctive (the act of directing, commanding and prohibiting) quality consistent with the concept of SN and can be reformulated to take on a descriptive quality (Ajzen, 2002).

Scenario: Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.

EL1: Most people who are important to me think that I should become an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



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EL2: It is expected of me to become an entrepreneur, based on the subject matter that I am covering.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EL3: My friends would approve of my decision to become an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EL4: My immediate family would approve of my decision to start and run my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EL5: My fellow students would approve of the decision to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EL 6: Most people who are important to me believe that I have the integrity to start my own business.

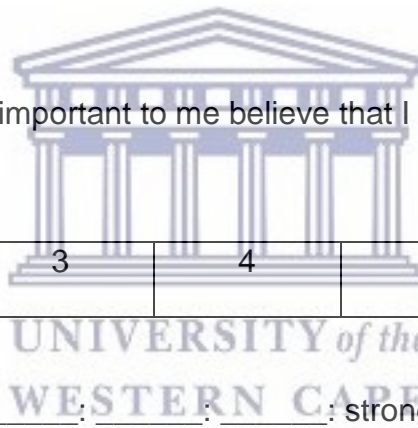
1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

EL7: Most people who are important to me think that I have the necessary skills to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



EL8: Most people who are important to me think that I have the necessary leadership qualities to start my own business.

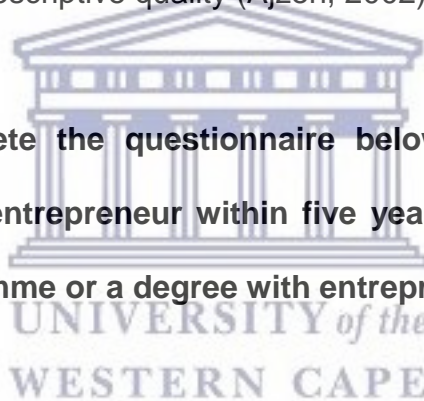
1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

3.5.1.4 Role models (RM)

Hypothesis 3. Items of this nature have an injunctive (the act of directing, commanding and prohibiting) quality consistent with the concept of SN and it can be reformulated to take on a descriptive quality (Ajzen, 2002).

Scenario: Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.



RM1: My entrepreneurship lecturer inspires me the most in becoming an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM2: My entrepreneurship lecturer is my role model in becoming an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM3: My entrepreneurship lecturer motivates me to become an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM4: My entrepreneurship lecturer imparts entrepreneurial skills and knowledge to me.

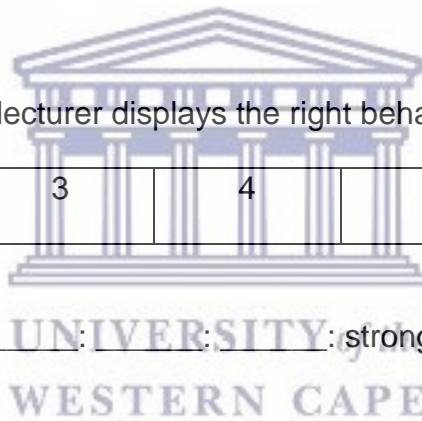
1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM5: My entrepreneurship lecturer displays the right behaviour of an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



RM6: My entrepreneurship lecturer reinforces my entrepreneurial intention.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM7: With his/her experience, my entrepreneurship lecturer has given me good advice about becoming an entrepreneur.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RM8: I admire my entrepreneurship lecturer for the entrepreneurship knowledge he/she possesses.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

3.5.1.5 Resources and opportunities (RO)

Hypothesis 4. People's confidence that they have about performing a behaviour under investigation is a direct measure of PBC (Ajzen, 2002).

Scenario: Please complete the questionnaire below which taps into your intention to become an entrepreneur within five years of graduating from an entrepreneurship programme or a degree with entrepreneurship modules.

RO1: I would have complete control over the situation if I start and run my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO2: I know all about the necessary practical details needed to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO3: If I wanted to, I could easily start and run my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO4: I know all about the various ways of obtaining financial support to start my own business.

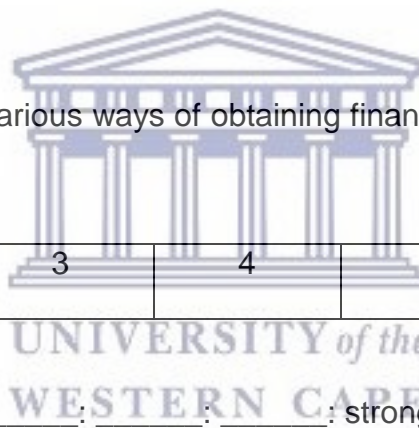
1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO5: I know that I have the necessary networks and support to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



RO6: I know that I will receive the necessary funds to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO7: If I had the opportunity and resources, I would like to start my own business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree

RO8: I am confident that I possess all the skills to run a successful business.

1	2	3	4	5
---	---	---	---	---

Strongly disagree: _____: _____: _____: strongly agree



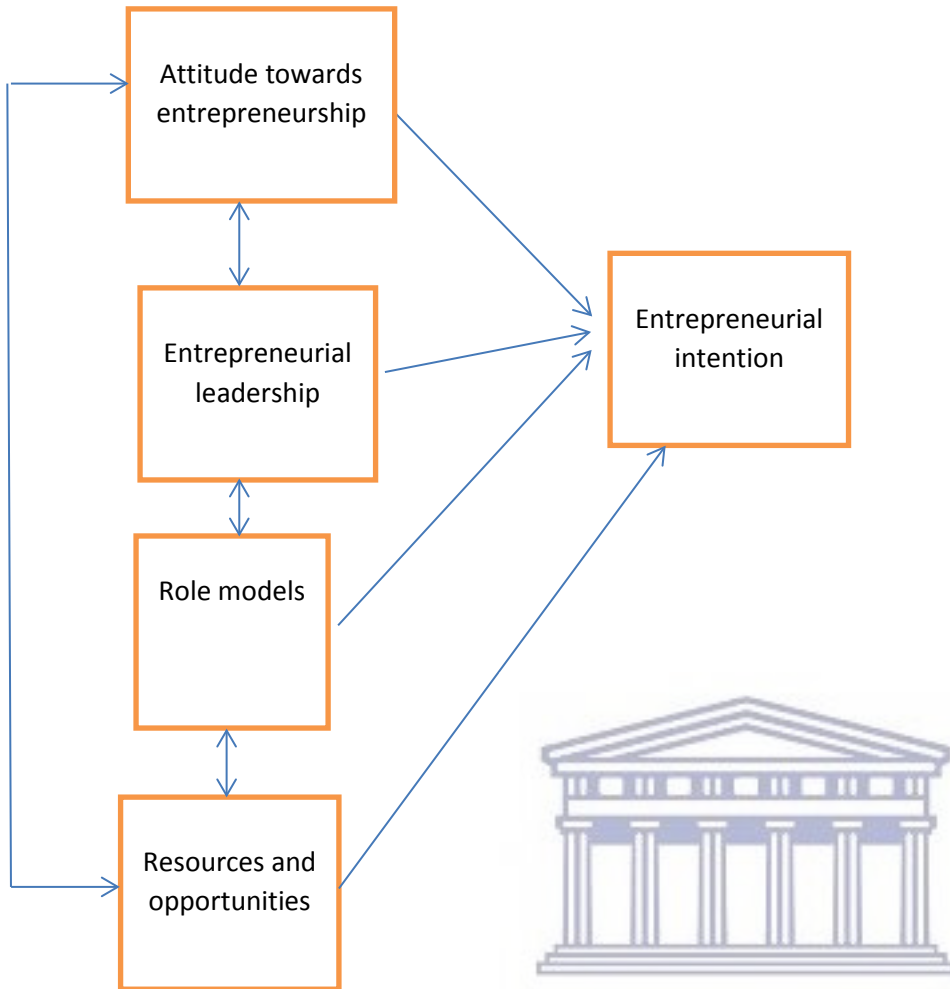


Figure 3 2: Theory of Planned Behaviour (Structural Framework)

Source: Ajzen (1991). Adapted


3.5.2 Determining the population

The study was conducted at the University of Cape Town's Commerce Faculty, the University of the Western Cape's Economic and Management Science (EMS) Faculty, Stellenbosch University's Faculty of Economic and Management Sciences and the Cape Peninsula University of Technology's Business and Management Sciences Faculty. The population of 240 students identified for this study were students who had registered for and were currently busy with an entrepreneurship programme or a degree/diploma with entrepreneurship modules.

The University of the Western Cape does not have a complete entrepreneurship programme, however the School of Business and Finance (SBF) offers four second-year entrepreneurship modules that are electives (modules that are not compulsory but rather chosen by the student through his/her own volition), which extend over two semesters. For purposes of this study, in the case of the SBF, the students targeted to participate in this study were in the final year of their B.Com. degree and had completed three of the four or all four of the entrepreneurship elective modules. Therefore, all the students targeted for this study had exposure to entrepreneurship modules or programmes over two or more semesters or a year or more, and of their own volition.

3.5.3 Methods of data collection

3.5.3.1 Literature review method



The literature review consists of an overview and synopsis of scholarship in a certain discipline (Mouton, 2015), which contains ideas, data and evidence that relate directly to a research question and synthesise in a summary what is known and not known (Peters, 2010). The strength of the literature review is that it provides a good understanding of issues and debates in the area of research being focused upon, and it provides the theoretical thinking and definitions of previous studies and their results. However, the limitation of the literature review is that it cannot produce new, or validate existing, empirical insights (Mouton, 2015). For purposes of this study, a literature review was completed with an investigation of literature focusing on ATB, entrepreneurial leadership, role models, and resources and opportunities at universities that encourage entrepreneurship and entrepreneurial education at HEIs.

3.5.3.2 Survey method

Surveys are usually quantitative in nature and aim to provide a broad overview of a representative sample of a large population (Mouton, 2015). Surveys are widely used in social sciences research where researchers seek to understand and explain the causes of a phenomenon by comparing the attributes of each variable within the phenomenon (Neuman, 2000). Surveys can take various forms as a source of data such as structured questionnaires, structured telephone interviews, structured mail questionnaires, and electronic questionnaires via email and various other media platforms.

Mouton (2015) notes that the strengths of the survey method are that it has the potential to be generalised to a large population if an appropriate sample design has been implemented, as well as have high measurement reliability if the questionnaire is properly structured and high construct validity if proper controls have been implemented. However, the limitation is that there is a lack of depth and perspective, as survey data is sometimes very simple and context specific.

This study makes use of the survey method, as this is the best way to obtain the information and data necessary for analysis. Students were given questionnaires designed to determine the EI to start a business within five years of completing entrepreneurship modules or entrepreneurship programmes at the commerce faculties.

3.5.3.3 Case study

Coldwell and Herbst (2004) note that the case study method is an empirical enquiry that investigates a phenomenon within a real-life context so as to fully understand the experiences of the phenomenon and which is thereafter presented with a depth of information rather than breadth. Mouton (2015) supports this by stating that the strength of case studies lies in in-depth insights into the research topic coupled with high construct validity. Mouton (2015) notes that the limitation of case studies is that there is non-standardisation of measurement and the results are case specific.

3.5.3.4 Research instrument

To collect data there is some form of measuring instrument that needs to be used, and in human sciences the measuring instrument refers to such instruments as questionnaires, observations schedules and psychological tests, which can either be an existing instrument or can be constructed and designed by the researcher (Mouton, 2015). Mouton (1996) states that the researcher does not have to worry too much about measurement validity when using existing instrumentation; however, it has its own risks.

This study makes use of questionnaires as a data collection instrument, of which the validity and reliability were determined by doing a test run of the questionnaire. According to Omer (2014) most surveys are designed to be descriptive or predictive. Descriptive research designs make use of questionnaires to collect data that can be turned into knowledge about a person, object or issue (Hair, Wolfinbarger, Ortinau and Bush, 2010).

According to Brace (2004) a questionnaire is another form of a structured interview in which each respondent is asked a series of prepared questions and with a fixed interviewing schedule. There are two ways in which the questionnaire can be completed, namely self-administered and interviewer-administered (Omer, 2014). This study was self-administered by the students with the researcher in attendance. A questionnaire that was self-administered, which is usually completed by the respondent, can be delivered using different mediums such as web-based or online mediated questionnaires, or the delivery and collection of questionnaires to and from the respondents. Interviewer-administered questionnaires are administered by an interviewer who records each respondent's answers either by means of a telephonic interview, Skype interview or a structured interview in person with the respondent.

3.5.3.5 Sampling

Sampling is a process of selecting a number of individuals for a study in such a way that the individuals selected represent a larger group from which they are selected (Kothari, 2004). According to Peters (2010) sampling is used to achieve three goals:

- To establish the representativeness of what is being studied;
- To conversely reduce bias; and
- To make inferences from findings based on a sample to the larger population from which it is drawn.

Babbie and Mouton (2001) describe two ways of sampling, namely the traditional sciences approach where a representative sample of the population is studied, and the phenomenological approach where a sample is employed. Silverman (2000) adds that purposeful sampling demands that one critically evaluates and thinks

about the parameters of the population that one is interested in and that one chooses one's sample carefully on this basis.

Van Gensen (2005) argues that doing research into human and social phenomena is very complex, and an approach to purposefully selecting people or settings for a study acknowledges this complexity (McMillan and Schumacher, 2001).

A sample of 30 students was used out of the population to determine the reliability and validity of the questionnaire. The process was followed whereby the questionnaires were self-administered and the questionnaires were collected.

3.5.3.6 Data analysis and interpretation

According to Mouton (2015), all fieldwork culminates in the analysis and interpretation of data – be it quantitative survey data, experimental recordings, historical and literary data, texts, qualitative transcripts or discursive data – after having been collected. Mouton (2015) postulates that analysis involves “breaking up” the data into manageable themes, patterns, trends and relationships. However, due to the various methods of data collection and sources of data that are used to study human behaviour (Punch, 2000) there are a variety of techniques to analyse data, and the selection of the proper tools are imperative to the interpretation of the data.

Mouton (2015) adds that the aim of analysis is to understand the various components of the data through the inspection of the relationship between concepts, construct and variables to determine various patterns or trends in the data, and the

interpretation of the data involves the synthesis of the data into a larger coherent whole.

In the case of this study SPSS 24 was employed to do all the statistical analysis of the data that has been captured. The correlations and various other statistical methods were used to determine the relationships between the dependant and independent variables were then identified, studied and interpreted to obtain the results that are represented in this research. Inferences were then made based on these relationships. In chapter 4 the researcher discusses these relationships in detail.

3.5.3.7 Ethical issues in research

Mouton (2015) argues that the ethics of science are concerned with what is right and what is wrong when conducting research, and as scientific research forms part of human behaviour, these ethics have to conform to generally accepted norms and values. Van Gensen (2005) adds that ethical issues arise predominantly with qualitative research methods of data collection due to the closer relationship and interaction between the researcher and the participants of the research; therefore all social issues give rise to a range of ethical issues. In support, Mouton (2015) mentioned that ethical issues arise from interaction with other people, other beings (such as animals) and the environment, especially at the point where there is actual or potential conflict of interest.

The scientist or researcher has the right to search for the truth but not at the expense of the rights of other individuals in society (Mouton, 2015). Therefore, the researcher

has the right to collect data and information through interviewing people but not at the expense of the interviewees' right to privacy.

Van Gensen (2005) translates ethics into educational research language from Pring (2000) who refers to the “search for the rules of conduct that enables us to operate defensibly in political contexts in which we have to conduct educational research”. According to Mouton (2015) the scientific community is responsible for deciding on what is morally acceptable behaviour in the domain in science, and such codes of conduct to regulate the behaviour of members of the scientific community are usually enforced through professional societies, universities and funding agencies in some cases.

The researcher followed the process by applying and obtained ethical clearances at the all the institutions, where students were involved in the study, to ensured that the questionnaire fulfilled all ethical requirements.



3.6 Summary

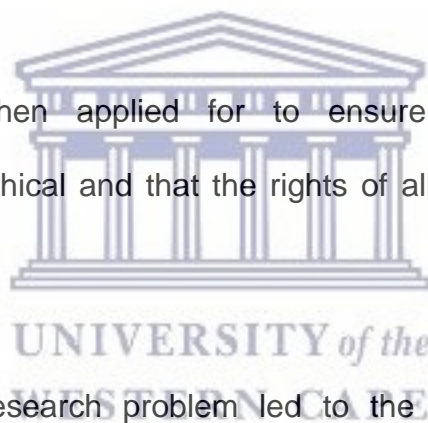
The chapter introduced and discussed the purpose and objectives, hypotheses, methodology and design of this study. The research question was developed and hypotheses were formulated to allow the research question to be answered in this study. Thus the research design was selected for this study.

The Theory of Planned Behaviour was adapted and used in this study to determine the EI of final-year students who are doing entrepreneurship degrees/diplomas or

who have completed three or more entrepreneurship modules. As such, the population group for this study was identified for the purposes of this study.

The methodology used in the collection of data was discussed and a self-administered questionnaire was proposed for completion by the participating students. A questionnaire used for the testing of the Theory of Planned Behaviour was designed and developed. Questions were developed and designed for each one of the four cognitive factors, including EI. Once the questionnaire had been developed and designed, it was tested on a sample population for the purposes of validity and reliability of the questionnaire.

Ethical clearance was then applied for to ensure that all questions and methodologies used are ethical and that the rights of all participants are observed and respected.



The formulation of the research problem led to the research design and the methodology used. It was determined that an empirical study with an exploratory question would be the most effective way to answer the research question. The literature review further refined the research question as gaps were identified in the literature. Entrepreneurial leadership, as a construct, did not have a reliable measuring tool that focused on the entrepreneurial leadership qualities of an organisational leader until 2015 when a model for determining entrepreneurial leadership was empirically tested and proven (Renko et al. 2015). Considering the current socio-economic climate in which we find ourselves in South African, it is therefore imperative to determine the level of entrepreneurial leadership of those

responsible for offering entrepreneurship programmes in commerce faculties. To determine the intention of students to start a business within five years after graduation, the theory of planned behaviour was used. The model was modified to facilitate this study, which considers various components that impact on EI. The components that impact on EI are attitude towards entrepreneurship, role models, entrepreneurial leadership, and opportunities and resources within commerce faculties.

It was therefore decided that the most effective way to collect data would be by means of a survey using a questionnaire specifically designed for the purpose of this study.

The next chapter represents the research results and data from the responses provided by the students who participated in this study.



CHAPTER 4

4. Presentation of results

4.1 Introduction

The model designed for purposes of this study stemmed from a thorough study of the literature available, focusing on the influence of attitude towards entrepreneurship, role models, entrepreneurial leadership, and resources and opportunities on the entrepreneurial intention (EI) of students completing various courses of study within entrepreneurship. This hypothesis was introduced and presented in Chapter 3.

This chapter presents the results of the research study based on the statistical analysis of the data collected from the various institutions' respondents. The analysis performed was to test the hypothesis which was introduced in Chapter 3. The statistical program used for the analysis of the data collected was the IBM Statistical Package for Social Sciences (SPSS) version 24.

The chapter continues with a discussion of the treatment of missing values, frequency, and item and dimensional analysis, and concludes with the overall measurement of the model.

4.2 Missing values

Collected data that uses self-reporting instruments, such as questionnaires, is often plagued with missing data as respondents fail to answer all the questions for a variety of reasons. Pallant (2011) states that in doing research it is rare that complete data will be obtained, especially when dealing with human beings. For this study there were no missing values found.

4.3 Survey results from student respondents

The data for this research study was collected at the commerce faculties of various universities. The institutions of higher education that were approached are Stellenbosch University, University of the Western Cape (UWC), University of Cape Town (UCT) and Cape Peninsula University of Technology (CPUT). Table 4.1 shows the breakdown of the number of students that participated, and the institutions at which they were studying, in the process of data collection. The majority of the participants were from UWC with 40.4% and the least number of participants from UCT at 11.3% of the total number of participants.

Table 4.1: Institutions involved in the study

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Stellenbosch University	48	20.0	20.0	20.0
	UWC	97	40.4	40.4	60.4
	UCT	27	11.3	11.3	71.7
	CPUT	68	28.3	28.3	100.0
	Total	240	100.0	100.0	

The respondents were asked to indicate their gender. The reason for this was to understand the component of gender groups doing entrepreneurship qualifications at the various institutions. The results of the responses are documented in Table 4.2, showing 123 respondents (51.3%) as being male and 117 (48.8%) female. Table 4.3 shows that the majority (189 or 78.8%) of the respondents were between the ages of 20 and 24 years, followed by respondents aged between 25 and 29 years (26 or 10.8%).

