THE INTEGRATION OF IDENTIFIED EMPLOYABILITY SKILLS INTO THE NAMIBIAN VOCATIONAL EDUCATION AND TRAINING CURRICULUM

by

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DECLARATION

By submitting this dissertation electronically, I declare that the entirety of the work contained therein is my own, original work, that I am the owner of the copyright thereof (unless to the extent explicitly otherwise stated) and that I have not previously in its entirety or in part submitted it for obtaining any qualification.

Signature:  **Date:** *25 October 2010*

DEDICATION

This work is dedicated to my wife Irma Ndategega Naanda
for having stood by me all the years.

I also
dedicate this work to my parents
for my upbringing and the way I am today.

ABSTRACT

Since the advent of the 21st century the world has been experiencing rapid changes in knowledge, technology and information. These changes pose challenges to the providers of education and training in general and vocational education and training in particular. The impact of technological advancement and the nature of organisational changes in the workplace demand skills of an increasingly higher level – particularly skills in the areas of information technology, problem solving and communication. The problem identified in this study was that graduates from vocational training centres (VTCs) in Namibia did not have appropriate employability skills needed at the workplace, as indicated by Namibian employers.

The aim of this study was to identify the types of employability skills considered important by employers at the workplace and to determine how such skills could be integrated into the vocational education and training curriculum in Namibia. A literature review conducted revealed that employers require workers with the following key, core or employability skills: communication, information technology, working with numbers, working with others, problem solving and improving one's own learning and performance.

The population for this study was 493 employers providing on-the-job training or employing vocational training centre graduates. A total of 244 out of the 493 employers responded. The population of the study represented the following occupational sectors: auto trades, building construction trades, metalwork trades and electrical engineering trades.

Data for the study were collected through reviewing the literature on employability skills, a survey questionnaire to employers and face-to-face interviews conducted with selected employers during the research. The following questions were explored in the questionnaire and structured interviews: i) Which employability skills are important at the workplace? ii) Who is responsible for developing employability skills? iii) If it is the responsibility of vocational training centres to foster employability skills, at which educational level should employability skills education be introduced? iv) How should the acquisition of employability skills be promoted? v) How should employability skills be assessed?

The study found that employers in Namibia considered employability skills such as teamwork, time management, a positive attitude, problem solving, planning, and coping with multiple tasks as the most important skills they required from vocational training centre graduates. Employers further indicated that employability skills could be developed at family/home settings as well as at school and vocational training centres and suggested that employability skills education be introduced from level 1 during the first year of training. It was also found that portfolios, observation and practical assessment were credible approaches for assessing employability skills and that this should be done in real-life contexts.

Based on the conclusions arrived at in the study, it is recommended that a policy framework for employability skills be developed and implemented in the Namibian vocational education and training system. Specific recommendations are made regarding the following aspects: the type of employability skills; whose responsibility it is to develop these skills; at which level of training the development of employability skills should be implemented; how they could best be learned and how the learning of employability skills could be assessed.

OPSOMMING

Die snelle veranderinge op die gebied van kennis, tegnologie en inligting sedert die begin van die 21ste eeu bied groot uitdagings aan die verskaffers van onderwys en opleiding in die algemeen en beroepsonderwys en -opleiding in die besonder. Die uitwerking van tegnologiese vordering en die aard van organisatoriese veranderinge in die werkplek vereis groter hoërorde-vaardighede as vantevore – veral vaardighede op die gebied van inligtingstegnologie, probleemoplossing en kommunikasie. Die probleem wat in hierdie studie aan bod gekom het, was dat gegradueerdes van beroepsopleidingsentrums in Namibië nie oor voldoende indiensneembaarheids-vaardighede wat in die werkplek benodig word, beskik nie, soos aangedui deur Namibiese werknemers.

Die doel van hierdie navorsing was om die soorte indiensneembaarheidsvaardighede wat werkgewers by indiensneming van personeel as belangrik beskou te identifiseer, en om vas te stel hoe sodanige vaardighede in die kurrikulum vir beroepsonderwys en -opleiding in Namibië geïntegreer kan word. 'n Literatuuroorsig het getoon dat werknemers benodig word met die volgende belangrike, kern- of indiensneem-baarheidsvaardighede: kommunikasie, inligtingstegnologie, syfervaardigheid, samewerking met ander persone, probleemoplossing en die verbetering van eie leer en prestasie.

Die navorsingspopulasie vir hierdie studie het uit 493 werkgewers bestaan wat indiensopleiding verskaf of wat persone in diens het wat reeds hul beroepsopleiding voltooi het. Tweehonderd-vier-en-veertig werkgewers het uiteindelik aan die vraelysondersoek deelgeneem. Die motor-, konstruksie- en metaalwerkbedryf, asook die elektriese-ingenieurswesesektor, is in die navorsingspopulasie verteenwoordig.