Table 4.2: Gender of respondents

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Male	123	51.3	51.3	51.3
	Female	117	48.8	48.8	100.0
	Total	240	100.0	100.0	

Table 4.3: Age of respondents

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	< 20 years	6	2.5	2.5	2.5
	20 - 24 years	189	78.8	78.8	81.3
	25 - 29 years	26	10.8	10.8	92.1
	30 - 34 years	10	4.2	4.2	96.3
	35 years and older	9	3.8	3.8	100.0
	Total	240	100.0	100.0	

Table 4.4 indicates the respective levels of education towards which the respondents were busy studying at the various institutions. A total of 143 respondents (59.6%) were studying towards a degree qualification and 42 (17.5%) were studying towards a diploma qualification. The remainder were completing a postgraduate diploma (26 or 10.8%) or an honours degree (29 or 12.1%).

Table 4.4: Programmes of respondents

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Degree	143	59.6	59.6	59.6
	Postgraduate diploma	26	10.8	10.8	70.4
	Honours	29	12.1	12.1	82.5
	Diploma	42	17.5	17.5	100.0
	Total	240	100.0	100.0	

With regard to nationality, the majority (86.3%) of respondents were South African citizens. The respondents were also asked to indicate their race for demographic purposes, revealing that 98 respondents (40.8%) were black, 77 (32.1%) coloured and 58 (24.2%) white.

Table 4 5: Nationality of respondents

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	South African	207	86.3	86.3	86.3
	Non-South African	33	13.8	13.8	100.0
	Total	240	100.0	100.0	

Table 4.6: Race of respondents

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Black	98	40.8	40.8	40.8
	Coloured	77	32.1	32.1	72.9
	White	58	24.2	24.2	97.1
	Other	7	2.9	2.9	100.0
	Total	240	100.0	100.0	

4.4 Observations from respondents' answers

This section focuses on the respondents' responses to the statements made in the questionnaires. The methodology that was used in the construction of the questions is discussed in the previous chapter. Five subscales will be discussed in this section and this will be done one subscale at a time so as to give more detailed insight into the responses of the respondents. The five subscales are Entrepreneurial Intention, Attitude towards Entrepreneurship, Role Models, Entrepreneurial Leaders, and Resources and Opportunities. The discussion of subscales will be in that particular order, starting with Entrepreneurial Intention and ending with Resources and Opportunities.

4.4.1.1 Entrepreneurial intention (EI) questionnaire responses

EI1: I intend to become an entrepreneur within five years of graduating.

As shown in Table 4.7, the responses to the statement above indicate that 40.4% of respondents strongly agreed with the statement and 35,4% agreed with the statement. This also implies that the majority (75.8%) of respondents had the intention to become entrepreneurs within five years of graduating.

Table 4.7: Respondents to Entre-Intention 1

		Entre-Intention 1			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	37	15.4	15.4	16.7
	Neutral	18	7.5	7.5	24.2
	Agree	85	35.4	35.4	59.6
	Strongly Agree	97	40.4	40.4	100.0
	Total	240	100.0	100.0	

EI2: I scan for entrepreneurial opportunities in the market environment.

With regard to the statement above, 51.7% of respondents agreed with the statement and 20.4% strongly agreed with the statement, which indicates that the majority of the students were scanning the market environment for opportunities. The results are shown in Table 4.8 below. The cumulative percentage of respondents who agreed and strongly agreed with this statement is 72.1%.

Table 4.8: Responses to Entre-Intention 2

		Entre-Intention 2			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	2	0.8	0.8	0.8
	Disagree	32	13.3	13.3	14.2
	Neutral	33	13.8	13.8	27.9
	Agree	124	51.7	51.7	79.6
	Strongly Agree	49	20.4	20.4	100.0
	Total	240	100.0	100.0	

EI3: I intend to use the knowledge gained from my current studies to become an entrepreneur.

Table 4.9 shows that 37.5% of respondents agreed and 46.3% strongly agreed with the statement that they were planning to use the knowledge obtained from their studies to become entrepreneurs after graduating.

Table 4.9: Responses to Entre-Intention 3

		Entre-Intention 3			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	7	2.9	2.9	2.9
	Disagree	18	7.5	7.5	10.4
	Neutral	14	5.8	5.8	16.3
	Agree	90	37.5	37.5	53.8
	Strongly Agree	111	46.3	46.3	100.0
	Total	240	100.0	100.0	

EI4: I constantly think about starting a successful business.

The majority of the respondents indicated that they constantly thought about starting a successful business, with 31.7% agreeing with the statement and 47.5% strongly agreeing with the statement, as shown in Table 4.10. Another 10.8% of the respondents disagreed with the statement.

Table 4.10: Responses to Entre-Intention 4

		Entre-Intention 4			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2,1	2,1	2,1
	Disagree	26	10,8	10,8	12,9
	Neutral	19	7,9	7,9	20,8
	Agree	76	31,7	31,7	52,5
	Strongly Agree	114	47,5	47,5	100,0
	Total	240	100,0	100,0	

EI5: I am ready to do everything possible to become self-employed.

In Table 4.11, the statement's results reflect the readiness of the respondents to do everything to become self-employed. A combined 69.1% of respondents agreed and strongly agreed with the statement. The results also show that a joint 20.5% of the respondents disagreed (16.7%) and strongly disagreed (3.8%) with the statement.

Table 4.11: Responses to Entre-Intention 5

		Entre-Intention 5			
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	9	3.8	3.8	3.8
	Disagree	40	16.7	16.7	20.4
	Neutral	25	10.4	10.4	30.8
	Agree	74	30.8	30.8	61.7
	Strongly Agree	92	38.3	38.3	100.0
	Total	240	100.0	100.0	

EI6: I will make every effort to start and run my own business.

The respondents agreed (36.7%) and strongly agreed (41.7%) with this statement, reflecting that the respondents will make every effort to start and run their own

business, with only a total of 12.1% disagreeing (10.4%) and strongly disagreeing (1.7%) with the statement, as shown in Table 4.12. A certain component (9.6%) of the respondents could not make up their minds whether or not they agreed with the statement.

Table 4.12: Responses to Entre-Intention 6

		Entre-Intention 6			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	4	1.7	1.7	1.7
	Disagree	25	10.4	10.4	12.1
	Neutral	23	9.6	9.6	21.7
	Agree	88	36.7	36.7	58.3
	Strongly Agree	100	41.7	41.7	100.0
	Total	240	100.0	100.0	

EI7: A career as an entrepreneur is attractive to me.

The results to the above statement reflect that the respondents felt very strongly about a career as an entrepreneur and its attractiveness to them, with the majority (88%) of the respondents agreeing (28.8%) and strongly agreeing (59.2%) with the statement. This indicates that the majority of the respondents saw a career as an entrepreneur as being an attractive option to them.

Table 4.13: Responses to Entre-Intention 7

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	16	6.7	6.7	7.9
	Neutral	10	4.2	4.2	12.1
	Agree	69	28.8	28.8	40.8
	Strongly Agree	142	59.2	59.2	100.0
	Total	240	100.0	100.0	

EI8: I am determined to start my own business in the future.

The respondents' intention to start their own business is reflected by the 87.5% that agreed (26.7%) and strongly agreed (60.8%) with the statement in this subscale. These results indicate the respondents' strong intention to start their own business in the future.

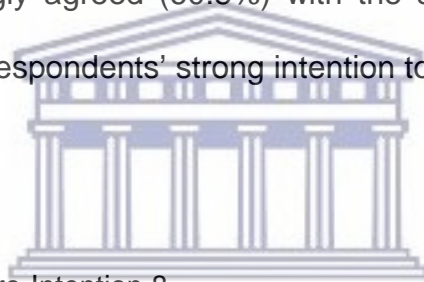


Table 4.14: Responses to Entre-Intention 8

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	18	7.5	7.5	8.8
	Neutral	9	3.8	3.8	12.5
	Agree	64	26.7	26.7	39.2
	Strongly Agree	146	60.8	60.8	100.0
	Total	240	100.0	100.0	

4.4.1.2 Attitude towards entrepreneurship (ATE) questionnaire responses

ATE1: I feel that entrepreneurship is the way of the future for the economy of the country.

The understanding that entrepreneurship is the way of the future is represented by the 90% of the respondents who agreed and strongly agreed with the statement.

Table 4.15 below shows that 39.6% of respondents agreed and 50.4% strongly agreed with the statement. The results indicate that the respondents were aware of the need for entrepreneurs in the future of the country's economy.

Table 4.15: Responses to Attitude T Entrepreneurship 1

Attitude T Entrepreneurship 1

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	2	0.8	0.8	0.8
	Disagree	9	3.8	3.8	4.6
	Neutral	13	5.4	5.4	10.0
	Agree	95	39.6	39.6	49.6
	Strongly Agree	121	50.4	50.4	100.0
	Total	240	100.0	100.0	

ATE2: In my opinion, entrepreneurship is more rewarding financially than working for a boss.

The results in Table 4.16 indicate that 33.8% of the respondents agreed and 47.5% strongly agreed with the statement that entrepreneurship is more financially rewarding than working for a boss. The cumulative total of “agree” and “strongly agree” responses to the statement in this subscale is 81.3%.

Table 4.16: Responses to Attitude T Entrepreneurship 2

Attitude T Entrepreneurship 2

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	4	1.7	1.7	1.7
	Disagree	23	9.6	9.6	11.3
	Neutral	18	7.5	7.5	18.8
	Agree	81	33.8	33.8	52.5
	Strongly Agree	114	47.5	47.5	100.0
	Total	240	100.0	100.0	

ATE3: Entrepreneurship has more freedom in decision-making than being employed at a company.

Table 4.17 shows that 124 (51.7%) of the respondents strongly agreed with the statement while 93 (38.8%) of the respondents agreed with the statement. Therefore, the majority (90.5%) of the respondents agreed and strongly agreed that there is more freedom in decision-making when being an entrepreneur.

Table 4.17: Responses to Attitude T Entrepreneurship 3

Attitude T Entrepreneurship 3

	Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid Strongly Disagree	2	0.8	0.8	0.8
Disagree	8	3.3	3.3	4.2
Neutral	13	5.4	5.4	9.6
Agree	93	38.8	38.8	48.3
Strongly Agree	124	51.7	51.7	100.0
Total	240	100.0	100.0	

ATE4: I feel excited when I consider all the possibilities that are on offer through entrepreneurship.

Table 4.18 below shows that 128 (53.3%) of the respondents agreed and 79 (32.9%) strongly agreed with the statement above.

Table 4.18: Responses to Attitude T Entrepreneurship 4

Attitude T Entrepreneurship 4

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	4	1.7	1.7	1.7
	Disagree	14	5.8	5.8	7.5
	Neutral	15	6.3	6.3	13.8
	Agree	128	53.3	53.3	67.1
	Strongly Agree	79	32.9	32.9	100.0
	Total	240	100.0	100.0	

ATE5: Entrepreneurship will allow me to reach all my dreams.

Entrepreneurship can be seen as way to reach one’s dreams. In this case, 101 (42.1%) of the respondents agreed with the statement while 79 (32.9%) strongly agreed with the statement, as seen in Table 4.19 below. On the other hand, 26 (10.8%) of the respondents disagreed with the statement.

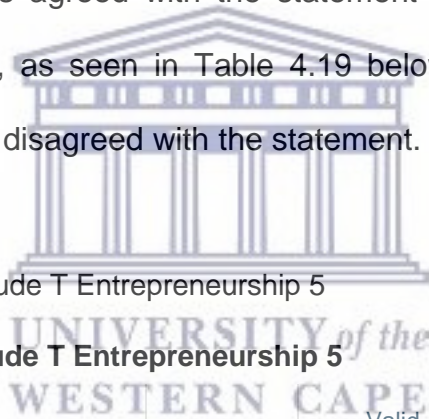


Table 4.19: Responses to Attitude T Entrepreneurship 5

Attitude T Entrepreneurship 5

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	26	10.8	10.8	12.9
	Neutral	29	12.1	12.1	25.0
	Agree	101	42.1	42.1	67.1
	Strongly Agree	79	32.9	32.9	100.0
	Total	240	100.0	100.0	

ATE6: Entrepreneurship will allow me to excel at what I am good at.

Table 4.20 shows that 123 (51.3%) of the respondents believed that entrepreneurship will allow them to excel at what they are good at, with 78 (32.5%) strongly agreeing with the statement.

Table 4.20: Responses to Attitude T Entrepreneurship 6

Attitude T Entrepreneurship 6

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	4	1.7	1.7	1.7
	Disagree	17	7.1	7.1	8.8
	Neutral	18	7.5	7.5	16.3
	Agree	123	51.3	51.3	67.5
	Strongly Agree	78	32.5	32.5	100.0
	Total	240	100.0	100.0	

ATE7: I enjoy discussions that allow me to talk about entrepreneurial opportunities.

Discussions about entrepreneurship are important in terms of further encouragement to continue with entrepreneurship, with 118 (49.2%) of the respondents agreeing that they enjoy discussions about entrepreneurial opportunities and 76 (31.7%) strongly agreeing with the statement, as shown in Table 4.21 below.

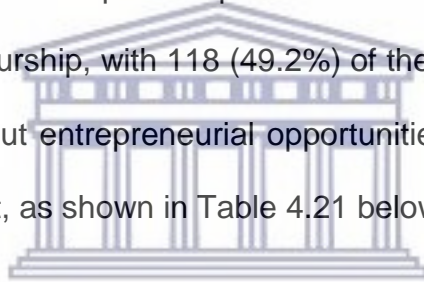


Table 4.21: Responses to Attitude T Entrepreneurship 7

Attitude T Entrepreneurship 7

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	19	7.9	7.9	10.0
	Neutral	22	9.2	9.2	19.2
	Agree	118	49.2	49.2	68.3
	Strongly Agree	76	31.7	31.7	100.0
	Total	240	100.0	100.0	

ATE8: Entrepreneurs have more status than those who are employed at a company or working for a boss.

Table 4.22 shows the results of statement ATE 8. A total of 88 (36.7%) of the respondents agreed with the statement and 57 (23.8%) strongly agreed; however, 50 (20.8%) of the respondents disagreed with the statement. The status of being an entrepreneur was still in question by 20.8% of the respondents.

Table 4.22: Responses to Attitude T Entrepreneurship 8

Attitude T Entrepreneurship 8

	Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid Strongly Disagree	8	3.3	3.3	3.3
Disagree	50	20.8	20.8	24.2
Neutral	37	15.4	15.4	39.6
Agree	88	36.7	36.7	76.3
Strongly Agree	57	23.8	23.8	100.0
Total	240	100.0	100.0	



ATE9: Being a business owner will give me great satisfaction.

Table 4.23 shows that 119 (49.6%) of the respondents strongly agreed with the statement while 91 (37.9%) agreed with the statement. A very small component of the respondents disagreed and strongly disagreed with the statement.

Table 4.23: Responses to Attitude T Entrepreneurship 9

Attitude T Entrepreneurship 9

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	9	3.8	3.8	5.8
	Neutral	16	6.7	6.7	12.5
	Agree	91	37.9	37.9	50.4
	Strongly Agree	119	49.6	49.6	100.0
	Total	240	100.0	100.0	

ATE10: Starting a business and keeping it going would be easy for me.

Table 4.24 below shows that 75 (31.3%) of the respondents agreed with the statement, while 70 (29.2%) of the respondents disagreed with the statement. This shows that an equal – or close to equal – number of respondents agreed and disagreed with the statement.

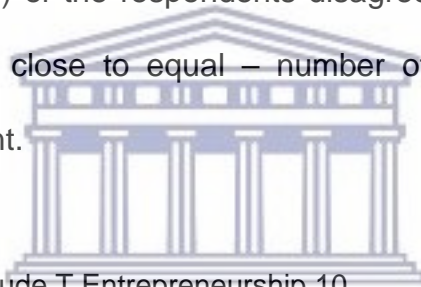


Table 4.24: Responses to Attitude T Entrepreneurship 10

Attitude T Entrepreneurship 10

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	13	5.4	5.4	5.4
	Disagree	70	29.2	29.2	34.6
	Neutral	53	22.1	22.1	56.7
	Agree	75	31.3	31.3	87.9
	Strongly Agree	29	12.1	12.1	100.0
	Total	240	100.0	100.0	

ATE 11: If I start my business I have a high chance of being successful.

Table 4.25 shows that 90 (37.5%) of the respondents agreed with the statement. There is a 0.4% difference between the components of Neutral (53 respondents) and Strongly Agree (54 respondents) in this subscale, which shows that the number of

respondents who could not decide on an answer was equivalent to the number of respondents who strongly agreed with the statement.

Table 4.25: Responses to Attitude T Entrepreneurship 11

Attitude T Entrepreneurship 11					
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	7	2.9	2.9	2.9
	Disagree	36	15.0	15.0	17.9
	Neutral	53	22.1	22.1	40.0
	Agree	90	37.5	37.5	77.5
	Strongly Agree	54	22.5	22.5	100.0
	Total	240	100.0	100.0	

4.4.1.3 Entrepreneurial leadership (EL) questionnaire responses

EL1: Most people who are important to me think that I should become an entrepreneur.

The results of this statement, as noted in Table 4.26, show that 97 (40.4%) of the respondents agreed with the statement while 53 (22.1%) disagreed with the statement. The table also shows that 47 (19.6%) of the respondents strongly agreed with the statement.

Table 4.26: Responses to Entrepreneurial Leadership 1

Entrepreneurial Leadership 1					
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	6	2.5	2.5	2.5
	Disagree	53	22.1	22.1	24.6
	Neutral	37	15.4	15.4	40.0
	Agree	97	40.4	40.4	80.4
	Strongly Agree	47	19.6	19.6	100.0
	Total	240	100.0	100.0	

EL2: It is expected of me to become an entrepreneur, based on the subject matter that I am covering.

Table 4.27 below shows that 95 (39.6%) of the respondents agreed with the statement while 60 (25%) disagreed with the statement. A total of 26 (15%) of the respondents strongly agreed with the statement, which when combined with the “Agree” responses shows that 54.6% of the respondents agreed and strongly agreed with the statement.

Table 4.27: Responses to Entrepreneurial Leadership 2

Entrepreneurial Leadership 2

	Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid Strongly Disagree	11	4.6	4.6	4.6
Disagree	60	25.0	25.0	29.6
Neutral	38	15.8	15.8	45.4
Agree	95	39.6	39.6	85.0
Strongly Agree	36	15.0	15.0	100.0
Total	240	100.0	100.0	

EL3: My friends would approve of my decision to become an entrepreneur.

Table 4.28 below shows that 112 (46.7%) of the respondents agreed with the statement that their friends would approve of their decision to become an entrepreneur, while 82 (34.2%) strongly agreed with the statement.

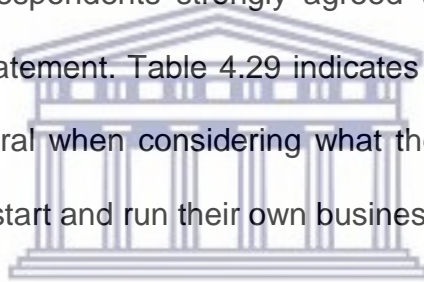
Table 4.28: Responses to Entrepreneurial Leadership 3

Entrepreneurial Leadership 3

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	18	7.5	7.5	8.8
	Neutral	25	10.4	10.4	19.2
	Agree	112	46.7	46.7	65.8
	Strongly Agree	82	34.2	34.2	100.0
	Total	240	100.0	100.0	

EL4: My immediate family would approve of my decision to start and run my own business.

A total of 95 (39.6%) of respondents strongly agreed with the statement and 85 (35.4%) agreed with the statement. Table 4.29 indicates that another 28 (11.7%) of the respondents were neutral when considering what their immediate family would say about their decision to start and run their own business.



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Table 4.29: Responses to Entrepreneurial Leadership 4

Entrepreneurial Leadership 4

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	27	11.3	11.3	13.3
	Neutral	28	11.7	11.7	25.0
	Agree	85	35.4	35.4	60.4
	Strongly Agree	95	39.6	39.6	100.0
	Total	240	100.0	100.0	

EL5: My fellow students would approve of my decision to start my own business.

Of the 240 respondents, 105 (43.8%) agreed with the statement, 73 (30.4%) strongly agreed and 42 (17.5%) were neutral. Table 4.30 shows the results of the responses to the statement made.

Table 4.30: Responses to Entrepreneurial Leadership 5

Entrepreneurial Leadership 5

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	15	6.3	6.3	8.3
	Neutral	42	17.5	17.5	25.8
	Agree	105	43.8	43.8	69.6
	Strongly Agree	73	30.4	30.4	100.0
	Total	240	100.0	100.0	

EL6: Most people who are important to me believe that I have the integrity to start my own business.

Table 4.31 shows the results of the responses to the above statement: 105 (43.8%) of the respondents agreed with the statement, 94 (39.2%) strongly agreed and 27 (11.3%) were neutral.

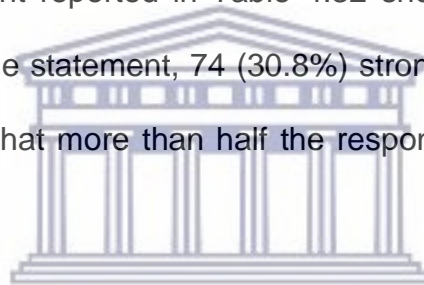
Table 4.31: Responses to Entrepreneurial Leadership 6

Entrepreneurial Leadership 6

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	1	0.4	0.4	0.4
	Disagree	13	5.4	5.4	5.8
	Neutral	27	11.3	11.3	17.1
	Agree	105	43.8	43.8	60.8
	Strongly Agree	94	39.2	39.2	100.0
	Total	240	100.0	100.0	

EL7: Most people who are important to me think that I have the necessary skills to start my own business.

The results of the statement reported in Table 4.32 show that 114 (47.5%) of the respondents agreed with the statement, 74 (30.8%) strongly agreed and 37 (15.4%) were neutral. This means that more than half the respondents agreed and strongly agreed with the statement.



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Table 4.32: Responses to Entrepreneurial Leadership 7

Entrepreneurial Leadership 7

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	2	0.8	0.8	0.8
	Disagree	13	5.4	5.4	6.3
	Neutral	37	15.4	15.4	21.7
	Agree	114	47.5	47.5	69.2
	Strongly Agree	74	30.8	30.8	100.0
	Total	240	100.0	100.0	

EL8: Most people who are important to me think that I have the necessary leadership qualities to start my own business.

Of the 240 respondents, 110 (45.8%) agreed with the statement, 85 (35.4%) strongly agreed with the statement and 31 (12.9%) indicated that they were neutral to the statement.

Table 4.33: Responses to Entrepreneurial Leadership 8

Entrepreneurial Leadership 8

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	2	0.8	0.8	0.8
	Disagree	12	5.0	5.0	5.8
	Neutral	31	12.9	12.9	18.8
	Agree	110	45.8	45.8	64.6
	Strongly Agree	85	35.4	35.4	100.0
	Total	240	100.0	100.0	

4.4.1.4 Role model (RM) questionnaire responses



RM1: I would have complete control over the situation if I start and run my own business.

Table 4.34 shows that 79 (32.9%) of the respondents agreed with the statement, 53 (22.1%) disagreed with the statement and 50 (20.8%) strongly agreed with the statement.

Table 4.34: Responses to Role Model 1

		Role Model 1			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	19	7.9	7.9	7.9
	Disagree	53	22.1	22.1	30.0
	Neutral	39	16.3	16.3	46.3
	Agree	79	32.9	32.9	79.2
	Strongly Agree	50	20.8	20.8	100.0
	Total	240	100.0	100.0	

RM2: My entrepreneurship lecturer is my role model in becoming an entrepreneur.

Table 4.35 shows that 74 (30.8%) of the respondents disagreed with the statement, 66 (27.5%) agreed and 48 (20%) were neutral. In the case of this statement, the largest component disagreed with the statement.

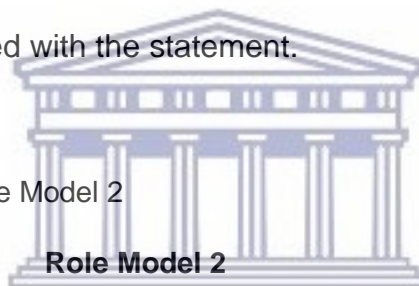


Table 4.35: Responses to Role Model 2

		Role Model 2			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	31	12.9	12.9	12.9
	Disagree	74	30.8	30.8	43.8
	Neutral	48	20.0	20.0	63.8
	Agree	66	27.5	27.5	91.3
	Strongly Agree	21	8.8	8.8	100.0
	Total	240	100.0	100.0	

RM3: My entrepreneurship lecturer motivates me to become an entrepreneur.

According to the results for this statement as shown in Table 4.36, 98 (40.8%) of the respondents agreed with the statement, 49 (20.4%) disagreed and 43 (17.9%) strongly agreed with the statement.

Table 4.36: Responses to Role Model 3

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	11	4.6	4.6	4.6
	Disagree	49	20.4	20.4	25.0
	Neutral	39	16.3	16.3	41.3
	Agree	98	40.8	40.8	82.1
	Strongly Agree	43	17.9	17.9	100.0
	Total	240	100.0	100.0	

RM4: My entrepreneurship lecturer imparts entrepreneurial skills and knowledge to me.

Table 4.37 shows that 127 (52.9%) of the respondents agreed with the statement, 58 (24.2%) strongly agreed with the statement and 27 (11.3%) were neutral to the statement.

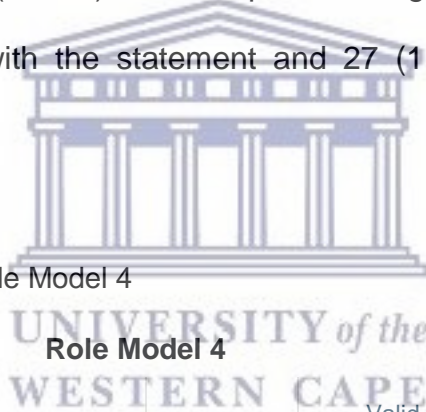


Table 4.37: Responses to Role Model 4

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	5	2.1	2.1	2.1
	Disagree	23	9.6	9.6	11.7
	Neutral	27	11.3	11.3	22.9
	Agree	127	52.9	52.9	75.8
	Strongly Agree	58	24.2	24.2	100.0
	Total	240	100.0	100.0	

RM5: My entrepreneurship lecturer displays the right behaviour of an entrepreneur.

According to the results shown in Table 4.38, 112 (46.7%) of the respondents agreed with the statement, while 38 (15.8%) of the respondents disagreed with and were neutral to the statement respectively.

Table 4.38: Responses to Role Model 5

		Role Model 5			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	9	3.8	3.8	3.8
	Disagree	38	15.8	15.8	19.6
	Neutral	38	15.8	15.8	35.4
	Agree	112	46.7	46.7	82.1
	Strongly Agree	43	17.9	17.9	100.0
	Total	240	100.0	100.0	

RM6: My entrepreneurship lecturer reinforces my entrepreneurial intention.

Table 4.39 shows that 121 (50.4%) of the respondents agreed with the statement, 41 (17.1%) strongly agreed with the statement and 38 (15.8%) were neutral.

Table 4.39: Responses to Role Model 6

		Role Model 6			
		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	9	3.8	3.8	3.8
	Disagree	31	12.9	12.9	16.7
	Neutral	38	15.8	15.8	32.5
	Agree	121	50.4	50.4	82.9
	Strongly Agree	41	17.1	17.1	100.0
	Total	240	100.0	100.0	

RM7: With his/her experience my entrepreneurship lecturer has given me good advice about becoming an entrepreneur.

Table 4.40 shows that 133 (55.4%) of the 240 respondents agreed with the statement, 46 (19.2%) strongly agreed with the statement and 31 (12.9%) disagreed with the statement.

Table 4.40: Responses to Role Model 7

Role Model 7

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	6	2.5	2.5	2.5
	Disagree	31	12.9	12.9	15.4
	Neutral	24	10.0	10.0	25.4
	Agree	133	55.4	55.4	80.8
	Strongly Agree	46	19.2	19.2	100.0
	Total	240	100.0	100.0	

RM8: I admire my entrepreneurship lecturer for the entrepreneurship knowledge he/she possesses.

Table 4.41 below shows the results of the statement, where 98 (40.8%) of the respondents agreed with the statement, 71 (29.3%) strongly agreed and 32 (13.3%) disagreed with the statement.

Table 4.41: Responses to Role Model 8

Role Model 8

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	12	5.0	5.0	5.0
	Disagree	32	13.3	13.3	18.3
	Neutral	27	11.3	11.3	29.6
	Agree	98	40.8	40.8	70.4
	Strongly Agree	71	29.6	29.6	100.0
	Total	240	100.0	100.0	

4.4.1.5 Resources and opportunities (RO) questionnaire responses

RO1: I would have complete control over the situation if I start and run my own business.

Of the 240 respondents, 115 (47.9%) agreed with the statement made while 43 (17.9%) strongly agreed with the statement and 40 (16.7%) were neutral.

Table 4.42: Responses to Resources and Opportunities 1

Resources and Opportunities 1

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	39	16.3	16.3	17.5
	Neutral	40	16.7	16.7	34.2
	Agree	115	47.9	47.9	82.1
	Strongly Agree	43	17.9	17.9	100.0
	Total	240	100.0	100.0	

RO2: I know all about the necessary practical details needed to start my own business.

According to the results reflected in Table 4.43 below, 99 (41.3%) of the respondents agreed with the statement, 64 (26.7%) disagreed with the statement and 39 (16.3%) strongly agreed with the statement.

Table 4.43: Responses to Resources and Opportunities 2

Resources and Opportunities 2

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	4	1.7	1.7	1.7
	Disagree	64	26.7	26.7	28.3
	Neutral	34	14.2	14.2	42.5
	Agree	99	41.3	41.3	83.8
	Strongly Agree	39	16.3	16.3	100.0
	Total	240	100.0	100.0	

RO3: If I wanted to, I could easily start and run my own business.

Table 4.44 shows that 87 (36.3%) of the respondents agreed with the statement, 67 (27.9%) disagreed with the statement and 46 (19.2%) were neutral to the statement made.



Table 4.44: Responses to Resources and Opportunities 3

Resources and Opportunities 3

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	8	3.3	3.3	3.3
	Disagree	67	27.9	27.9	31.3
	Neutral	46	19.2	19.2	50.4
	Agree	87	36.3	36.3	86.7
	Strongly Agree	32	13.3	13.3	100.0
	Total	240	100.0	100.0	

RO4: I know all about the various ways of obtaining financial support to start my own business.

The responses as per Table 4.45 show that 109 (45.4%) of the respondents agreed with the statement, 57 (23.8%) disagreed with the statement and 34 (14.2%) were neutral to the statement and strongly agreed with the statement respectively.

Table 4.45: Responses to Resources and Opportunities 4

Resources and Opportunities 4

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	6	2.5	2.5	2.5
	Disagree	57	23.8	23.8	26.3
	Neutral	34	14.2	14.2	40.4
	Agree	109	45.4	45.4	85.8
	Strongly Agree	34	14.2	14.2	100.0
	Total	240	100.0	100.0	

RO5: I know that I have the necessary networks and support to start my own business.

Of the 240 respondents, 99 (41.3%) agreed with the statement, while 39 (16.3%) were neutral to the statement and strongly agreed with the statement respectively.



Table 4.46: Responses to Resources and Opportunities 5

Resources and Opportunities 5

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	10	4.2	4.2	4.2
	Disagree	53	22.1	22.1	26.3
	Neutral	39	16.3	16.3	42.5
	Agree	99	41.3	41.3	83.8
	Strongly Agree	39	16.3	16.3	100.0
	Total	240	100.0	100.0	

RO6: I know that I will receive the necessary funds to start my own business.

Table 4.47 shows that 79 (32.9%) of the respondents agreed with the statement, 62 (25.8%) disagreed with the statement and 54 (22.5%) were neutral to the statement made.

Table 4.47: Responses to Resources and Opportunities 6

Resources and Opportunities 6

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	18	7.5	7.5	7.5
	Disagree	62	25.8	25.8	33.3
	Neutral	54	22.5	22.5	55.8
	Agree	79	32.9	32.9	88.8
	Strongly Agree	27	11.3	11.3	100.0
	Total	240	100.0	100.0	

RO7: If I had the opportunity and resources, I would like to start my own business.

According to the results, 121 (50.4%) of the respondents strongly agreed with the statement, 89 (37.1%) agreed with the statement and 14 (5.8%) disagreed with the statement made.

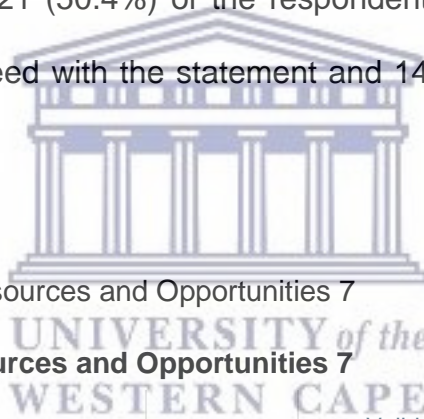


Table 4.48: Responses to Resources and Opportunities 7

Resources and Opportunities 7

		Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid	Strongly Disagree	3	1.3	1.3	1.3
	Disagree	14	5.8	5.8	7.1
	Neutral	13	5.4	5.4	12.5
	Agree	89	37.1	37.1	49.6
	Strongly Agree	121	50.4	50.4	100.0
	Total	240	100.0	100.0	

RO8: I am confident that I possess all the skills to run a successful business.

In response to this statement, 107 (44.6%) of the respondents agreed, 88 (36.7%) strongly agreed and 25 (10.4%) were neutral.

Table 4.49: Responses to Resources and Opportunities 8

Resources and Opportunities 8

	Frequency	Percentage	Valid Percentage	Cumulative Percentage
Valid Strongly Disagree	2	0.8	0.8	0.8
Disagree	18	7.5	7.5	8.3
Neutral	25	10.4	10.4	18.8
Agree	107	44.6	44.6	63.3
Strongly Agree	88	36.7	36.7	100.0
Total	240	100.0	100.0	

4.5 Item analysis

Item analysis is a statistical method that is used to identify and eliminate items that do not contribute to the internal consistency of the subscale in question. According to Anastasi and Urbina (1997) high validity and reliability can be included in tests in advance, through item analysis, thereby improving the tests through the selection, substitution or revision of items. Nunnally's (1967) guidelines were used to determine levels of reliability for the scales and subscales. Table 4.50 below tabulates the guidelines for scales and subscales.

Table 4.50: General guidelines for interpreting reliability coefficients

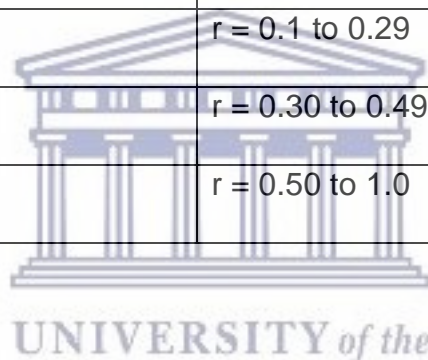
Reliability coefficient value	Interpretation
0.9 and above	Excellent
0.80 – 0.89	Good
0.70 – 0.79	Adequate
Below 0.70	May have limited applicability

In the Corrected Item-Total Correlation column within the Item-Total Statistics table, any item loading > 0.30 here indicates that the item is measuring something different from the scale as a whole, thus the item will be excluded (Pallant, 2011). Correlation (strength of the relationship) is measured from -1.00 to 1.00 (positive or negative, indicating the direction of the correlation) with 0 indicating no relationship and -1.00 and 1.00 being a perfect correlation (Pallant, 2011). Cohen (1988) suggests the following guidelines:

Table 4.51: Correlation strength guidelines

Strength of correlation	Value range
Small	$r = 0.1$ to 0.29
Medium	$r = 0.30$ to 0.49
Large	$r = 0.50$ to 1.0

Source: (Cohen, 1988)



4.5.1 Item analysis of entrepreneurial intention questionnaire

The questionnaire to test the entrepreneurial intention of students was developed by the researcher, with the method of development as discussed in Chapter 3.

4.5.1.1 Entrepreneurial intention

A Cronbach's alpha of 0.897 was obtained for the Entrepreneurial Intention subscale. The Cronbach's alpha should be greater than 0.70 to be considered; however, this subscale scored "Good" according to Nunnally's (1967) guidelines.

The Corrected Item-Total Correlation in the Item-Total Statistics table shows the percentage to which each item correlates to the total score. Pallant (2011) mentioned that low values (< 0.3) indicate that the item is measuring something different from the scale as a whole. All the Corrected Item-Total Correlation values in this subscale range between 0.512 and 0.785, which suggests a large correlation among the items. See tables 4.52, 4.53 and 4.54 below.

Table 4.52: Cronbach's alpha of the entrepreneurial intention subscale

Reliability Statistics

Cronbach's alpha	Cronbach's alpha based on standardised items	N of Items
0.897	0.898	8

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Table 4.53: Inter-item correlation matrix of the entrepreneurial intention subscale

Inter-Item Correlation Matrix

	EI 1	EI 2	EI 3	EI 4	EI 5	EI 6	EI 7	EI 8
EI 1	1.000	0.388	0.589	0.547	0.559	0.590	0.588	0.618
EI 2	0.388	1.000	0.346	0.425	0.399	0.480	0.365	0.427
EI 3	0.589	0.346	1.000	0.494	0.438	0.557	0.556	0.568
EI 4	0.547	0.425	0.494	1.000	0.494	0.609	0.520	0.629
EI 5	0.559	0.399	0.438	0.494	1.000	0.646	0.462	0.485
EI 6	0.590	0.480	0.557	0.609	0.646	1.000	0.570	0.696
EI 7	0.588	0.365	0.556	0.520	0.462	0.570	1.000	0.623
EI 8	0.618	0.427	0.568	0.629	0.485	0.696	0.623	1.000

Table 4.54: Inter-total statistics for the entrepreneurial intention subscale

Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
EI 1	28.72	30.296	0.726	0.547	0.879
EI 2	28.93	33.752	0.512	0.275	0.898
EI 3	28.53	31.664	0.655	0.460	0.886
EI 4	28.58	30.863	0.690	0.492	0.883
EI 5	28.87	30.242	0.645	0.478	0.889
EI 6	28.64	30.257	0.785	0.646	0.874
EI 7	28.32	32.194	0.684	0.495	0.884
EI 8	28.32	31.280	0.758	0.621	0.877

Table 4.55: Scale statistics output for the entrepreneurial intention subscale

Scale Statistics			
Mean	Variance	Std. Deviation	N of Items
32.70	40.311	6.349	8

4.4.1.2 Attitude towards entrepreneurship

A Cronbach's alpha of 0.840 was obtained for the attitude towards entrepreneurship (ATE) subscale, which is greater than the cut-off of 0.70; therefore, it can be considered a "Good" subscale score according to Nunnally's (1967) guidelines. The Corrected Item-Total Correlation, in the Item-Total Statistics table, shows the percentage to which each item correlates to the total score. Pallant (2011) mentioned that low values (< 0.3) indicate that the item is measuring something different from the scale as a whole. The Corrected Item-Total Correlation values in this subscale range between 0.379 and 0.648. The Inter-Item Correlation Matrix shows that there are three items with small correlation with the other items in the subset, as they scored in the range between $r = 0.10$ and 0.29 . These items are ATE 8, ATE 10 and ATE 11. No items were therefore deleted. See tables 4.56, 4.57 and 4.58 below.

Table 4.56: Cronbach's alpha for the attitude towards entrepreneurship subscale

Reliability Statistics		
Cronbach's alpha	Cronbach's alpha based on standardised items	N of items
0.840	0.847	11

Table 4.57: Inter-item correlation matrix of the attitude towards entrepreneurship subscale

Inter-Item Correlation Matrix

	ATE 1	ATE 2	ATE 3	ATE 4	ATE 5	ATE 6	ATE 7	ATE 8	ATE 9	ATE 10	ATE 11
ATE 1	1.000	0.402	0.357	0.326	0.273	0.400	0.395	0.161	0.400	0.073	0.234
ATE 2	0.402	1.000	0.389	0.418	0.395	0.453	0.351	0.240	0.381	0.158	0.258
ATE 3	0.357	0.389	1.000	0.459	0.400	0.359	0.330	0.227	0.386	0.185	0.169
ATE 4	0.326	0.418	0.459	1.000	0.492	0.505	0.578	0.162	0.491	0.178	0.248
ATE 5	0.273	0.395	0.400	0.492	1.000	0.532	0.486	0.299	0.393	0.252	0.286
ATE 6	0.400	0.453	0.359	0.505	0.532	1.000	0.488	0.305	0.430	0.262	0.320
ATE 7	0.395	0.351	0.330	0.578	0.486	0.488	1.000	0.217	0.511	0.181	0.212
ATE 8	0.161	0.240	0.227	0.162	0.299	0.305	0.217	1.000	0.205	0.328	0.258
ATE 9	0.400	0.381	0.386	0.491	0.393	0.430	0.511	0.205	1.000	0.290	0.342
ATE 10	0.073	0.158	0.185	0.178	0.252	0.262	0.181	0.328	0.290	1.000	0.588
ATE 11	0.234	0.258	0.169	0.248	0.286	0.320	0.212	0.258	0.342	0.588	1.000

Table 4.58: Item-total statistics of the attitude towards entrepreneurship subscale

Item-Total Statistics					
	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
ATE 1	39.25	39.351	0.462	0.318	0.831
ATE 2	39.44	36.984	0.533	0.336	0.825
ATE 3	39.23	39.023	0.505	0.325	0.828
ATE 4	39.50	37.498	0.603	0.490	0.821
ATE 5	39.67	36.155	0.604	0.419	0.819
ATE 6	39.54	36.735	0.648	0.455	0.817
ATE 7	39.60	37.020	0.584	0.467	0.821
ATE 8	40.03	37.982	0.379	0.193	0.841
ATE 9	39.31	37.252	0.604	0.410	0.820
ATE 10	40.45	37.830	0.403	0.407	0.838
ATE 11	39.98	37.355	0.471	0.414	0.831

Table 4.59: Reliability analysis output for the attitude towards entrepreneurship subscale

Scale Statistics			
Mean	Variance	Std. Deviation	N of Items
43.60	44.735	6.688	11

4.4.1.3 Entrepreneurial leadership

A Cronbach's alpha of 0.824 was obtained for the entrepreneurial leadership (EL) subscale, which is greater than the cut-off of 0.70, therefore it can be considered a "Good" subscale score according Nunnally's (1967) guidelines. The Corrected Item-Total Correlation, in the Item-Total Statistics table, shows the percentage to which each item correlates to the total score. Pallant (2011) mentioned that low values (< 0.3) indicate that the item is measuring something different from the scale as a whole. The Corrected Item-Total Correlation values in this subscale range between 0.296 and 0.681, indicating that the items in the subscale measured the scale as a whole. The Inter-Item Correlation Matrix shows that items EL 3, EL 4 and EL 5 have a small correlation to EL 2, which ranges in score between 0.128 and 0.156. No items were therefore deleted. See tables 4.60, 4.61 and 4.62 below.