Data is ingesamel deur 'n literatuuroorsig te doen oor indiensneembaarheidsvaardighede, en deur vraelyste en persoonlike onderhoude. Die volgende vrae is in die vraelys en tydens gestruktureerde onderhoude gestel: i) Watter indiensneembaarheidsvaardighede is in die werkplek belangrik? ii) Wie is verantwoordelik vir die ontwikkeling van indiensneembaarheids-vaardighede? iii) Indien dit die verantwoordelikheid is van beroepsopleidingsentra om indiensneembaarheids-vaardighede te bevorder, op watter opvoedkundige vlak

behoort opleiding met betrekking tot indiensneembaarheidsvaardighede ingestel te word? iv) Hoe behoort die aanleer van indiensneembaarheidsvaardighede bevorder te word? v) Hoe behoort indiensneembaarheidsvaardighede geassesseer te word?

Daar is bevind dat werkgewers in Namibië indiensneembaarheidsvaardighede soos spanwerk, tydbestuur, 'n positiewe houding, probleemoplossing, beplanning en die hantering van veelvuldige take as die belangrikste vaardighede beskou wat hulle van potensiële opgeleide werknemers verwag. Werkgewers het aangedui dat indiensneembaarheidsvaardighede in die huis, in skole en deur beroepsopleiding-sentrums ontwikkel kan word. Hulle het voorgestel dat opleiding in indiensneembaarheidsvaardighede in die eerste jaar van opleiding by die beroepsopleidingsentrums vanaf vlak 1 aangebied behoort te word. 'n Verdere bevinding was dat die assessering van kwekelinge se portefeuljes, waarneming en praktiese assessering 'n geloofwaardige benadering tot die assessering van indiensneembaarheidsvaardighede is en dat dit binne die konteks van die werklike lewe gedoen behoort te word.

Daar word op grond van die bevindinge onder meer aanbeveel dat 'n beleidsraamwerk vir die ontwikkeling van indiensneembaarheidsvaardighede in die Namibiese beroepsonderwys en -opleidingstelsel ontwikkel en geïmplementeer word. Spesifieke aanbevelings word gemaak ten opsigte van die tipes indiensneembaarheids-vaardighede, wie se verantwoordelikheid dit is om hierdie vaardighede te ontwikkel, op watter opleidingsvlak die indiensnemingsvaardighede geïmplementeer behoort te word, hoe dit ten beste aangeleer kan word, en hoe die leerproses met betrekking tot indiensneembaarheidsvaardighede geassesseer kan word.

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ACRONYMS

ANTA	Australian National Training Authority
BTEP	Botswana Technical Education Programme
BOTA	Botswana Training Authority
CBET	Competency-Based Education and Training
COSDECs	Community Skills Development Centres
COST	College for Out of School Training
DfEE	Department for Education and Employment
FET	Further Education and Training Colleges
GNVO	General National Vocational Qualification
ILO	International Labour Organisation
MoE	Ministry of Education
MoL	Ministry of Labour
NDP	National Development Plan
NIMT	Namibia Institute of Mining and Technology
NPVET	National Policy on Vocational Education and Training
NTA	Namibia Training Authority
NTTC	Namibia Training and Testing Centre
NVQ	National Vocational Qualification
NVTA	National Vocational Training Act
OECD	Organisation for Economic Co-operation and Development
OVTC	Okakarara Vocational Training Centre
QAA	Quality Assessment Assurance
RVTC	Rundu Vocational Training Centre
SME	Small and Medium Enterprises
SNVQ	Scottish National Vocational Qualification
TACs	Trade Advisory Committees
TVET	Technical Vocational Education and Training
UNDP	United Nations Development Program
UNESCO	United Nations Educational, Scientific and Cultural Organisation
VET	Vocational Education and Training
VTB	Vocational Training Board
VTCs	Vocational Training Centres
WVTC	Windhoek Vocational Training Centre
ZVTC	Zambezi Vocational Training Centre

CHAPTER ONE

RESEARCH OVERVIEW AND RESEARCH PROBLEM

1.1 INTRODUCTION

The world economy is experiencing rapid technological changes, which are caused by developments in information-communication technologies. These technological developments have resulted in the changing structures of firms and industries as well as in changing factory lay-outs and production processes (Singh, 1994:167).

The expansion of information and communication technologies, as well as the emergence of new technologies and the effects of globalisation, has altered production processes, which now demand new forms of skills to improve productivity in the workplace and to capitalise on technological innovations.