Table 4.60: Cronbach's alpha of the entrepreneurial leadership subscale

Reliability Statistics		
Cronbach's alpha	Cronbach's alpha based on standardised items	N of Items
0.824	0.835	8

Table 4.61: Inter-item correlation of the entrepreneurial leadership subscale

Inter-Item Correlation Matrix

	EL 1	EL 2	EL 3	EL 4	EL 5	EL 6	EL 7	EL 8
EL 1	1.000	0.363	0.372	0.343	0.363	0.452	0.434	0.349
EL 2	0.363	1.000	0.149	0.128	0.156	0.237	0.245	0.205
EL 3	0.372	0.149	1.000	0.492	0.531	0.442	0.346	0.457
EL 4	0.343	0.128	0.492	1.000	0.528	0.419	0.363	0.405
EL 5	0.363	0.156	0.531	0.528	1.000	0.505	0.393	0.410
EL 6	0.452	0.237	0.442	0.419	0.505	1.000	0.612	0.592
EL 7	0.434	0.245	0.346	0.363	0.393	0.612	1.000	0.541
EL 8	0.349	0.205	0.457	0.405	0.410	0.592	0.541	1.000

Table 4.62: Item-total statistics for the entrepreneurial leadership subscale

Item-Total Statistics					
	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
EL 1	27.62	20.806	0.558	0.337	0.803
EL 2	27.79	23.139	0.296	0.145	0.843
EL 3	27.09	21.841	0.577	0.402	0.800
EL 4	27.15	21.141	0.547	0.372	0.804
EL 5	27.20	21.474	0.599	0.433	0.797
EL 6	26.98	21.539	0.681	0.535	0.788
EL 7	27.12	21.998	0.606	0.452	0.797
EL 8	27.04	22.007	0.608	0.446	0.797

Table 4.63: Reliability analysis output for the entrepreneurial leadership subscale

Scale Statistics			
Mean	Variance	Std. Deviation	N of Items
31.14	27.704	5.263	8

4.4.1.4 Role models

A Cronbach's alpha of 0.912 was obtained for the role model (RM) subscale, which is greater than the cut-off of 0.70, therefore it can be considered an "Excellent" subscale score according Nunnally's (1967) guidelines. The Corrected Item-Total Correlation, in the Item-Total Statistics table, shows the degree to which each item correlates to the total score. Pallant (2011) mentioned that low values (< 0.3) indicate that the item is measuring something different from the scale as a whole. The Corrected Item-Total Correlation values in this subscale range between 0.678 and 0.762, indicating that the items in the subscale measured the scale as a whole. The Inter-Item Correlation Matrix shows that the majority of items showed a large correlation among the items. No items were therefore deleted. See tables 4.64, 4.65 and 4.66.

Table 4.64: Cronbach's alpha for the role model subscale

Reliability Statistics		
Cronbach's alpha	Cronbach's alpha based on standardised items	N of Items
0.912	0.913	8

Table 4.65: Inter-item correlation matrix for the role model subscale

Inter-Item Correlation Matrix

	RM 1	RM 2	RM 3	RM 4	RM 5	RM 6	RM 7	RM 8
RM 1	1.000	0.695	0.661	0.443	0.564	0.543	0.487	0.557
RM 2	0.695	1.000	0.662	0.410	0.548	0.497	0.420	0.525
RM 3	0.661	0.662	1.000	0.531	0.591	0.627	0.517	0.588
RM 4	0.443	0.410	0.531	1.000	0.612	0.605	0.521	0.578
RM 5	0.564	0.548	0.591	0.612	1.000	0.634	0.625	0.634
RM 6	0.543	0.497	0.627	0.605	0.634	1.000	0.638	0.593
RM 7	0.487	0.420	0.517	0.521	0.625	0.638	1.000	0.607
RM 8	0.557	0.525	0.588	0.578	0.634	0.593	0.607	1.000

Table 4.66: Item-total statistics for the role model subscale

Item-Total Statistics					
	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
RM 1	24.99	35.920	0.718	0.585	0.901
RM 2	25.47	36.895	0.681	0.571	0.904
RM 3	24.88	36.505	0.762	0.608	0.896
RM 4	24.48	39.497	0.655	0.488	0.906
RM 5	24.76	37.220	0.759	0.596	0.897
RM 6	24.71	37.821	0.743	0.588	0.899
RM 7	24.60	38.928	0.678	0.526	0.904
RM 8	24.59	36.645	0.734	0.554	0.899

Table 4.67: Reliability analysis output for the entrepreneurial leadership subscale

Scale Statistics			
Mean	Variance	Std. Deviation	N of Items
28.35	48.280	6.948	8

4.4.1.5 Resources and opportunities

A Cronbach's alpha of 0.797 was obtained for the resources and opportunities (RO) subscale, which is greater than the cut-off of 0.70, therefore it can be considered an "Adequate" subscale score according Nunnally's (1967) guidelines. The Corrected Item-Total Correlation, in the Item-Total Statistics table, shows the percentage to which each item correlates to the total score. Pallant (2011) mentioned that low values (< 0.3) indicate that the item is measuring something different from the scale as a whole. The Corrected Item-Total Correlation values in this subscale range between 0.364 and 0.575, indicating that the items in the subscale measured the scale as a whole. The Inter-Item Correlation Matrix shows that there is a small correlation between item RO 1 and items RO 4, RO 5, RO 6 and RO 7, ranging between 0.148 and 0.287; however, there were no items deleted. See tables 4.68, 4.69 and 4.70 below.

Table 4.68: Cronbach's alpha for the resources and opportunities subscale

Reliability Statistics		
Cronbach's alpha	Cronbach's alpha based on standardised items	N of items
0,797	0,795	8

Table 4.69: Item-total correlation matrix for the resources and opportunities subscale

Inter-Item Correlation Matrix

	RO 1	RO 2	RO 3	RO 4	RO 5	RO 6	RO 7	RO 8
RO 1	1.000	0.305	0.310	0.148	0.181	0.220	0.287	0.313
RO 2	0.305	1.000	0.494	0.381	0.340	0.432	0.243	0.368
RO 3	0.310	0.494	1.000	0.330	0.470	0.449	0.153	0.247
RO 4	0.148	0.381	0.330	1.000	0.422	0.477	0.223	0.299
RO 5	0.181	0.340	0.470	0.422	1.000	0.513	0.235	0.356
RO 6	0.220	0.432	0.449	0.477	0.513	1.000	0.111	0.309
RO 7	0.287	0.243	0.153	0.223	0.235	0.111	1.000	0.508
RO 8	0.313	0.368	0.247	0.299	0.356	0.309	0.508	1.000

Table 4.70: Item-total statistics for the resources and opportunities subscale

Item-Total Statistics					
	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's alpha if Item Deleted
RO 1	25.13	24.551	0.372	0.191	0.793
RO 2	25.35	22.060	0.575	0.367	0.763
RO 3	25.50	22.159	0.556	0.387	0.766
RO 4	25.33	22.809	0.509	0.310	0.774
RO 5	25.35	21.952	0.568	0.391	0.764
RO 6	25.64	21.747	0.573	0.417	0.763
RO 7	24.49	25.088	0.364	0.298	0.794
RO 8	24.70	23.727	0.519	0.374	0.773

Table 4.71: Reliability analysis output for the resources and opportunities subscale

Scale Statistics			
Mean	Variance	Std. Deviation	N of Items
28.78	29.208	5.404	8

4.5 Dimensionality analysis

The section that follows is the report on the exploratory factor analysis (EFA) of the measurement instrument that was used in this research study, with the key purpose being to examine whether the subscales are uni-dimensional.

Dimensionality analysis is a statistical method that is used to remove items with inadequate loading factors, or to split heterogeneous subscales into two or more homogeneous subsets of items to confirm the uni-dimensionality of each subscale (Mahembe, 2010).

When conducting EFA, the number of factors to be extracted and the items to be included in each factor is determined by the following decision rules:

- According to Kaiser's (1961) criteria, the number of factors to be extracted should not be more than the number of eigenvalues > 1.00 .
- A Kaiser-Meyer-Olkin measure of sampling adequacy (KMO index) value closest to 1 indicates a pattern of correlations that are relatively compact and therefore analysis should present distinct and reliable factors (Field, 2005). KMO adequacy value and interpretation are depicted in Table 4.72.

Table 4.72: Kaiser's (as cited in Field, 2005) adequacy values of KMO

KMO adequacy value	Interpretation
< 0.5	Acceptable
0.5 – 0.7	Mediocre
0.7 – 0.8	Good
0.8 – 0.9	Great
> 0.9	Superb

4.5.1 Entrepreneurial intention

The entrepreneurial intention subscale achieved a Kaiser-Meyer-Olkin measure of sampling adequacy value of 0.918 and a Bartlett's Test of Sphericity value of 962.945 (df = 28, Sig. = 0.000). According to the KMO adequacy values, this subscale scores "Superb". These results indicate that factor analysis can be conducted. The rule of eigenvalues greater than 1 was the basis for the extraction of factors. The subscale was found to be uni-dimensional and the dominant factor accounts for approximately 59 percent of variance. The loadings for this subscale are all above 0.50, which indicates that the items are good items (Pallant, 2011).

Table 4.73: Factor matrix for the entrepreneurial intention subscale

Factor Matrix

Factor

EI 1	0.770
EI 2	0.539
EI 3	0.698
EI 4	0.734
EI 5	0.681
EI 6	0.833
EI 7	0.729
EI 8	0.814

4.5.2 Attitude towards entrepreneurship

The attitude towards entrepreneurship subscale achieved a Kaiser-Meyer-Olkin measure of sampling adequacy value of 0.889 and a Bartlett's Test of Sphericity value of 637.575 (df = 28, Sig. = 0.000). According to the KMO adequacy values, this subscale scores "Great". These results indicate that factor analysis can be conducted. The rule of eigenvalues greater than 1 was the basis for the extraction of factors. The subscale was found to be uni-dimensional and the dominant factor accounts for approximately 50 percent of variance. The loadings for this subscale are all above 0.50, which indicates that the items are good items (Pallant, 2011).

Table 4.74: Factor matrix for the attitude towards entrepreneurship subscale

Factor Matrix	
	Factor
ATE 1	0.546
ATE 2	0.603
ATE 3	0.577
ATE 4	0.737
ATE 5	0.660
ATE 6	0.705
ATE 7	0.704
ATE 9	0.659

4.5.3 Entrepreneurial leadership

The entrepreneurial leadership subscale achieved a Kaiser-Meyer-Olkin measure of sampling adequacy value of 0.717 and a Bartlett's Test of Sphericity value of 335.649 (df = 10, Sig. = 0.000). According to the KMO adequacy values, this subscale scores "Good". These results indicate that factor analysis can be conducted. The rule of eigenvalues greater than 1 was the basis for the extraction of factors. The subscale was found to be uni-dimensional and the dominant factor accounts for approximately 53 percent of variance. The loadings for this subscale are all above 0.50, with the exception of EL 2, which is marginally below 0.5. The results are shown in Table 4.75.

Table 4.75: Factor matrix for the entrepreneurial leadership subscale

Factor Matrix	
	Factor
EL 1	0.583
EL 2	0.358
EL 6	0.803
EL 7	0.759
EL 8	0.688

4.5.4 Role model

The role model subscale achieved a Kaiser-Meyer-Olkin measure of sampling adequacy value of 0.919 and a Bartlett's Test of Sphericity value of 1120.200 (df = 28, Sig. = 0.000). According to the KMO adequacy values, this subscale scores "Superb". These results indicate that factor analysis can be conducted. The rule of eigenvalues greater than 1 was the basis for the extraction of factors. The subscale was found to be uni-dimensional and the dominant factor accounts for approximately 62 percent of variance. The loadings for this subscale are all above 0.50, which indicates that the items are good items (Pallant, 2011).

Table 4.76: Factor matrix of the role model subscale

Factor Matrix	
	Factor
RM 1	0.747
RM 2	0.708
RM 3	0.796
RM 4	0.696
RM 5	0.803
RM 6	0.788
RM 7	0.720
RM 8	0.775

4.5.5 Resources and opportunities

The entrepreneurial intention subscale achieved a Kaiser-Meyer-Olkin measure of sampling adequacy value of 0.817 and a Bartlett's Test of Sphericity value of 372.510 (df = 15, Sig. = 0.000). According to the KMO adequacy values, this subscale scores "Great". These results indicate that factor analysis can be conducted. The rule of eigenvalues greater than 1 was the basis for the extraction of factors. The subscale was found to be uni-dimensional and the dominant factor accounts for approximately 50 percent of variance. The loadings for this subscale are all above 0.50, with the exception of item RO 8, which is marginally less than 0.5. The results are shown in Table 4.77.

Table 4.77: Factor matrix of the resources and opportunities subscale

Factor Matrix	
	Factor
RO 2	0.637
RO 3	0.644
RO 4	0.605
RO 5	0.680
RO 6	0.719
RO 8	0.480

4.6 Multiple regressions of the model

Multiple regressions are based on correlation, which allows for a more sophisticated exploration of the interrelationships among a set of variables (Pallant, 2011). Pallant (2011) adds that multiple regression will further inform one about the model as a whole (all subscales), as well as the contributors of the model (individual subscales), and will allow one to test whether a variable contributes to the predictive ability of the model.

The overall measure of the model starts with the totalling of each subscale item, which is followed by a regression analysis of the subscale totals. The resultant correlation between the dependent variable (TINENT) and the independent variables (TATITUDE, TLEADER, TROLE and TRESOURCE) is as follows:

- There is a “strong” correlation between TINENT and TATTITUDE, which is 0.737 (refer to Table 4.78).
- There is a “strong” correlation between INTENT and TLEADER, which is 0.506 (refer to Table 4.78).
- There is a “medium” correlation between INTENT and TROLE, which is 0.351 (refer to Table 4.78).
- There is a “medium” correlation between INTENT and TRESOURCE, which is 0.411 (refer to Table 4.78).



Table 4.78: Correlations of the totals of all the subscales used in the model

		Correlations				
		TINTENT	TATTITUDE	TLEADER	TROLE	TRESOURCE
TINTENT	Pearson Correlation	1	.737**	.506**	.351**	.411**
	Sig. (2-tailed)		0.000	0.000	0.000	0.000
	N	240	240	240	240	240
TATTITUDE	Pearson Correlation	.737**	1	.548**	.373**	.367**
	Sig. (2-tailed)	0.000		0.000	0.000	0.000
	N	240	240	240	240	240
TLEADER	Pearson Correlation	.506**	.548**	1	.268**	.463**
	Sig. (2-tailed)	0.000	0.000		0.000	0.000
	N	240	240	240	240	240
TROLE	Pearson Correlation	.351**	.373**	.268**	1	.232**
	Sig. (2-tailed)	0.000	0.000	0.000		0.000
	N	240	240	240	240	240
TRESOURCE	Pearson Correlation	.411**	.367**	.463**	.232**	1
	Sig. (2-tailed)	0.000	0.000	0.000	0.000	
	N	240	240	240	240	240

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

From the model summary we look at the R Square, which tells us how much variance in the dependent variable is explained by the model (Pallant, 2011). For this research the model explains 57.6% of the variance in TINTENT.

Table 4.79: Model summary

Model Summary

R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
				R Square Change	F Change	df1	df2	Sig. F Change
.759 ^a	0.576	0.569	4.170	0.576	79.747	4	235	0.000

a. Predictors: (Constant), TRESOURCE, TROLE, TATTITUDE, TLEADER

To ascertain the statistical significance of the result, it is necessary to look at the table labelled ANOVA (Table 4.80) which tests the NULL hypothesis that multiple R in the population equals 0. In this research it reaches statistical significance (Sig. = .000 the really means $p < 0.0005$).

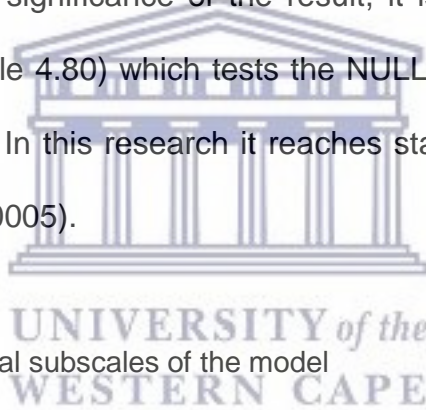


Table 4.80: ANOVA for the total subscales of the model

ANOVA^a

	Sum of Squares	Df	Mean Square	F	Sig.
Regression	5547.508	4	1386.877	79.747	.000 ^b
Residual	4086.892	235	17.391		
Total	9634.400	239			

a. Dependent Variable: TINTENT

b. Predictors: (Constant), TRESOURCE, TROLE, TATTITUDE, TLEADER

To find which variables included in the model contribute to the predictive ability of the dependent variable, we need to understand the Coefficients table. In the Coefficients table there are two values that are important to pick up on problems with multicollinearity that are evident in a mixed correlation, namely Tolerance and

Variance Inflation Factor (VIF). According to Pallant (2011) if the tolerance value is less than .10 it indicates that the correlation with other variables is high and VIF values are above 10 respectively, suggesting the possibility of multicollinearity. In this research study, Tolerance ranges between 0.619 and 0.848, which is above the recommended .10, while VIF ranges between 1.179 and 1.617, which is below the 10 threshold. This confirms that there is no multicollinearity in this model.

The Standardised Beta for TATTITUDE is 0.615 with the Sig. = .000, which is the strongest unique contribution to explaining the dependent variable that is a statistically significant and unique contribution to the equation. The Standardised Beta for TRESOURCE is 0.128 with the Sig. = 0.009 (less than 0.05), making it statistically significant. Both TATTITUDE and TRESOURCE are unique predictions of the dependant variable. See Table 4.81 below.

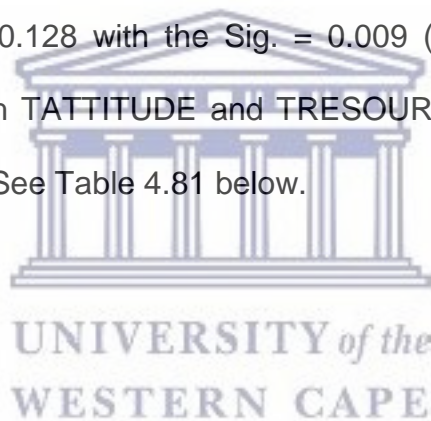


Table 4.81: Coefficients of the subscale totals for the model

Coefficients^a

Model	Unstandardised Coefficients		Standardised Coefficients	t	Sig.	Correlations			Collinearity Statistics	
	B	Std. Error	Beta			Zero-order	Partial	Part	Tolerance	VIF
(Constant)	-1.103	1.965		-0.561	0.575					
1 TATTITUDE	0.756	0.066	0.615	11.526	0.000	0.737	0.601	0.490	0.634	1.576
TLEADER	0.168	0.099	0.092	1.702	0.090	0.506	0.110	0.072	0.619	1.617
TROLE	0.061	0.042	0.067	1.457	0.147	0.351	0.095	0.062	0.848	1.179
TRESOURCE	0.177	0.068	0.128	2.621	0.009	0.411	0.169	0.111	0.761	1.314

a. Dependent Variable: TINTENT

4.7 Parameter estimates (hypothesis testing)

Structural models are evaluated to establish whether the theoretical relationships stated at the conceptual stage are validated by the empirical data. At this stage there is a focus on the relationships between independent and dependent variables. The process of evaluating the structural model involves an in-depth analysis of the freed elements of gamma (γ) and beta (β) matrices. Firstly, it is important to evaluate the signs of parameters signifying the paths between the latent variables, as determined by the degree of consistency with the nature of casual hypothesis to exist between the latent variables. Secondly, it is important to ascertain that the parameter estimates are significant ($p < 0.05$) as indicated by t-values > 1.96 (Diamantopoulos and Siguaw, 2000).

Hypothesis one: Attitude towards entrepreneurship positively influences entrepreneurial intention

There is a strong significant positive relationship that exists between attitude towards entrepreneurship and entrepreneurial intention ($t = 11.526$, Sig. = 0.000). This finding suggests that the proposed relationship is supported.

Hypothesis two: Entrepreneurial leadership of the student positively influences entrepreneurial intention

The t-value of the link between entrepreneurial leaders and entrepreneurial intention is less than 1.96 ($t = .702$, Sig. = 0.09), which suggests that there is a weak effect of entrepreneurial leaders on entrepreneurial intention and it is statistically non-significant.

Hypothesis three: Role models (lecturers) have a positive influence on entrepreneurial intention

The t-value of the link between role models and entrepreneurial intention is less than 1.96 ($t = 1.457$, Sig. = 0.147), which suggests that there is a weak effect of role models on entrepreneurial intention and it is statistically insignificant.

Hypothesis four: Resources and opportunities within commerce faculties have a positive influence on entrepreneurial intention

There is a link between resources and opportunities and entrepreneurial intention ($t = 2.621$, Sig. = 0.009). The t-value is greater than 1.96 and it is statistically significant as $p < 0.05$. This finding suggests that the proposed relationship is supported.

Hypothesis five: Higher education institutions can influence entrepreneurial intention of students which can ultimately serve as a pipeline of entrepreneurs to the economy.

Based on the results that are presented above, higher education institutions can influence the entrepreneurial intention of students, and higher education institutions can serve as a pipeline for entrepreneurs in the country.

4.8 Summary

The purpose of this chapter was to present the results of the statistical analysis that was conducted on the data collected from students at the various higher education institutions. The statistical analysis was done using a statistical package, namely SPSS (version 24). Item and dimensional analyses were performed on the data to identify and remove poor items. The overall measurement model was tested by means of regression analysis of the totals of all subscales to determine which subscales uniquely predicted the dependant variable. This also indicated a positive and significant relationship between all the latent variables, with the exception of the relationship between entrepreneurial leadership and entrepreneurial intention and role models and entrepreneurial intention, which resulted in statistically non-significant relationships.

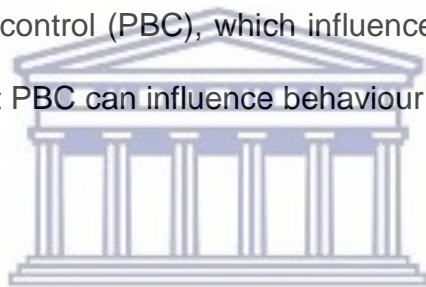


Chapter 5

5. A proposed model for developing entrepreneurial intention at higher education institutions

5.1 Introduction

The model used in this research study was adapted from the Theory of Planned Behaviour, designed and developed by Icek Ajzen in 1991, as mentioned in Chapter 3. Ajzen's model has three cognitive factors, namely attitude towards behaviour, SN and perceived behavioural control (PBC), which influence intention. However, in his model, Ajzen considers that PBC can influence behaviour directly as well (see Figure 1.3).



The cognitive factors that are used in the adapted model, for purposes of this study, are attitude towards entrepreneurship (ATE), entrepreneurial leadership (EL), role models (RM) and resources and opportunities (RO) and the influence they have on entrepreneurial intention (EI). Role models (RM) and entrepreneurial leadership (EL) are subjective norms (SN), which means they are influenced by those who are important to the respondent. ATE, RM and EL influence EI directly, and the entrepreneurial action or behaviour indirectly, whereas RO can directly influence behaviour. However, in the case of this study, it is understood to influence EI first.

In this chapter the researcher documents all the elements that have led to the choice of the cognitive factors from a literature review point of view; then consider the

questions that were opposed by the respondents (where the percentage that disagreed were greater than 20%), and consider possible mitigating factors for the results. The chapter concludes with an evaluation of the model in its entirety and the practicality of the model and gives recommendations for future use of the model.

5.2 Entrepreneurial intention

In this research study, EI is a dependent factor, as it is influenced by the four cognitive factors that have been introduced and discussed in previous chapters and in this chapter.

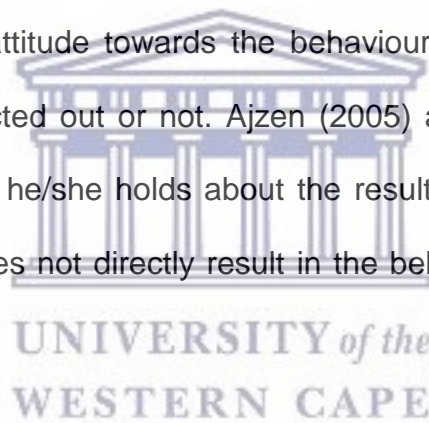
There are various definitions of intention; however, a few were identified as pertinent to this research study. Intention is the cognitive process that precedes the action. The intention to act will ultimately lead to the action or behaviour. It is vital that the cognitive factors influence the intention, otherwise the cognitive factors will be obsolete as they would not influence intention and would lose the indirect effect on behaviour.

Bird (1988) defines (entrepreneurial) intention as the state of mind that focuses a person's attention, experience and action on a specific behaviour or object. Ajzen (1991) defines entrepreneurial intention as the quest for information that will assist in the formation of a new venture. Gelderen *et al.* (2008) argue that intention towards a particular behaviour is a key factor that ultimately determines what a person has already intended to perform.

The results obtained from the survey show that an average of 79.2% of the respondents selected “strongly agree” and “agree” in response to the statements pertaining to EI. The reliability of this subscale was “good” according to Nunnally’s (1967) guidelines, as the Cronbach’s alpha was 0.897. This indicated that the measurement of the students’ intention was of a high degree and would allow for real influence by the cognitive factors, which will be examined later.

5.3 Attitude towards entrepreneurship

It was critical in this study to measure the students’ attitude towards entrepreneurship, as the attitude towards the behaviour would determine whether the behaviour would be acted out or not. Ajzen (2005) argues that attitude comes from a person’s belief that he/she holds about the results of a particular behaviour and suggests that ATB does not directly result in the behaviour; however, it results indirectly through intention.



As a result of research, ATB has emerged as a significant and among the most influential constructs of TPB (Harris and Gibson, 2008; Liñán and Chen, 2006; Watchravesringkan *et al.*, 2013). Schwarz *et al.* (2009) found that students’ attitude towards entrepreneurship influenced the EI of those students to start a business.

The results of the survey that was conducted show that an average of 76.3% of the respondents selected “agree” or “strongly agree” in response to the statements that were presented to them regarding their attitude towards entrepreneurship. It can therefore be said that the respondents had a positive attitude towards

entrepreneurship, with 90% selecting “strongly agree” and “agree” in response to statement ATE 1 that entrepreneurship is the way of the future for the economy of the country. This highlights not only the interest in the economy as a whole, but also the opportunity that has been identified by students to start their own businesses in the future. The literature has also revealed that attitude towards entrepreneurship is influenced by entrepreneurship education (Fayolle *et al.* 2006).

5.4 Entrepreneurial leadership

Entrepreneurial leadership is part of the theoretical model as a subjective norm which measures the impact of significant others’ opinions on the respondents. Renko *et al.* (2015) define entrepreneurial leadership as an entrepreneur directing the performance of group members to an organisational goal by identifying an opportunity in the market and exploiting the opportunity. This particular characteristic is key to future entrepreneurs, as these entrepreneurs will have to be the source of economic sustainability – from directing the performance of those working for them in their business, to identifying opportunities in the market and, more importantly, exploiting the opportunities for the gain of the organisation by fulfilling its goal.

Entrepreneurial leaders act as role models for their followers by directing, influencing and motivating their followers (Kuratko, Ireland and Hornsby, 2001; McGrath and McMillan, 2000). Role models are discussed in the next section. These entrepreneurial leaders will therefore be the role models of other future entrepreneurs who will create and advance the entrepreneurial culture to reach all

levels of society. This in turn will grow entrepreneurship, and entrepreneurs will become the cornerstone of the economy as intended.

In this section of the questionnaire an average of 73.4% of the respondents selected “strongly agree” and “agree” in response to the statements made. However, 22.1% and 25% of respondents disagreed with statements EL1 and EL2 respectively. Statement EL1 was: “Most people who are important to me think that I should become an entrepreneur”. Statement EL2 was: “It is expected of me to become an entrepreneur, based on the subject matter that I am covering”. The concern is that, based on the responses to statement EL1, entrepreneurship is not a career of choice for 22.1% of the respondents. The fact that 25% of the respondents selected “disagree” in response to statement EL2 can be interpreted as meaning that the respondents did not see the subject matter as being relevant to what they consider to be entrepreneurship material, or the subject matter was not made relevant to the current market climate. The researcher can only make this assumption, as there were no clarifying questions to further understand the responses and it can therefore not be stated as fact.

The Cronbach’s alpha for the subscale was 0.824, which is “good” according to Nunnally’s (1967) guidelines. As mentioned earlier, the majority of the respondents selected “agree” and “strongly agree” in response to the statements in this subscale, which indicates that the respondents saw themselves as entrepreneurial leaders based on the influence of others around them.

5.5 Role models

Role models, similar to entrepreneurial leadership, form part of the theoretical model as a subjective norm, which measures the impact of important others' opinions on the respondents.

In this section the role models are the lecturers who facilitate the entrepreneurship modules at the various universities. Lecturers can be role models, as Davidsson and Honig (2003) iterate that a role model may serve as a substitute for tacit knowledge and that tacit knowledge is best transferred via face-to-face interactions and frequent contacts. Lecturers meet students face-to-face and frequently in the lecture venues. Through the myriad of role model definitions, a commonality exists that role models are individuals to whom one can look up to, who inspires and motivates you to make certain decisions and thereby achieve certain goals (Basow and Howe, 1980; Shapiro *et al.*, 1978; Wright *et al.*, 1997). The term was first coined by Robert K. Merton in 1957 (Merten, 1957). Morgenroth (2015) defines role models as those who influence others' performance and motivation, and by acting as a behavioural model and representing what is possible.

The lecturers within entrepreneurship education need to serve as role models for students who do not necessarily have entrepreneurship role models in their personal lives to motivate and encourage them and whom they can follow as an example. As mentioned in the previous section, role models will advance entrepreneurship and thereby grow more role models.

In the survey that was conducted, this subscale saw an average of 62.8% of the respondents selecting “strongly agree” and “agree” in response to the statements. However, in the case of three of the statements, more than 20% of the respondents selected “disagree” in response, namely statements RM1, RM2 and RM3.

Statement RM1 was: “I would have complete control over the situation if I start and run my own business.” A total of 22.1% of the respondents selected “disagree” in response to this statement, the implication being that some students were not yet confident enough to start and run their own business; however, with a role model who could be an example to the respondents would demonstrate that it is possible for them to start their own businesses. Statement RM2 was: “My entrepreneurship lecturer is my role model in becoming an entrepreneur.” More than 30% of the respondents disagreed with this statement. This shows that there were respondents who possibly had entrepreneurship role models outside of the institution and that the lecturer was not seen as a primary role model. Statement RM3 was: “My entrepreneurship lecturer motivates me to become an entrepreneur.” More than 20% of the respondents selected “disagree” in response to this statement, which implies that the lecturers were not fulfilling the role of motivating students to become entrepreneurs. Hence it could infer that lecturers need to allow their own experience as entrepreneurs to assist students if they have any entrepreneurial experience. Coupled with the results of RM2, this could also serve as a reason why lecturers were not seen as role models by more than 30% of the respondents.

The Cronbach’s alpha for the subscale is 0.912, which is “excellent” according to Nunnally’s (1967) guidelines. As mentioned earlier, more than 60% of the

respondents selected “agree” and “strongly agree” in response to the statements in this subscale, which indicates that those students saw their lecturers as role models.

5.6 Resources and opportunities

Resources and opportunities in this research study are a perceived behavioural control (PBC) in the theoretical framework. Trivedi (2016) explains that PBC reflects the belief pertaining to the access to resources and opportunities needed to perform a behaviour, which includes internal and external factors that might impede the performance of said behaviour.

The university ecosystem has a greater impact on EI than personality traits or socio-economic factors, according to Luthje and Franke (2004). The importance of resources and opportunities at universities is vital to the development of the EI of students.



The inclusion of this factor is vital to this study, as students need to develop their PBC, which could influence behaviour directly rather than influencing intention first (see Figure 1.3). Therefore, the resources and opportunities made available to the students should be of a high quality, as they would affect the EI of the student to a large extent.

In this subscale an average of 62.9% of the respondents selected “strongly agree” and “agree” in response to the statements. More than 20% of the respondents disagreed with statements RO2 - RO6. Statement RO2 was: “I know all about the

necessary practical details needed to start my own business.” A total of 26.7% of the respondents did not have the necessary details to start their own business, which indicates that these students will not timeously obtain the relevant information or enter the job market, and the economy will lose a potential entrepreneur. Statement RO3 was: “If I wanted to, I could easily start and run my own business.” A total of 27.9% of the respondents selected “disagree” in response to this statement, which speaks to their level of self-confidence to start their own business. Statement RO4 was: “I know all about the various ways of obtaining financial support to start my own business.” A total of 23.8% of the respondents were not aware that financial support exists to start their own business. Statement RO5 was: “I know that I have the necessary networks and support to start my own business.” A total of 22.1% of the respondents selected “disagree” in response to this statement. Statement RO6 was: “I know that I will receive the necessary funds to start my own business.” A total of 25.8% of the respondents selected “disagree” in response to this statement. Even though 62.9% of the respondents selected “strongly agree” and “agree” in response to the statements, on average just over a quarter (25.3%) of the respondents disagreed with the statements mentioned above. This result could indicate a lack in universities’ efforts to play the role of creating the resources and opportunities for students. Universities have not transitioned into the era of entrepreneurial universities that would fully support entrepreneurial activity, for example business start-up as a criterion to graduate.

Entrepreneurship resources and opportunities at universities are vital to the development of EI, which accordingly can affect entrepreneurial behaviour directly.

5.7 Model summary

The model developed for this research study has shown to have a variance of 57.6% (see Table 4.79) which means that the model explains 57.6% of the EI of the students that participated. The study that was conducted by Gird and Bagraim in 2008, as previously mentioned, used a TPB model which explained 27% variance of students' EI; however, the cognitive factors that were used were different to this particular study. It needs to be mentioned again that EI is the dependant variable while the other cognitive factors are the independent variables. The ANOVA (Table 4.80) for this model shows that the model has proven to be significant, with attitude towards entrepreneurship being the highest predictor of EI, followed by resources and opportunities as the next highest predictor of EI. This is followed by entrepreneurial leaders and role models as the two cognitive factors that are not significant predictors of EI. There are other researchers who determined that perceived SN is not a strong influencer of EI (Conner and Armitage, 1998; Kolvereid and Isaksen, 2006; Krueger *et al.*, 2000).

The model developed for purposes of this study has proven to be sound and the results can be used to make enhancements within entrepreneurship education presented at the commerce faculties of universities.

Attitude towards entrepreneurship can be influenced by various factors and in the case of this research study, attitude towards entrepreneurship was influenced by role models, opportunities and resources at universities, and the level of entrepreneurial leadership displayed by the students. As mentioned earlier, attitude towards

behaviour has emerged as a significant and among the most influential constructs of TPB (Harris and Gibson, 2008; Liñón and Chen, 2006; Watchravesringkan *et al.*, 2013), and in the case of this research study attitude towards entrepreneurship has been shown to be the most influential construct of the Theory of Planned Behaviour. It is therefore important that HEIs focus on influencing the attitude of students towards entrepreneurship. Role models, in the form of lecturers, encountered at HEIs will also contribute towards the attitude students have towards entrepreneurship, be it a positive or negative effect, as a result of the encounter. Therefore, lecturers, coupled with experience, need to be entrepreneurs themselves. This research study reveals that all the cognitive factors that were used influenced the EI of the students. Commerce faculties are unveiled to be the hidden pipeline for entrepreneurs, as the impact of entrepreneurial education influences EI.



Diagrammatical representation of the model used in this study

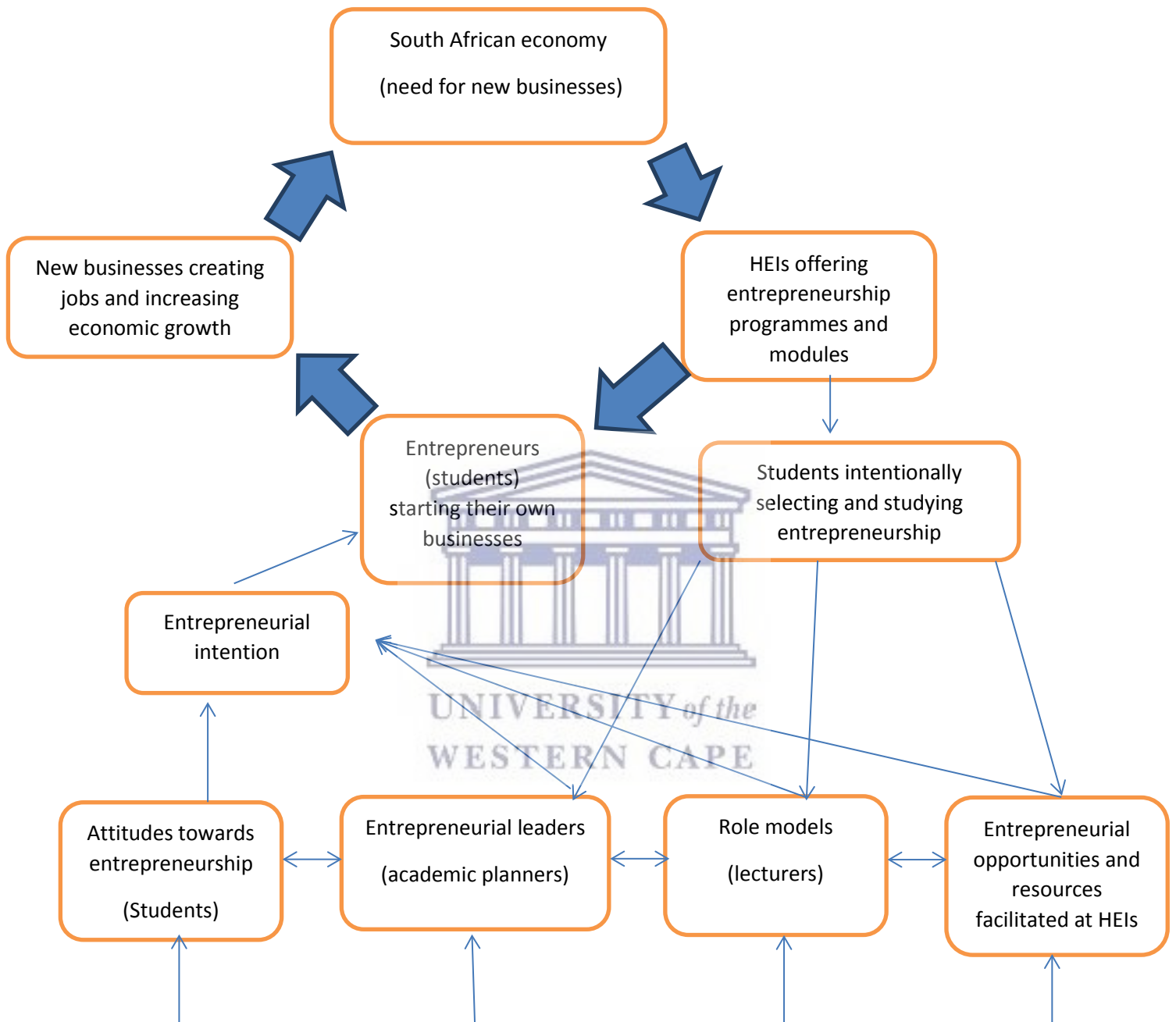


Figure 5 1: Proposed model used in this study

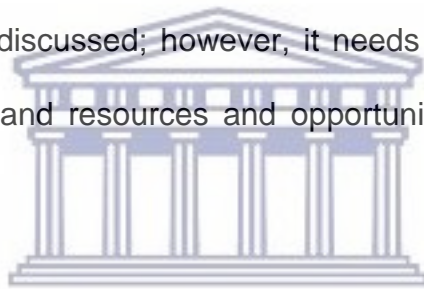
The model above has been developed from the basic model used in the Theory of Planned Behaviour and has been modified for the purpose of this study based on the literature that has been presented. As far as the researcher knows the model has not

been used previously as the seminal author and designer of the model has left it to researchers to adjust the model according to the researcher's need and study.