Furthermore, the effects of globalisation present the education and training system, particularly the vocational education and training (VET) system, with challenges in providing relevant skills to workers to enable them to be flexible and adaptable in the workplace. Ashton and Green (1996:69) assert that modern technologies demand higher skills levels from education and training. The above view is supported by Brown (2001:235) who argues that "prosperity and social justice depend on the creation of a highly skilled work force". These statements imply that the prosperity of any nation depends on the contributions of the education and training sector towards the economic competitiveness of a country.

In this context Marshall and Tucker (1992:xiii) argue that

> [t]he future now belongs to societies that organise themselves for learning. What we know and can do holds the key to economic progress just as command of natural resources once did. The prize will go to those countries that are organised as national learning systems, and where all institutions are organised to learn and to act on what they have learned.

Buhler (2001:1) posits that, due to the changing demands in the workplace, there is also a corresponding demand for new sets of skills, and the emphasis is on 'soft skills', which are generic in nature and are key to effective performance across all job categories. Fallows and Steven (2000:75) support the above assertion by arguing that due to the economic situations today, new graduates are not only expected to possess knowledge of an academic subject, but that it is equally important for students to gain those skills that will enhance their employment prospects. Cotton (2001:1) has reported that while employers are satisfied with the level of technical skills of new graduates, they have concerns with regard to their non-technical abilities.

The education and training sector are therefore faced with the challenge of responding to the ever-changing skills demands of the economy since many graduates leave the education sector without the required skills to succeed in the workplace (Zinser 2003:402). In addressing the skills mismatch, Richardson (2009:326) highlights the important role the vocational education and training system should play in matching the skills needed by employers against the skills offered by workers.

This study sought to identify which skills other than technical skills are considered important in the workplace and that Vocational Training Centre (VTC) graduates should therefore possess when entering the labour market in Namibia.

1.2 BACKGROUND TO THE STUDY

The background information for this study was determined by reviewing literature from previous research on those employability skills considered important in the workplace.

The concept 'employability' is a broad concept that implies a wide range of proficiencies needed by a person to function effectively in a modern world. McQuaid, Green and Danson (2005:191) argue that the concept 'employability' relates to both unemployed persons seeking work and those already employed seeking a better job with the current or a different employer. During the last two decades, there has been a shift in world economies from traditional occupations towards a more flexible labour market that has contributed to the change in the supply and demand of conditions for employment. This structural adjustment in the labour market has resulted in new jobs being created at the workplace, requiring new job entrants to possess new and different skills from those applied in former heavy industries (Danson, 2005:285). The researcher is of the view that people, be it in social contexts or in

the workplace, are confronted with daily challenges that affect their lives and, as such, should possess skills that will enable them to cope with such situational demands. The researcher therefore argues that if individuals possess a variety of skills, such individuals can become more employable in a changing working environment. In this regard Hillage and Pollard (1998:xi) define employability as

> the capability to move self-sufficiently within the labour market to realise potential through sustainable employment. For the individual, employability depends on the knowledge, skills and attitudes they possess, the way they use those assets and present them to employers and the context (e.g. personal circumstances and labour market environment) within which they work.

McQuaid and Lindsay (2005:201), citing the work of Gazier (1998a, 1998b, 2001), refer to initiative employability as the role of individuals to develop skills knowledge and attitudes that are transferable and enhance an individual's flexibility to move between job roles within the same organisation and to find a new job in another organisation. The focus here is for the individuals to find a secure, suitable and a sufficiently fulfilling job.

Danson (2005:288) asserts that due to the structural changes taking place in industries across sectors employers are now looking for skills other than technical skills based on traditional apprenticeships. Nowadays, the demand rather appears to be for 'soft' skills such as customer handling, oral communication, teamworking and problem-solving skills. In support of the above assertion, McQuaid (2006:411) contends that due to the structural changes of the labour market, especially the rise of service industries and use of information technology, there is a need for increased 'softer' skills such as communication skills even for entry-level jobs. McQuaid and Lindsay (2005:209–10) have identified various employability factors such as individual factors, personal circumstances and external factors which can contribute to the development of individuals' employability skills and thus help support successful employment. The total skills asset (human capital) an individual possesses could therefore make a worker more productive in the workplace, and result in higher earnings.

According to Ashton (2005:21), high skills economies that focus on higher value addition and more knowledge-intensive industries can afford to pay higher wages to their workers because of the workers' higher productivity. Green and Sakamoto (2001:64) see a high skills economy as

> an economy with a wide distribution of workskills where these are fully utilised to achieve high productivity across a wide range of sectors, at the same time producing high wage rates and relative income equality. A high level of workforce co-operation supported by civic trust and social capital is seen as an important part of the model.