5.8 Summary

The model used in this research study proved to be suitable for use in the prediction of the EI of students. In the course of model development and data analysis, a few unanticipated outcomes came to light; however, these were considered to be outside the scope of this study.

Each cognitive factor was discussed; however, it needs to be iterated that attitude towards entrepreneurship, and resources and opportunities, were found to be the greatest predictors of EI.



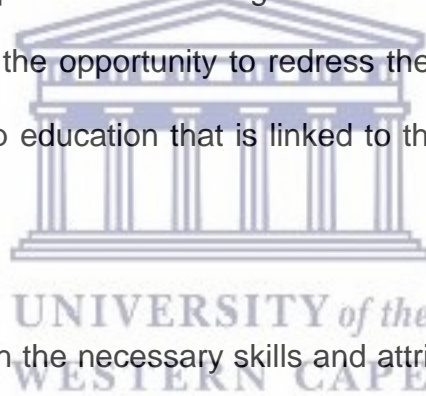
The next chapter documents the possible future research that was highlighted from this process, the implications resulting from the research study, the contributions of the study, and the limitations experienced.

Chapter 6

6 Conclusion

6.1 Introduction

Entrepreneurship has been identified as the solution to poverty alleviation and a contributor towards economic growth, and the dire need for entrepreneurs in South Africa has been established in the literature, government policy and strategies to assist growth in this area. The injustices of the past and the effects of the injustices that are currently being experienced are of great concern; therefore, as a country, South Africa has to create the opportunity to redress these inequalities through the offering of entrepreneurship education that is linked to the needs of the market and the economy as a whole.



To equip entrepreneurs with the necessary skills and attributes to be successful, the focus needs to be shifted to entrepreneurship education. Entrepreneurship education is determined by those who decide on the various offerings of the higher education institutions. Universities are needed to develop entrepreneurs for the future, who can sustain businesses and negotiate the changes that are occurring in the markets. Universities can also be used to inculcate an entrepreneurial culture and increase entrepreneurial intention (EI), and lecturers can be entrepreneurial role models for students. To obtain this level of entrepreneurial culture within universities, the university requires entrepreneurial leaders in commerce faculties that will identify and exploit various opportunities, specifically learning opportunities that will develop and graduate a higher quality of entrepreneur who will be tenacious and

subsequently sustainable in the market. Timmons and Spinelli (2004) state that it is clear from the available literature on education that entrepreneurship is critical due to its contribution to job creation and assistance in reducing poverty.

The Theory of Planned Behaviour (TPB) was adapted and used in this study to determine the EI of final-year students doing entrepreneurship degrees/diplomas or completing three or more entrepreneurship modules in a commerce degree. The model was modified for purposes of this study, which considers various cognitive factors that impact on EI. These cognitive factors are: attitude towards entrepreneurship, role models, entrepreneurial leadership, and opportunities and resources within commerce faculties that impact on EI.

A questionnaire was designed and developed to test the impact of the four cognitive factors on EI. Following the development and design of the questionnaire, it was tested on a sample population for purposes of validity and reliability.

After the data was collected and collated, statistical analysis was done using a statistical package, namely SPSS (version 24). Item and dimensional analysis was performed on the data to identify and remove statistically “poor” items. The overall measurement model was tested by means of regression analysis of the totals of all subscales to determine which subscales uniquely predicted the dependent variable. It also indicated a positive and significant relationship between all the latent variables, with the exception of the relationship between entrepreneurial leadership and EI, and role models and EI, which resulted in statistically non-significant relationships.

The model used in this research study has proven to be a sound tool in the prediction of the EI of students. In the course of model development and data analysis, a few unanticipated outcomes came to light, but these were considered to be outside the scope of this study.

6.2 Discussion

The study revealed that commerce faculties within universities, as a context in which entrepreneurship education takes place and EI is developed, can be seen as the hidden pipeline for entrepreneurs. As mentioned, the study examined the influence of four cognitive factors that have an impact on the EI, as extensively discussed in the previous chapter.

6.3 Contribution of this study

One of the most important factors, as proven in previous studies, is the attitude towards entrepreneurship, as it is the biggest contributor towards or influencer of EI. Another important contribution that this study makes is that commerce faculties within universities play a pivotal role in the education of future entrepreneurs, which will ultimately impact the EI of the students and ultimately lead to entrepreneurial behaviour. This is supported in the literature, as EI leads to entrepreneurial behaviour, according to Ajzen (1991). It is therefore critical to the development of EI and ultimately entrepreneurial behaviour that commerce faculties need to make the university environment conducive to the development of entrepreneurs. Lecturers who facilitate entrepreneurship programmes should have some entrepreneurial

experience so that they can act as role models for students, as shown in the course of this study.

6.4 Implications

The findings of this study may have theoretical and practical implications for the development of the EI of students.

6.4.1 Theoretical implications

The literature has supported the use of the TPB to determine the EI (for example, Bird, 1988; Davidsson, 1995; Gelderen *et al.*, 2008; Kolvereid, 1997; Krueger, 1993; Krueger and Carsrud, 1993; Shapero and Sokol, 1982).

The literature has also proven that attitude towards entrepreneurship influences entrepreneurial intention and entrepreneurial behaviour (Ajzen, 2005; Ajzen and Fishbein, 2005; Schwarz *et al.*, 2009).

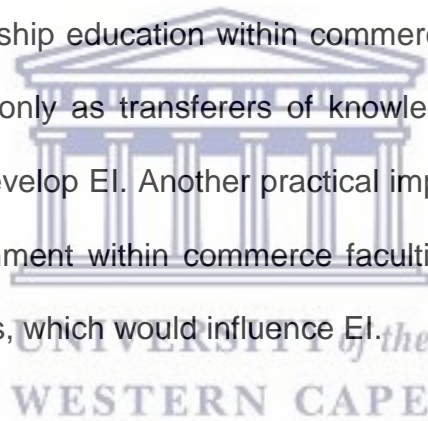
The researcher selected entrepreneurial leadership as a cognitive factor in the adapted model, as students need to exercise entrepreneurial leadership characteristics as defined by Shane and Venkataraman (2000) and Renko *et al.* (2015).

The literature has validated the use of role models as an influencer of entrepreneurs (Bosman *et al.*, 2012); therefore the researcher decided on role models as a cognitive factor.

Kraaijenbrink *et al.* (2010) and Luthje and Franke (2004) confirmed in the literature the importance of the university's entrepreneurship ecosystem and its impact on EI.

6.4.2 Practical implications

The practical implications, as mentioned previously in this study, should direct custodians of entrepreneurship education within commerce faculties to consider the influence of lecturers, not only as transferers of knowledge but as role models to students who will further develop EI. Another practical implication would be to enrich the entrepreneurial environment within commerce faculties by means of increased resources and opportunities, which would influence EI.



6.4.3 Limitations and future research


The research study conducted is not without limitations. Firstly, the study was only conducted within the commerce faculties of the four public universities within the Western Cape. There are currently 26 public universities listed in South Africa.

Secondly, as this study measures a snapshot of EI, the researcher was not able to establish the longitudinal effects that would determine the entrepreneurial action of the students that participated in the research study.

Finally, the study was done under the constant threat of the “fees must fall” campaign, which affected the number of participating students, since many did not attend classes during this time period.

Future studies are needed to understand the effect of cognitive factors, as in this study, on entrepreneurial action rather than EI. Future studies can also understand the impact of the academic planner, in their choice of entrepreneurship material, on EI. Another matter to be considered for future study would be the impact that schools or universities can have on the attitude towards entrepreneurship and the impact of entrepreneurship education on the attitude towards entrepreneurship.

6.4.4 Concluding remarks



The contributions of this study are substantive for the custodians of entrepreneurship education within commerce faculties at universities. Investigating the four cognitive factors that influence EI is important to the further development of entrepreneurship education, the facilitation of entrepreneurship education, and the enhancement of the entrepreneurial environment within commerce faculties. Thus, commerce faculties will be the pipeline of entrepreneurs for the country's economy.

Bibliography

Adcroft, A.; Dhaliwal, S. and Willis, R. 2005. Insatiable demand or academic supply: The intellectual context of entrepreneurship education. *European Business Review*, 17(6): 518-531.

Akerlof, G.A. and Kranton, R.E. 2000. Economics and identity. *Quarterly Journal of Economics*, 115(3): 715-753.

Almus, M. and Nerlinger, E.A. 1999. The growth of new technology-based firms: Which factors matters? *Small Business Economics*, 13: 141-154.

Amra, R.; Hlatshwayo, A. and McMillan, L. 2013, *SMME employment in South Africa*, Paper to be presented at the biennial conference of the Economic Society of South Africa, Bloemfontein, 25 - 27 September 2013.

Anastasi, A. and Urbina, A. 1997. *Psychological testing*. Upper Saddle River, NJ: Prentice-Hall.

Anderson, A. and Jack, S. 2008. Entrepreneurial education within the enterprise culture. *International Journal of Entrepreneurial Behaviour and Research*, 5(3): 110-125.

Antonakis, J.; Cianciolo, A.T. and Sternberg, R.J. (Eds.). 2004. Leadership: Past, present, and future In: D.V. Day and J. Antonakis (Eds.). *The nature of leadership*. Thousand Oaks, CA: Sage.

Antonakis, J.B.J. and Autio, E. 2006. Entrepreneurship and leadership in the psychology of entrepreneurship. In: J.R.Baum, M. Frese and R. Batton (Eds.) *The psychology of entrepreneurship*. London: Routledge, pp.189-208.

Antonites, A.J. and Van Vuuren, J.J. 2004. *An action learning approach to entrepreneurial creativity, innovation and opportunity finding*. Paper presented at the

14th Annual International Entrepreneurship Conference, Naples, Italy, 5 - 7 July 2004.

Arenius, P. and De Clerq, D. 2005. A network-based approach on opportunity recognition. *Small Business Economics*, 24: 249-265.

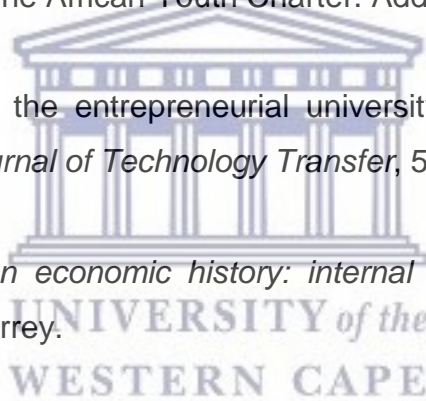
Arenius, P. and Kovalainen, A. 2006. Similarities and differences across the factors associated with women's self-employment preference in Nordic countries. *International Small Business Journal*, 24(1): 31-59.

Armitage, C.J. and Conner, M. 2001. Efficacy of the theory of planned behaviour: A meta-analytical review. *British Journal of Social Psychology*, 40: 471-499.

AU (African Union). 2006. The African Youth Charter. Addis Ababa: African Union.

Audretsch, D. 2012. From the entrepreneurial university to the university for the entrepreneurial society. *Journal of Technology Transfer*, 50(5): 313-321.

Austen R. A. 1987. *African economic history: internal development and external dependency*. London: J. Currey.



Autio, E.; Keeley, R.H.; Klofsten, M. and Ulfstedt, T. 1997. Entrepreneurial intent among students in Scandinavia and in the USA. *Enterprise and Innovation Management Studies*, 2(2): 145-160.

Autio, E.; Keeley, R.H.; Klofsten, M.; Parker, G.G.C. and Hay, M. 2001. Entrepreneurship intent among students in Scandinavia and in the USA. *Enterprise and Innovation Management Studies*, 2(2): 145-160.

Avolio, B.J. 1999. *Full leadership development: Building the vital forces in organisations*. Thousand Oaks, CA: Sage.

Ajzen, I. 1988. *Attitudes, personality, and behavior*. Chicago: Dorsey Press.

Ajzen, I. 1991. The theory of planned behaviour. *Organisational Behaviour and Human Decision Processes*, 50: 179-211.

Ajzen, I. 2000. Attitudes and the attitude-behaviour relation: Reasoned and automatic processes. *European Review of Social Psychology*, 11(1): 1-33.

Ajzen, I. 2002. *Construction of TpB questionnaire: Conceptual and methodological consideration*. September 2002. [Online]. Available at: http://chuang.epage.au.edu.tw/ezfiles/168/1168/attach/20/pta_41176_7688352_57138.pdf [Accessed: 13 June 2017].

Ajzen, I. 2005. *Attitudes, personality, and behaviour*. London: McGraw-Hill Education.

Ajzen, I. and Fishbein, M. 1980. *Understanding attitudes and predicting social behaviour*. Englewood Cliffs, NJ: Prentice-Hall.

Ajzen, I. and Fishbein, M. 2005. The influence of attitude on behaviour. In: D. Albarracín, B.T. Johnson, and M.P. Zanna (Eds.). *The handbook of attitudes*. Mahwah, NJ: Erlbaum, pp. 173-221.

Babbie, E. and Mouton, J. 2001. *The practice of social research*. Cape Town: Oxford University Press.

Bagheri, A. and Pihie, Z. 2010. Entrepreneurial leadership learning: In search for missing links. *Procedia*, 7(c): 470-479.

Bagozzi, R.P. and Kimmel, S.K. 1995. A comparison of leading theories for the prediction of goal-directed behaviours. *British Journal of Social Psychology*, 34: 437-461.

Bagozzi, R.P. 1992. The self-regulation of attitudes, intentions, and behaviour. *Social Psychology Quarterly*, 55: 178-204.

Bandura, A. 1977. *Social learning theory*. Englewood Cliffs, NJ: Prentice-Hall.

Bandura, A. 1986. *Social foundations of thought and action*. Englewood Cliffs: Prentice Hall.

Bandura, A. 1997. *Self-efficacy: The exercise of control*. New York, NY: Freeman and Co.

Bank, L. 1994. Between traders and tribalists: Implosion and the politics of disjuncture in a South African homeland. *African Affairs*, 93(370): 75-98.

Baruch, Y. 2004. *Managing careers*. Harlow, UK: Pearson.

Basow, S. and Howe, K. 1980. Role-model influence: Effects of sex and sex-role attitude in college students. *Psychology of Women Quarterly*, 4: 558-572.

Bass, B.M. 1985. *Leadership and performance beyond expectation*. New York, NY: Free Press.

Bass, B.M. 1990. *Bass and Stogdill's handbook of leadership*. New York, NY: Free Press.

Bass B.M. 1995 Theory of transformational leadership redux. *The Leadership Quarterly*, 6(4): 463-478.

Bass, B.M. 1997. Concepts in leadership. In: R.P. Vecchio (Ed.). *Leadership*. Notre Dame, IN: University of Notre Dame Press.

Bass, B.M. 1998. The ethics of transformational leadership. In: J.B. Ciulla (Ed.). *Ethics: The heart of leadership*. Westport, CT: Praeger, pp. 169-192.

Bass, B.M. and Avolio, B.J. 1990. The implications of transactional and transformational leadership for individual, team and organisation development. *Research in Organisational Change and Development*, 4: 231-272.

Bass, B.M. and Steidlmeier, P. 1999. Ethics, character and authentic transformational leadership. *Leadership Quarterly*, 10: 181-227.

Baum, J.R.; Locke, E.A. and Kirkpatrick, S.A. 1998. A longitudinal study of the relation of vision and vision communication to venture growth in entrepreneurial firms. *Journal of Applied Psychology*, 83(1): 43-54.

Bennis, W.G. 1959. Leadership theory and administrative behaviour: The problems of authority. *Administrative Science Quarterly*, 4: 259-301.

Bhorat, H.; Hirsch, A.; Kanbur, R. and Ncube, M. 2013. Economic policy in South Africa: Past, present and future. Cape Town: Oxford University Press.

Bird, B. 1988. Implementing entrepreneurial ideas: The case of intention. *Academy of Management Review*, 13: 442-453.

BLS (Bureau of Labour Statistics). 2013. *Monthly labour review. High-employment-growth firms: Defining and counting them. 29 June 2013.* [Online]. Available at: <https://www.bls.gov/opub/mlr/2013/> [Accessed: 20 September 2016].

Bosma, N.; Acs, Z.J.; Autio, E.; Condras, A. and Levine, J. 2008. *2008 Global Entrepreneurship Monitor Executive Report.* Babson Park, MA: Babson College.

Bosman, N.; Hessels, J.; Schutjens, V.; Van Praag, M. and Verheul, I. 2012. Entrepreneurship and role models. *Journal of Economic Psychology*, 33: 410-424.

Boudewyns, V. 2013. *A meta-analytical test of perceived behavioural control in the theory of planned behaviour.* Doctoral dissertation. Graduate School of the University of Maryland, College Park, USA.

Brace, I. 2004. Questionnaire design: How to plan, structure and write survey material for effective market research, Vol. 1. *Market Research in Practice.* London: Kogan Page Ltd.

Brockhaus, R.H. 1982. The psychology of an entrepreneur. *In*: C.A. Kent, D.L. Sexton and K.H. Vesper (Eds.) *Encyclopaedia entrepreneurship*. Englewood Cliffs, NJ: Prentice-Hall.

Bryant, T.A. 2004. Entrepreneurship. *In*: G.R. Goethals, G.J. Sorensen and J.M. Burns (Eds.). *Encyclopedia of leadership*, 1: 442-448. Thousand Oaks, CA: Sage.

Bundy, C 1979. *The rise and fall of the South African peasantry*. London: Heinemann.

Burnes, B. 2004. *Managing change*. Essex: Pearson Education Ltd.

Burns, J.M., 1978. *Leadership*. New York, NY: Harper and Row.

Busenitz, L.W. and Barney, J.B. 1997. Differences between entrepreneurs and managers in large organizations: Biases and heuristics in strategic decision making. *Journal of Business Venturing*, 12(1): 9-30.

Chell, E. and Allman, K. 2003. Mapping the motivations and intentions of technology oriented entrepreneurs. *RandD Management*, 33(2): 117-134.

Chen, C.A.; Greene, P.G. and Crick, A. 1998. Does entrepreneurial efficacy distinguish entrepreneurs from managers? *Journal of Business Venturing*, 13(4): 295-316.

Choi, Y.R. and Shepherd, D.A. 2004. Entrepreneurs' decisions to exploit opportunities. *Journal of Management*, 30(3): 377-395.

Cloete, N. and Bunting, I. 2000. *Higher education transformation: Assessing performance in South Africa*. Pretoria: Centre for Higher Education Transformation.

Co, M.J. and Mitchell, B. 2006. Entrepreneurship education in South Africa: A nationwide survey. *Education and Training*, 48(5): 348-359.

Co, M.J. 2003. A socio-cultural explanation of black entrepreneurship in South Africa. *South African Journal of Business Management*, 34(4): 35-43.

Cogliser, C.C. and Brigham, K.H. 2004. The intersection of leadership and entrepreneurship: Mutual lessons to be learned. *Leadership Quarterly*, 15(2004): 771-799.

Cohen, J.W. 1988. *Statistical power analysis for the behavioral sciences*. (2nd Edition). Hillsdale, NJ: Lawrence Erlbaum Associates.

Coldwell, D., and Herbst, F. 2004. *Business Research*. Cape Town: Juta.

Conger, J.A. 1999. Charismatic and transformational leadership in organisations: An insider's perspective on these developing streams of research. *Leadership Quarterly*, 10(2): 145-179.

Conner, M. and Armitage, C.J. 1998. Extending the theory of planned behaviour: A review and avenues for further research. *Journal of Applied Social Psychology*, 28: 1430-1464.

Cooper, A.C.; Gimeno-Gascon, F.J. and Woo, C.Y. 1994. Initial human and financial capital as predictors of new venture performance. *Journal of Business Venturing*, 9: 371-395.

CPLO (Southern African Catholic Bishops' Conference). 2013. *Small business in SA: What the Department of Small Business Development can do to stimulate growth*. [Online]. Available at: www.cplo.org.za [Accessed: 15 August 2016]

CPLO (Southern African Catholic Bishops' Conference). 2014. *Occasional Paper 35*. Cape Town: SACBC Parliamentary Liaison Office.

Cunningham, J.B. and Lischeron, J. 1991. Defining entrepreneurship. *Journal of Small Business Management*, 29(1): 45-62.

Curran, J. and Stanworth, J. 1989. Education and training for enterprise: Some problems of classification, evaluation, policy and research. *International Small Business Journal*, 7(2): 11-22.

Czarnia-Joerges, B. and Wolff, R. 1991. Leaders, managers, entrepreneurs on and off the organisational stage. *Organization Studies*, 12(4): 529-546.

Davidsson, P. and Honig, B. 2003. The role of social and human capital among nascent entrepreneurs. *Journal of Business Venturing*, 18(3): 665-709.

Davidsson, P. 1995. *Determinants of entrepreneurial intention*. RENT IX Workshop in Entrepreneurship Research, Piacenza, Italy, 23 - 24 November.

Davies, T.A. 2001. Entrepreneurship development in South Africa: Redefining the role of tertiary institutions in a reconfigured higher education system. *South African Journal of Higher Education*, 15(1): 32-39.

DePillis, E. and Reardon, K.K. 2007. The influence of personality traits and persuasive messages on entrepreneurial intention. *Career Development International*, 12(4): 382-396.

Derue, D.S.; Nahrgang, J.D.; Wellman, H. and Humphrey, S.E. 2011. Traits and behavioural theories of leadership: An integration and meta-analytic test of their relative validity. *Personnel Psychology*, 4(1): 7-52.

Diamantopoulos, A. and Siguaw, J.A. 2000. *Introducing LISREL*. London: Sage Publications.

Douglas, E.J. 2013. Reconstructing entrepreneurial intentions to identify predispositions for growth. *Journal of Business Venturing*, 28: 633-651.

DTC (Davis Tax Committee). 2014. *First interim report on small and medium enterprises for the Minister of Finance*. January 2014. [Online]. Available at: <http://allafrica.com/download/resource/main/main/idatcs/00010742:8de28423f6ac2b75b046035fbd5f643f.pdf> [Accessed: 16 April 2016].

DTI (Department of Trade and Industry). 2003. *National Small Business Act (102 of 1996) and National Small Business Amendment Act (26 of 2003)*. [Online]. Available at: <http://www.thedti.gov.za> [Accessed: 12 June 2016].

DTI (Department of Trade and Industry). 2013. *2013/14-2015/16 Annual Performance Plan*. January 2013 [Online]. Available at: www.thedti.gov.za [Accessed: 15 March 2017].

Dyer, W. 1994. Toward a theory of entrepreneurial careers. *Entrepreneurship Theory and Practice*, 19(2): 7-22.

Dykes, C. 2008. Styles of entrepreneurship. [Online]. Available at: http://www.urbanprofessionals.com/5_blog_article.php?id_art=101 [Accessed: 10 August 2016].

Ede, F.O.; Panigrahi, B. and Calcich, S.E. 1998. African American students' attitude towards entrepreneurship education. *Journal of Education for Business*, 73(5): 291-307.

Eijdenberg, E.L. and Masurel, E. 2013. Entrepreneurial motivation in the least developed country: Push and pull factors among MSEs in Uganda. *Journal of Enterprising Culture*, 21(19): 297-316.

Fal, M.; Sefolo, T.; Williams, A.; Herrington, M.; Goldberg, J. and Klaasen, M. 2010. *The entrepreneurial dialogues: State of entrepreneurship in South Africa*. [Online]. Available at: http://www.endeavor.co.za/Portals/74/docs/White%20paper/FINAL_GEW_WhitePaper_18March.pdf [Retrieved on: 29 April 2011].

Fatoki, O.O. 2010. Graduate entrepreneurial intention in South Africa: Motivations and obstacles. *International Journal of Business and Management*, 5(9): 87-98.

Fayolle, A. 2002. The determinants of entrepreneurial behaviour among students and young graduates of French higher education. *Management Review*, 4: 61-77.

Fayolle, A.; Gailly, B. and Lassas-Clerc, N. 2006. Assessing the impact of entrepreneurship education programmes: A new methodology. *Journal of European Industrial Training*, 30(9): 701-720.

Fernald, L.W.J.; Solomon, G.T. and Tarabishy, A. 2005. A new paradigm: Entrepreneurial leadership. *Southern Business Review*, 30(2): 1-10.

Field, A. 2005. *Discovering statistics using SPSS*. (2nd Edition). London: Sage Publications.

Filion, L.J. 1997. *Entrepreneurship: Entrepreneurs and small business owner managers*. Montreal: Ecole des Hautes Etudes Commerciales (HEC).

Fini, R.; Grimaldi, R.; Marzocchi, G.L. and Sobrero, M. 2009. *The foundation of entrepreneurial intention*. Paper presented at the Summer Conference, Denmark, 17-19 June.

Fishbein, M. and Ajzen, I. 1975. *Belief, attitude, intention and behaviour: An introduction of theory and research*. Boston, MA: Addison-Wesley.

Fishbein, M. and Ajzen, I. 2010. *Predicting and changing behaviour: The reasoned action approach*. New York, NY: Psychology Press.

Formica, P. 2002. Entrepreneurial universities – the value of education in encouraging entrepreneurship. *Industry and Higher Education*, 16: 167-175.

Friedrich, C. and Visser, K. 2005. *South African entrepreneurship education and training*. De Doorns: Leap Publishing.

Galloway, L.; Anderson, M.; Brown, W. and Wilson, L. 2005. Enterprise skills for the economy. *Education and Training Journal*, 479(1): 7-17.

Garavan, T.N. and O'Cinneide, B. 1994. Entrepreneurship education and training programmes: A review and evaluation. *Journal of European Industrial Training*, 18(11): 13-21.

Gartner, W.B. 1985. A conceptual framework for describing the phenomenon of New venture creation. *Academy of Management Review*, 10(4): 696-706.

Gartner, W.B. 1988. 'Who is an entrepreneur?' is the wrong question. *American Small Business Journal*, 12(4): 11-31.

Gartner, W.B. 1989. Some suggestions for research on entrepreneurial traits and characteristics. *Entrepreneurship Theory and Practice*, 14(1): 27-37.

Gartner, W.B., Bird, B.J. and Starr, J.A. 1992. Acting as if: Differentiating entrepreneurial from organizational behavior. *Entrepreneurship Theory and Practice*, 16(3): 13-31.

Gauntlett, D. 2002. *Media, gender, and identity*. London: Routledge.

Gelderen, M.; Brand, M.; Van Praag, M.; Bodewes, W.; Poutsma, E. and Van Gils, A. 2008. Explaining entrepreneurial intentions by means of the theory of planned behaviour. *Career Development International*, 13: 538-559.

GEM (Global Entrepreneurship Monitor). 2002. *GEM Report 2002*. London: Global Entrepreneurship Research Association.

GEM (Global Entrepreneurship Monitor). 2009. *GEM Report 2009*. London: Global Entrepreneurship Research Association.

GEM (Global Entrepreneurship Monitor). 2013. *GEM Report 2013*. London: Global Entrepreneurship Research Association.

Gibb, A.A. 2002a. In pursuit of a new 'enterprise' and 'entrepreneurship' paradigm for learning: Creative destruction, new values, new ways of doing things and new combinations of knowledge. *International Journal of Management Education*, 4(3): 233-269.

Gibb, A.A. 2002b. Creating conducive environments for learning and entrepreneurship. *Industry and Higher Education*, 16(3): 135-147.

Gibbs, A. 1999. Can we build effective entrepreneurship through management development? *Journal of General Management*, 24(4): 1-21.

Gibbs, A. 2005. *Towards the entrepreneurial university: Entrepreneurship education as a lever for change*. Policy Paper, National Council of Graduate Entrepreneurship, Birmingham, 3 May.

Gibson, D.E. 2003. Developing the professional self-concept: Role construals in early, middle, and late career stages. *Organisation Science*, 14(5): 591-610.

Gibson, D.E. 2004. Role models in career development: New directions for theory and research. *Journal of Vocational Behaviour*, 65: 134-156.

Giliomee, H. and Mbenga, B. 2007. *New history of South Africa*. Tafelberg, Cape Town.

Gird, A. and Bagraim, J. 2008. The theory of planned behaviour as a predictor of entrepreneurial intent among final-year university students. *South African Journal of Psychology*, 38(4): 711-724.

Godsell, G. 1991. *The social networks of South African entrepreneurs*. Unpublished PhD Thesis. Boston, MA: Boston University Graduate School.

Gorman, G. and Hanlon, D. 1997. Some researchers' perspectives on entrepreneurship education, enterprise education and education for small business management: A ten-year literature review. *International Small Business Journal*, 15(3): 56-78.

Greene, F.J. and Saridakis, G. 2008. The role of higher education skills and support in graduate self-employment. *Studies in Higher Education*, 33(6): 653-672.

Greene, P.G.; Katz, J.A. and Johannisson, B. 2004. Entrepreneurship education. *Academy of Management Learning and Education*, 3: 238-241.

Gupta, V.; McMillan, I.C. and Surie, G. 2004. Entrepreneurial leadership: Developing and measuring a cross-cultural construct. *Journal of Business Venturing*, 19(2): 241-260.

Gwija, S.A.; Eresia-Eke, C. and Iwu, C.G. 2014. Challenges and prospects of youth entrepreneurship development in a designated community in the Western Cape. *Journal of Economics and Behavioural Science Studies*, 6(1): 10-20.

Hair, J.; Wolfinbarger, M.; Ortinau, D. and Bush, R. 2010. *Essentials of marketing research*. New York, NY: McGraw-Hill Education.

Hall, D.T. 2002. *Careers in and out of organisations*. Thousand Oaks, CA: Sage Publications.

Hannon, P. 2005. *Graduate entrepreneurship in the UK: Defining a research and education policy framework*. Paper presented at the 28th National Institute for Small Business and Entrepreneurship Conference, Blackpool, UK, 1 - 3 November 2005.

Hannon, P. 2006. Teaching pigeons to dance: Sense and meaning in entrepreneurship education. *Education and Training*, 48(5): 296-308.

Harris, M.L. and Gibson, S.G. 2008. Examining the entrepreneurial attitudes of US business students. *Education and Training*, 50(7): 568-581.

Hatten, T. and Ruhland, S. 1995. Student attitude toward entrepreneurship as predicted by participation in an SBI program. *Journal of Education Business*, 70(4): 224-228.

Hellstroem, T. and Hellstroem, C. 2002. Time and innovation in independent technological ventures. *Human Relations*, 55(4): 407-427.

Herbert, R.F. and Link, A.N. 1988. *The entrepreneur*. New York, NY: Praeger Publishers.

Honjo, Y. 2004. Growth of start-up firms: Evidence from the Japanese manufacturing industry. *Applied Economics*, 36(4): 343-355.

House R.J. 1976. A 1976 theory of charismatic leadership. In: J.G. Hunt and L.L. Larson (Eds.). *Leadership: The cutting edge*. Carbondale, IL: Southern Illinois University Press, pp. 189-202.

House, R.J. and Aditya, R.N. 1997. The social scientific study of leadership. *Journal of Contemporary Business*, 3: 81-97.

House, R.J.; Rosseau, D.M. and Thomas-Hunt, M. 1995. The meso paradigm: A framework for the integration of micro and macro organisational behaviour. In: L.L.

Cummings and B.M. Staw (Eds.). *Research in organisational behaviour*. Greenwich, CT: JAI Press.

Howell, J.M. and Higgins, C.A. 1990. Champions of technological innovation. *Administrative Science Quarterly*, 35(2): 317-330.

Hoyt, C. and Simon, S. 2011. Female leaders: Injurious or inspiring role models for women? *Psychology of Women Quarterly*, 35: 143-157.

<http://seaanz.org/sites/seaanz/documents/1997SEAANZConference/1997-02.pdf>

[Accessed: 27 October 2017].

Hunt, J.G. and Dodge, G.E. 2000. Leadership déjà vu all over again. *Leadership Quarterly*, 11(2000): 435-458.

Hunt, J.G. 2004. What is leadership? In: J. Antonakis, A.T. Cianciolo and R.J. Sternberg (Eds.). *The nature of leadership*. Thousand Oaks, CA: Sage, pp. 19-47.

Hunt, J.G. and Conger, J.A. 1999. From where we sit: An assessment of transformational and charismatic leadership research. *Leadership Quarterly*, 10(3): 335-343.

Hunter, Q. 2015. Zuma says economy hurting young South Africans. *Mail and Guardian*, 16 January 2015. [Online]. Available at: <http://mg.co.za/article/2015-06-16-Zuma-says-economy-hurting-young-south-africans> [Accessed: 18 November 2016].

Hynes, B. and Richardson, I. 2007. Entrepreneurship education: A mechanism for engaging and exchanging with the small business sector. *Education and Training*, 18(8): 3-12.

Hytti, U. and O’Gorman, C. 2004. What is entrepreneurship education? An analysis of the objectives and methods of enterprise education programmes in four European countries. *Education and Training*, 46(1): 11-23.

Ibarra, H., and Petriglieri, J. L. 2008. Impossible selves: Image strategies and identity threat in professional women’s career transitions. *INSEAD Working Paper*. Available at: http://www.insead.edu/facultyresearch/research/details_papers.cfm?id=18683.

Ireland, R.D. and Hitt, M.A. 1999. Achieving and maintaining competitiveness in the 21st century: The role of strategic leadership. *Academy of Management Executive*, 13(1): 43-57.

Ireland, R.D.; Hitt, M.A. and Simon, D.G. 2003. A model for strategic entrepreneurship: The construct and its dimensions. *Journal of Management*, 29(6): 963.

Jack, S.R. and Anderson, A.R. 1999. Entrepreneurship education within the enterprise culture. *International Journal of Entrepreneurial Behaviour and Research*, 5(3): 110-125.

Janda, K.F. 1960. Towards the explication of the concept of leadership in terms of the concept of power. *Human Relations*, 13: 345-363.

Jansen, J.D. 2002. *Mergers in higher education: lessons learned in transitional contexts*. Pretoria. UNISA Press.

Johannisson, B. 1991. University training for entrepreneurship: A Swedish approach. *Entrepreneurship and Regional Development*, 3(1): 67-82.

Kaiser, H.F. 1961. A note on Guttman's lower bound for the number of common factors. *British Journal of Statistical Psychology*, 14(1): 1.

Karimi, S.; Biemans, H.J.A.; Lans, T.; Chizari, M. and Mulder, M. 2014. Effects of role models and gender on students' entrepreneurial intentions. *European Journal of Training and Development*, 38(8): 694-727.

Karmarkar, Y.; Chabra, Y.K. and Deshpande, A. 2014. Entrepreneurial leadership style(s): A taxonomic review. *Annual Research Journal of Symbiosis Centre for Management Studies*, 2(1): 156-189.

Katua, N.T. 2014. The role of SMEs in employment creation and economic growth in selected countries. *International Journal of Education and Research*, 2(2): 461-472.

Katz, J. 2003. Chronology and intellectual trajectory of American entrepreneurship education 1876 – 1999. *Journal of Business Venturing*, 8(2) 283-300.

Kautonen, T.; Van Gelderen, M. and Tornikoski, E.T. 2013. Predicting entrepreneurial behaviour: A test for the theory of planned behaviour. *Applied Economics*, 45(6): 697-707.

Keller, R.T. 1997. Job involvement and organizational commitment as longitudinal predictors of job performance: A study of scientists and engineers. *Journal of Applied Psychology*, 82: 539-545.

King, K. and McGrath, S. 2002. Globalisation, enterprise and knowledge education. *Training and Development in Africa*. Oxford: Symposium Books.

Kirby, D. 2003. *Entrepreneurship*. London: McGraw-Hill.

Kirkpatrick, S.A.; Wofford, J.C. and Baum, J.R. 2002. Measuring motive imagery contained in the vision statement. *The Leadership Quarterly*, 13(2): 139-150.

Kirzner, I. 1997. Entrepreneurial discovery and the competitive market process: An Austrian approach. *Journal of Economic Literature*, 35: 60-85.

Koellinger, P.; Minniti, M. and Schade, C. 2007. I think I can: Overconfidence and entrepreneurial behaviour. *Journal of Economic Psychology*, 28: 110-132.

Kolvereid, L. and Isaksen, E. 2006. New business start-up and subsequent entry into self-employment. *Journal of Business Venturing*, 21(6): 866-885.

Kolvereid, L. 1996. Organisational employment versus self-employment: Reasons for career choice intentions. *Entrepreneurship Theory and Practice*, 20(3): 154-160.

Kolvereid, L. 1997. Prediction of employment status choice intentions. *Entrepreneurship Theory and Practice*, 21: 47-57.

Kopel, S. 2012, *Guide to business law – commercial law*. (5th Edition). Cape Town: Oxford University Press Southern Africa.

Kothari, C.R. 2004. *Research methodology: Methods and techniques*. 2nd Edition. New Delhi. New Age International Ltd.

Kotler, P. 1982. *Marketing for non-profit organizations*. Englewood Cliffs, NJ: Prentice-Hall.

Kraaijenbrink, J.; Bos, G. and Groen, A. 2010. What do students think of entrepreneurial support given by their universities? *International Journal of Entrepreneurship and Small Business*, 9(1): 110-125.

Kroon, J. and Meyer, S. 2001. The role of entrepreneurship education in career expectations of students. *South African Journal of Higher Education*, 15(1): 47-53.

Krueger, N.F. 1993. The impact of prior entrepreneurial exposure on perceptions of new venture feasibility and desirability. *Entrepreneurial Theory and Practice*, 5: 5-21.

Krueger, N.F. and Carsrud, A.L. 1993. Entrepreneurial intention: Applying the theory of planned behaviour. *Entrepreneurship and Regional Development*, 5: 316-323.

Krueger, N.F.; Reilly, M. and Carsrud, A.L. 2000. Competing models of entrepreneurial intentions. *Journal of Business Venturing*, 15: 411-432.

Kruger, L.P. 2011. The impact of black economic empowerment (BEE) on South African businesses: Focusing on ten dimensions of business performance. *Southern African Business Review*, 15(3): 207-233.

Kuhnert, K.W. 1994. Transforming leadership: Developing people through delegation. In: B.M. Bass and B.J. Avolio (Eds.). *Improving organisational effectiveness through transformational leadership*. Thousand Oaks, CA: Sage, pp. 10-25.

Kuratko, D.F. and Hodgetts, R. 2007. *Entrepreneurship: Theory, process, practice*. (7th Edition). Mason, OH: Thomson/South Western Publishing.

Kuratko, D.F. 2005. The emergence of entrepreneurship education: Development trends and challenges. *Entrepreneurship Theory and Practice*, 29(5): 577-597.

Kuratko, D.F. 2007. Entrepreneurial leadership in the 21st century. *Journal of Leadership and Organisational Studies*, 13(4): 1-11.

Kuratko, D.F.; Ireland, R.D. and Hornsby, J.S. 2001. Improving firm performance through entrepreneurial actions: Acordia's corporate entrepreneurship strategy. *Academy of Management Executive*, 15(4): 60-71.

Laukkanen, M. 2000. Exploring alternative approaches in high-level entrepreneurship education: Creating micro mechanisms for endogenous regional growth. *Journal of Entrepreneurship and Regional Development*, 12(1): 25-47.

Liñán, F. 2004. Intention-based models of entrepreneurship education. *Piccola Impresa/Small Business*, 2004(3): 11-35.

Liñán, F. 2007. The role of entrepreneurship education in the entrepreneurial process. In: A. Fayolle (Ed.). *Handbook of research in entrepreneurship education*. Cheltenham, UK: Edward Elgar Publishing.

Liñán, F. and Chen, Y.W. 2006. *Testing the entrepreneurial intention model on a two-country sample*. Barcelona: University of Barcelona.

Lockwood, P. 2006. "Someone like me can be successful": Do college students need samegender role models? *Psychology of Women Quarterly*, 30: 36-46.

Loudon, M. and Smither, J. 1999. Empowered self-development and continuous learning. *Human Resources Management*, 38(1): 3-15.

Luthje, C. and Franke, N. 2003. The making of an entrepreneur: Testing a model of entrepreneurial intent among engineering students at MIT. *RandD Management*, 33(2): 135-147.

Luthje, C. and Franke, N. 2004. Entrepreneurial intentions of business students: A benchmarking study. *International Journal of Innovation and Technology Management*, 1(3): 269-288.

Mahembe, B. 2010. *The relationship between servant leadership, team commitment, team citizenship behaviour and team effectiveness: An exploratory study*. Master's Dissertation. Stellenbosch: University of Stellenbosch.

Main, S.; Fayolle, A. and Lamine, W. 2012. Building sustainable regional platforms for incubating science and technology business evidence from US and French science and technology to tenant firms. *Research Policy*, 25(3): 325-335.

Malebana, J. 2014. Entrepreneurial intentions of South African rural university students: A test of the theory of planned behaviour. *Journal of Economics and Behavioural Studies*, 6(2): 130-143.

Maranville, S. 1992. Entrepreneurship in the business curriculum. *Journal of Education for Business*, 68(1): 27-31.

Matlay, H. 2005. Researching entrepreneurship and education: Part 1: What is entrepreneurship and does it matter? *Education and Training Journal*, 47(8/9): 665-678.

Matlay, H. and Carey, C. 2007. Entrepreneurship education in the UK: A longitudinal perspective. *Journal of Small Business Enterprise and Development*, 14(2): 252-263.