The above arguments relate to the human capital theory that argues on the assumption that the more skills a worker possesses the higher the level of productivity at the workplace, which translates into higher wages. The human capital theory and the way in which it relates to this study are discussed in Section 1.6 in detail. It was the aim of this study to identify which skills other than technical skills are needed by Namibian employers from VTC graduates entering the labour market.

A wide range of terms is used synonymously to denote skills other than technical skills that are needed in the workplace. Gibb and Curtin (2004:8) identify the following terms: 'core skills', 'key skill's, 'essential skills', 'basic skills' and 'workplace know-how'. Another term used to denote non-technical abilities is 'employability skills'. Buck and Barrick (1987:29) define employability skills as "the attributes of employees, other than technical competence, that make them an asset to the employer". Given the aim of this study – to identify the type of skills that enable workers to be flexible and adaptable to demands that change in the workplace because of changing technologies – the concept 'employability skills' was used for the purpose of this study. The concept 'employability skills' is discussed further in the next chapter.

Employability skills education has become an important issue among employers and educational policymakers worldwide due to the changing demands of modern economies. A number of studies have emphasised the need for graduates from the education and training sector to possess employability skills because such skills are lacking in graduates entering the job market (Gray, 1991:27).

According to Gray (1991:27), an investigation by the American Society for Training and Development revealed that employers at that time needed different and more skills than ever before. They specifically required skills such as "learning how to learn and the ability to teach oneself". Stressing the importance of employability skills, Taylor (2001:11) points out that education, employment and production are intrinsically linked and, as such, "they must empower the labour force with the right mix of general, numerical, technical and vocational knowledge with appropriate systems to deliver new skills, attitudes and competencies". Hayward and Fernandez (2004:118) recommend the inclusion of generic skills in school,

college and university curricula because the demand for skills exceeds the supply from these institutions.

The Confederation of British Industry (1989:27) insists that:

> All training and vocational education should include the following common learning outcomes as core elements: values and integrity, effective communication, application of numbers, application of technology, understanding of work and the world, interpersonal skills, problem solving and positive attitude towards change.

The Second International Congress on Technical Vocational Education and Training held in South Korea in 1999 fully recognised the importance of reforming the VET sector to develop synergies between the education sectors and the industry and "to foster the development of generic competencies, work ethics, technological and entrepreneurial skills" (Hayward & Fernandez, 2004:118; James, 2002:175)

The importance of employability skills in the workplace is becoming an ever more important topic of debate among scholars who argue that employability skills education has never received the prominence necessary in the education and training system, seeing that such systems have failed to produce graduates with such desired skills (Taylor, 2000:11).

Taylor (2001:14) argues that a lack of employability skills in the workplace can cause a business to fail. The growing importance of employability skills in the workplace was also expressed during surveys conducted on business in the United States of America, where it was found that employability skills are not only key to effective performance across job categories, but also a prerequisite to adapt more easily to changing environments (Taylor, 2001:11).

It is in this context that the focus of this study is on employability skills that are not directly related to any one occupation, but that are directly linked to employees' performance in the workplace. The exploration included the question on how these skill elements should (and could) be addressed in reforming the VET curriculum.

1.3 PROBLEM STATEMENT

While the role of technical and vocational education and training in the economic growth of a nation cannot be over-emphasised, employers in Namibia claim that training at Vocational Training Centres (VTCs) is redundant and does not focus on modern technologies, in other words that VTCs are still training in outdated technologies (Naanda, 2001:54).

With regard to the situation in South Africa, for example, Horn (2006:113) argues that despite the improved Grade 12 final results over the past years, only between 5% and 7% of successful candidates find employment in the formal sector. He further argues that learners are ill equipped for the modern world of work, and he puts the blame entirely on the education system for not preparing learners with the skills required in the workplace. According to Kraak (2003a:12), the South African youth labour market, as an institutional subsystem, is characterised by severe challenges such as a mismatch between the "outputs of schooling, the options for further education and higher education or pre-employment training, and the actual employment opportunities available in the labour market". Kraak contends that the mismatch between education and the labour market has resulted in high unemployment among the youth. At the time of his research, it was estimated to be between 50% and 63% in the 15 to 24 age group. He argues that the reason for this contradiction was that the schooling system had grown over the past decade while the number of formal sector jobs for school-leavers had shrunk. Stasz (2001:385) found similar evidence and argued that schools were failing to impart those skills sought by employers. Davies (2000:436) made the same observation and contended that graduates seeking their first career jobs lacked the personal, transferable and employability skills required by employers.