Matthews, C.H. and Moser, S.B. 1995. Family background and gender: Implications for interest in small firm ownership. *Entrepreneurship and Regional Development*, 7(4): 365-377.

Meyer, A. 2012. Suid-Afrika se oervelede in Petorius, F. (Ed). *Geskiedenis van Suid Afrika: van voortye tot vandag*. pp 17 – 36. Tafelberg, Cape Town.

McGrath, R.G. and McMillan, I.C. 2000. *The entrepreneurial mindset: Strategies for continuously creating opportunity in an age of uncertainty*. Boston, MA: Harvard Business School Press.

McIntyre, J.R. and Roche, M. 1999. University education for entrepreneurs in the United States: A critical and retrospective analysis of trends in the 1990s. *Centre for*

International Business Education and Research, 1999 – 2000 Working Paper Series No. 99/00-021. Atlanta: Georgia Institute of Technology.

McMillan, J. and Schumacher, S. 2001. *Research in education: A conceptual introduction.* International Edition. Essex: Pearson Education.

McMullan, W.E. and Gillin, L.M. 1998. Developing technological start-up entrepreneurs: A case study of a graduate entrepreneurship programme at Swinburne University. *Technovation*, 18(4): 275-286.

Meece, J.L.; Wigfield, A. and Eccles, J.S. 1990. Predictors of math anxiety and its influence on young adolescents' course enrollment intentions and performance in mathematics. *Journal of Educational Psychology*, 82: 60-70.

Mentoor, E.R. and Friedrich, C. 2007. Is entrepreneurial education at South African universities successful? An empirical example. *Industry and Higher Education*, 21(3): 221-232.

Merton, R.K. 1957. *Social theory and social structure.* New York, NY: Free Press.

Morgenroth, T. 2015. *How role models affects role aspirants' motivation and goals.* Doctoral Dissertaton. Exeter, UK: University of Exeter.

Motsuenyane, A. 1989. *The development of black entrepreneurship in South Africa.* Lagos: Nigerian Institute of International Affairs.

Mouton, J. 1996. *Understanding social research.* Pretoria. Van Schaik.

Mouton, J. 2015. *How to succeed in your master's and doctoral studies: A South African guide and resource book.* Pretoria: Van Schaik.

Mueller, P. 2006. Entrepreneurship in the region: Breeding ground for nascent entrepreneurs? *Small Business Economics*, 27: 41-58.

Mumford, M.D.; Schultz, R.A. and Osburn, H.K. 2002a. Planning in organizations: Performance as a multi-level phenomenon. In: F.J. Yammarino and F. Dansereau (Eds.). *The many faces of multi-level issues*. Oxford: Elsevier, pp. 3-65.

Mumford, M.D.; Scott, G.M.; Gaddis, B. and Strange, J.M. 2002b. Leading creative people: Orchestrating expertise and relationships. *The Leadership Quarterly*, 13(6): 705-750.

Musengi-Ajulu, S. 2010. *What do we know about entrepreneurial intentions of the youth in South Africa? Preliminary results of a pilot study*. [Online]. Available at: <http://www.uj.ac.za/EN/Faculties?management/departments/CSBD/Documents/MusengiAjulu.pdf> [Accessed: 12 February 2016].

Nabi, G. and Liñón, F. 2011. Graduate entrepreneurship in the developing world: Intentions, education and development. *Education and Training*, 53(3): 325-334.

Nafukho, F.M. and Muyia, M.A.H. 2010. Entrepreneurship and socioeconomic development in Africa: A reality or myth? *Journal of Industrial Training*, 34(2): 96-109.

Nauta, M. and Kokaly, M. 2001. Assessing role model influences on students' academic and vocational decisions. *Journal of Career Assessment*, 9(1): 81-99.

Neuman, W.L. 2000. *Social research methods: Qualitative and quantitative approaches*. 4th Edition. Boston, MA: Allyn and Bacon.

Nicholson, N. 1998. Personality and entrepreneurial leadership: A study of the heads of UK's most successful independent companies. *European Management Journal*, 16(5): 529-539.

Nicolaidis, A. 2011. Entrepreneurship – the role of higher education in South Africa. *Educational Research*, 2(4): 1043-1050.

Nieuwenhuizen, C. and Kroon, J. 2002. Identification of entrepreneurial success factors to determine the content of entrepreneurship subjects. *South African Journal of Higher Education*, 16(3): 157-166.

Noel, T.W. 2002. Effects of entrepreneurship education on intent to open a business: An exploratory study. *Journal of Entrepreneurship Education*, 5: 3-13.

Norman, D.A. and Spohrer, J.C. 1996. Learner-centred education. *Communications of the ACM*, 39(4): 24-27.

Northhouse, P.G. 2013. *Theory and practice*. (6th Edition). Thousand Oaks, CA: Sage Publications.

Norton, B.; Kaplan, T. and Hofer, C. 1999. *Model programs for entrepreneurship curricula at the undergraduate, masters, and doctoral levels*. Paper presented at the annual meeting of the US Association for Small Business and Entrepreneurship. San Diego, January 1999.

Nunnally, J.C. 1967. *Psychometric theory*. New York, NY: McGraw-Hill Inc.

Oliver, E. and Oliver, W. 2017. The colonisation of South Africa: A unique case. *HTS Theological Studies* 73(3).

Omer, N.A.E. 2014. *Financial constraints to SMME growth in South Africa: Investigating the moderate effect of microfinance*. PhD Thesis. Cape Town: University of the Western Cape.

Paice, E.; Heard, S. and Moss, F. 2002. How important are role models in making good doctors? *British Medical Journal*, 325: 707-710.

Pallant, J. 2011. *SPSS survival manual: A step by step guide to data analysis using SPSS*. (4th Edition). Crows Nest, NSW, Australia: Allen and Unwin.

Peterman, N.E. and Kennedy, J. 2003. Enterprise education: Influencing students' perceptions of entrepreneurship. *Entrepreneurship Theory and Practice*, 28(2): 129-144.

Peters, RM. 2010. *SMME development initiatives and its constraints to growth in South Africa*. PhD Thesis. Johannesburg: University of Johannesburg.

Peterson, M. and Hunt, J.G. 1997. International perspectives on international leadership. *Leadership Quarterly*, 8(3): 203-232.

Peyper, L. 2013. Small business statistics 'scary'. *Finweek*, 16 May 2013. [Online]. Available at: <http://finweek.com/2013/05/16/small-business-statistics-scary/> [Accessed: 14 May 2016]

Pfannestial, T. 1998. It's not a job, it's an indenture: Graduate studies and the academic job market. *Academe*, 84: 44-47.

Pfeffer, J. 1982. *Organisations and organisational theory*. London: Pitman.

Phan, P.H.; Wong, P.K. and Wang, C.L. 2002. Antecedents to entrepreneurship among university students in Singapore: Beliefs, attitudes and background. *Journal of Enterprising Culture*, 10(2): 151-174.

Pittaway, L. and Cope, J. 2007. Entrepreneurship education: A systematic review of the evidence. *Working Paper Series No. 2*. Birmingham: National Council for Graduate Entrepreneurship, 1-33.

Postigo, S. 2002. *Where do we learn that entrepreneurship is feasible, desirable and/or profitable? A look at the process leading to entrepreneurial potential*. [Online]. Available at:

<http://seaanz.org/sites/seaanz/documents/1997SEAANZConference/1997-02.pdf>

[Accessed: 14 June 2016]

Postigo, S. and Tamborini, M.F. 2002. *Entrepreneurship education in Argentina: The case of San Andres University*. Paper presented at the Internationalizing Entrepreneurship Education and Training Conference – IntEnt 2002, Malaysia, July 2002.

Pring, R. 2000. *Philosophy of educational research*. London: Continuum Publishers.

Punch, K. 2000. *Developing effective research proposals*. 1st Edition. London: SAGE Publishers.

Ramachandran, V. and Shah, M.K. 1999. Minority entrepreneurs and firm performance in Sub-Saharan Africa. *Journal of Development Studies*, 36(2): 129-144.

Reddy, T. 2004. *Higher education and social transformation: South Africa case study – Council of Higher Education*. [Online]. Available at: www.che.ac.za [Accessed: 4 January 2017].

Reichers, A.E. and Schneider, B. 1990. Climate and culture: An evolution of constructs. In: B. Schneider (Ed.). *Organizational climate and culture*. San Francisco, CA: Jossey-Bass, pp. 5-39

Renko, M.; El Tarabishy, A.; Carsrud, A.L. and Brännback, M. 2015. Understanding and measuring entrepreneurial leadership. *Journal of Small Business Management*, 53(1): 54-74.

Renko, M.; Kroeck, K. K. and Bullough, A. 2012. Expectancy theory and nascent entrepreneurship. *Small Business Economics*, 39: 667-684.

Rideout, E.C. and Gray, D.O. 2013. Does entrepreneurship education really work? A review and methodological critique of the empirical literature on the effects of university-based entrepreneurship education. *Journal of Small Business Management*, 51(3): 329-351.

Rindova, V.P. and Starbuck, W.H. 1997. Ancient Chinese theories of control. *Journal of Management Inquiry*, 6: 144-159.

Robinson, D.A.; Goldeby, M. and Hosgood, N. 2006. *Entrepreneurship as a values and leadership paradigm*. Robina, QLD, Australia: Bond University.

Robinson, P.B.; Stimpson, D.V.; Huefner, J.C. and Hunt, H.K. 1991. An attitude approach to the prediction of entrepreneurship. *Entrepreneurship Theory and Practice*, 15(4): 13-30.

Rogerson, C.M. 1996. Urban poverty and the informal economy in South Africa's economic heartland. *Environment and Urbanisation*, 8(1): 167-179.

Roomi, M.A. and Harrison, P. 2011. Entrepreneurial leadership: What is it and how should it be taught? *International Review of Entrepreneurship*, 9(3): 1-44.

RSA (Republic of South Africa). 1956. *Industrial Conciliation Act (Act No. 28 of 1956)*. Pretoria: Government Printer.

RSA (Republic of South Africa). 1995. *National Strategy for the Development and Promotion of Small Business in South Africa*. White Paper of the Department of Trade and Industry. Pretoria: Government Printer.

RSA (Republic of South Africa). 2003. *Broad-Based Black Economic Empowerment Act (Act No. 53 of 2003)*. Pretoria: Government Printer.

RSA (Republic of South Africa). 2009. *National Youth Policy (NYP) – 214*. [Online]. Available at: <http://www.info.gov.za/view/DownloadFileAction?id=102384> [Accessed: 14 April 2016].

RSA (Republic of South Africa). 2012. *The National Development Plan: A vision for 2030*. [Online]. Available at: http://www.dac.gov.za/sites/default/files/NDP%202030%20-%20Our%20future%20-%20make%20it%20work_0.pdf [Accessed: 13 April 2016].

Sanchez-Escobedo, M.; Diaz-Casero, J.; Ernadey-Mogollon, R. and Postigojimenez, M. 2011. Perceptions and attitudes towards entrepreneurship: An analysis of gender among university students. *International Entrepreneurship and Management Journal*, 7(4): 443-463.

SBP. 2014a. Headline report of SBP: Examining the challenges facing small businesses in South Africa. *Issue Paper 1: An occasional paper (2014)*. [Online]. Available at: www.sbp.org.za [Accessed: 15 June 2016].

SBP. 2014b. *Headline report of SBP's SME growth index – Growth and competitiveness for small business in South Africa, February 2014*. [Online]. Available at: www.sbp.org.za [Accessed: 15 June 2016].

Scherer, R. F., Adams, J. S., Carley, S., and Wiebe, F. A. 1989. Role Model Performance Effects on Development of Entrepreneurial Career Preference. *Entrepreneurship: Theory and Practice*, 13(3), 53-71.

Scherer, R.; Adams, J.; Carley, S. and Wiebe, F. 1989. Role model performance effects on development of entrepreneurial career preferences. *Entrepreneurship Theory and Practice*, 13(3): 53-71.

Schumpeter, J. 1934. *Capitalism, socialism, and democracy*. (Volume 14). New York, NY: Harper and Row.

Schumpeter, J.A. 1947. The creative response in economic history. *Journal of Economic History*, 7: 149-159.

Schwarz, E.J.; Wdowiak, M.A.; Almer-Jarz, D.A. and Breitenecker, R.J. 2009. The effects of attitude and perceived environment conditions on students' entrepreneurial intent: An Austrian perspective. *Education and Training*, 51(4): 272-291.

SEFA (Small Enterprise Finance Agency). 2014. *Annual Report 2014*. [Online]. Available at: www.sefa.org.za [Accessed: 18 April 2016].

Shane, S. and Venkataraman, S. 2000. The promise of entrepreneurship as a field of research. *Academy of Management Review*, 25: 217-226.

Shane, S.A. 1992. Why do some societies invent more than others? *Journal of Business Venturing*, 7(1): 29-46.

Shapero, A. and Sokol, L. 1982. Social dimensions of entrepreneurship. In: C. Kent (Ed.). *The encyclopaedia of entrepreneurship*. Englewood Cliffs, NJ: Prentice-Hall, pp. 72-90.

- Shapiro, A. 1984. Why entrepreneurship? Working paper, Babson College.
- Shapiro, E.; Haseltine, F. and Rowe, M. 1978. Moving up: Role models, mentors, and the 'patron system'. *Sloan Management Review*, 6(1): 19-47.
- Silverman, D. 2000. *Doing qualitative research*. London: SAGE Publishers.
- Solomon, G. 2007. An examination of entrepreneurship education in the United States. *Journal of Small Business and Enterprise Development*, 14: 168-182.
- Solomon, G.T.; Duffy, S. and Tarabishy, A. 2002. The state of entrepreneurial education in the United States: A nationwide survey and analysis. *International Journal of Entrepreneurship Education*, 1(1): 65-86.
- Souitaris, V.; Zerbinati, S. and Allaham, A. 2007. Do entrepreneurship programmes raise entrepreneurial intention of science and engineering students? The effect of learning, inspiration and resources. *Journal of Business Venturing*, 22(4): 566-591.
- StatsSA. 2017. *Quarterly Employment Statistics*. 12 December 2017. [Online]. Available at: www.statssa.org.za [Accessed: 5 January 2018].
- Stogdill, R.M. 1974. *Handbook of leadership: A survey of theory and research*. New York, NY: Free Press.
- Stokes, D. and Wilson, N. 2010. *Small business management and entrepreneurship*. (6th Edition). London: South-Western Cengage Learning.
- Surie, G. and Ashley, A. 2008. Integrating pragmatism and ethics in entrepreneurial leadership for sustainable value creation. *Journal of Business Ethics*, 81(1): 235-246.
- Taffinder, P. 1995. *The new leaders achieving corporate transformation through dynamic leadership*. London: Kogan Page.

Thornberry, N. 2006. *Lead like an entrepreneur: Keeping the entrepreneurial spirit alive within the corporation*. London: McGraw Hill.

Tijssen, R.J.W. 2006. Universities and industrially relevant science: Toward measurement models and indicators of entrepreneurial orientation. *Research Policy*, 35(10): 269-280.

Timmons, J.A. and Spinelli, S. 2004. *New venture creation: Entrepreneurship for the 21st century*. Boston, MA: McGraw Hill Irwin.

Trivedi, R. 2016. Does university play a significant role in shaping entrepreneurial intention? A cross-country comparative analysis. *Journal for Small Business and Enterprise Development*, 23(3): 790-811.

Turker, D. and Selcuk, S. 2009. Which factors affect entrepreneurial intention of university students? *Journal of European Industrial Training*, 33(2): 142-159.

UNOWA (United Nations Office for West Africa). 2005. *Youth unemployment and regional security in West Africa. December 2005*. [Online]. Available at: <http://allafrica.com/download/resource/main/main/idatcs/00010742:8de28423f6ac2b75b046035fbd5f643f.pdf> [Accessed: 14 June 2016].

Urbano, D. and Guerrero, M. 2013. Entrepreneurial universities: Socio-economic impacts of academic entrepreneurship in a European region. *Economic Development Quarterly*, 27(1): 40-55.

Van Auken, H.; Stephens, P.; Fry, F.L. and Silva, J. 2006a. Role model influences on entrepreneurial intentions: A comparison between USA and Mexico. *International Entrepreneurship and Management Journal*, 2(3): 325-336.

Van Auken, H.; Stephens, P.; Fry, F.L. and Silva, J. 2006b. The influence of role models on entrepreneurial intentions. *Journal of Developmental Entrepreneurship*, 11(2): 157-167.

Van Gelderen, M.; Brand, M.; Van Praag, M.; Bodewes, W.; Poutsma, E. and Van Gils, A. (2008). Explaining entrepreneurial intentions by means of the theory of planned behaviour. *Career Development International*, 13(5): 538-559.

Van Gensen, G. 2005. *A model for branding practices in a new South Africa higher education landscape*. Doctoral Thesis. Bloemfontein: Central University of Technology.

Vecchio, R. 2003. Entrepreneurship and leadership: Common trends and common threads. *Human Resource Management Review*, 13(2003): 303-327.

Venkataraman S. 1997. The distinctive domain of entrepreneurship research: An editor's perspective. In: J.A. Katz and R.H. Brockhaus (Eds.). *Advances in entrepreneurship, firm emergence and growth*. Greenwich, CT: JAI Press, pp. 119-138.

Venter, R.; Urban, B.; Beder, L.; Oosthuizen, C.; Reddy, C. and Venter, E. 2015. *Entrepreneurship: Theory in practice*. (3rd Edition). Cape Town: Oxford University Press Southern Africa.

Verhoef, G. 2015. *The opportunity of inequality: African entrepreneurship and inequality*. [Online]. Available at: file:///C:/Users/Admin/Downloads/essa_3202.pdf [Accessed: 16 November 2016].

Wang, C.K. and Wong, P.K. 2004. Entrepreneurial interest of university students in Singapore. *Technovation*, 24(2): 163-172.

Warshaw, P.R. and Davis, F.D. 1985. Disentangling behavioural intention and behavioural expectation. *Journal of Experimental Social Psychology*, 21: 213-228.

Watchravensingkan, K.T.; Hodges, N.N.; Yurchism, J.; Hegland, J.; Karpova, E.; Marcketti, S. and Yan, R. 2013. Modelling entrepreneurial career intentions among undergraduates: An examination of the moderating role of entrepreneurial knowledge and skills. *Family and Consumer Science Research Journal*, 41(3): 367-376.

Weber, H.S.; Lu, L.; Shi, J. and Spinath, F.M. 2013. The roles of cognitive and motivational predictors in explaining school achievement in elementary school. *Learning and Individual Differences*, 25: 85-92.

Westhead, P. 1995. Growth and performance contrasts between 'types' of small firm. *Strategic Management Journal*, 11: 535-557.

Worden, N. 1994. The making of a modern South Africa: Conquest segregation and apartheid. Cambridge: Blackwell Publishers.

Worden, N. 2000. *Making of modern South Africa: Conquest, segregation and apartheid*. Hoboken, NJ: Blackwell Publishers.

World Bank. 2014. Doing business: Measuring business regulations. Washington, DC: World Bank.

Wright, S.; Wong, A. and Newill, C. 1997. The impact of role models on medical students. *Journal of General Internal Medicine*, 12: 53-56.

Yammarino, F.J. 1993. Transforming leadership studies: Bernard Bass' leadership and performance beyond expectations. *Leadership Quarterly*, 4(3): 379-382.

Yang, C. 2008. The relationships among leadership styles, entrepreneurial orientation, and business performance. *Managing Global Transitions*, 6(3): 257-275.

Young, J. 1997. Entrepreneurship education and learning for university students and practicing entrepreneurs. In: D. Sexton and R. Smilor (Eds.). *Entrepreneurship 2000*. Chicago, IL: Upstart Publishing, pp. 215-242.

Yukl, G. 2002. *Leadership in organisations*. (5th Edition). Englewood Cliffs, NJ: Prentice-Hall.

Yukl, G.A., and Falbe, C.M. 1990. Importance of different power sources in downward and lateral relations. *Journal of Applied Psychology*, 76(3): 416-423.

Zaccaro, S.J. and Banks, D.J. 2001. Leadership, vision, and organizational effectiveness. In: S.J. Zaccaro and R.J. Klimoski (Eds.). *The nature of organizational leadership: Understanding the performance imperatives confronting today's leaders*. San Francisco, CA: Jossey-Bass/Pfeiffer, pp. 181-218.

Zaccaro, S.J.; Kemp, C. and Bader, P. 2004. *Leader traits and attributes: The nature of leadership*. Thousand Oaks, CA: Sage Publications Inc, pp. 101-124

Zhang, Y.; Duysters, G. and Cloudt, M. 2014. The role of entrepreneurship education as a predictor of university students' intention. *International Entrepreneurship Management Journal*, 10: 623-641.

Zungu, Y. 1977. The education for Africans in South Africa. *The Journal of Negro Education*. 46(3) 202 – 218.