The Windhoek Vocational Training Centre Report (2000:21) states that trainees lack skills, such as interpersonal skills, as well as correct work ethics. Awaseb (2001:14) raises similar concerns about learners, students and the Namibian youth. He argues that "they show little or no sense of moral excellence in their daily lives" and that "they are still ignorant about maintaining high moral standards and a well-balanced life". He further notes that "most of today's youth show little or no regard for values such a hard work, respect, commitment, honesty and responsibility" (Awaseb, 2001:14).

The assumption is that learners do not have the appropriate life skills required by society and the world of work. Orsmond (2002:224) points out that "learners nowadays have to deal with far more than their immediate worlds" and that they have to "cope with the demands and challenges of their global lives".

Garsten and Jacobsson (in Moreau & Leathwood, 2006:309) show that there has been a shift in the labour market to focus on the individual and their qualities to equip them for the 'knowledge-driven', increasingly competitive economy and to encourage them to take responsibility for their own employment/employability. The twenty-first century workplace demands workers who possess various skills — and not only technical skills — to be able to contribute to the productivity of the workplace.

The research was aimed at identifying the employability skills that VTC graduates entering the job market should possess and determining how to integrate such skills into the VET curriculum.

1.4 RESEARCH GOALS

Information addressing specific issues on employability skills education could not be found in Namibia, and it can be assumed that in the absence of such information no studies have been conducted on this topic in the country. The lack of such information hampers the development of employability skills for VET programmes in the country. The purpose of this study was to fill the information gap on employability skills development in Namibia and to make recommendations to Namibian policymakers on how employability skills could be integrated into the Namibian VET curriculum.

1.5 RESEARCH QUESTIONS

Creswell (2003:108) refers to research questions as statements used by investigators to focus on a particular study and to provide answers to such an investigation. The focus of this study was on providing answers to the following main research questions:

- Which employability skills are important in the workplace?
- Who is responsible for developing employability skills?
- How should employability skills be assessed?
- How can employability skills be integrated into the Namibian VET curriculum?

1.6 THEORETICAL FRAMEWORK

The human capital theory was used as a theoretical framework for the study. The rationale for adopting the human capital theory as a theoretical framework was that the study is concerned with employability skills required by employers from VTC graduates entering the workplace. Organisations are re-engineering their work processes due to emerging technologies at the workplace, and this demands advanced skills (Ajarimah, 2001:15). It was assumed in this study that employability skills make individuals flexible and adaptable to changing demands at the workplace, resulting in increased productivity at the workplace. Consequently, economic competitiveness improves and wages are increased.

At the core of human capital theory is the idea that humans, and more precisely, their stock of knowledge and skills, are an important production factor. This notion is similar to the idea that financial capital is required for production processes (Becker, 1964:10). As investments in human capital lead to specific returns (i.e. wages), people tend to invest in human capital. Accordingly, Van Loo and Rocco (2004:99) regard human capital as an "investment in skills and knowledge". Human capital can be defined as the stock of skills, knowledge, experiences and other characteristics that are relevant to performing in a job and thus in defining salaries. In this context, Hitt, Bierman, Shimizu and Kochhar (2001:14) as well as Brooks and Nafukho (2006:121) argue that human capital is a manifestation of a person's education, experience and identifiable skills, which translate to increased productivity and earnings. There is widespread evidence that a higher level of education (which is often used as a proxy to measure the level of knowledge or skills) also leads to higher returns: people with higher qualifications generally also earn higher wages (see Psacharopoulos 1994:1325, Psacharopoulos & Woodhall 1985:15). In the South African context, Marock (2008:8) argues that

> the willingness and capacity to participate and invest in time, money and energy in training to support the development of their human capital will depend on the expected return on this investment. This return relates to both a direct increase in earnings and to an improved labour market position.

The debate on human capital theory argues on the premise that investment in "knowledge, skills and know-how" of the workforce can significantly contribute to the productivity and economic growth of a nation (Brown 2001:5). Kleynhans (2006:55) supports this view by noting that "human capital can provide a country with a competitive edge that could lead to economic growth and enhance everyone's welfare". Hyslop-Margison and Graham

(2001:18) argue that the human capital theory begins with the assumption that training makes workers more productive. This translates into higher wages for the worker, increases profits to the entrepreneur and generally creates a productive society. Kleynhans (2006:55) asserts that human capital consists of those elements in humans that improve the quality of labour, such as “skills, knowledge and wisdom, which makes it worth more in the production process”.

In South Africa, the Department of Labour (2002:2) cited benefits at national, society and enterprise levels. These benefits could be derived from educated and skilled learners entering the labour market. At a national level, skills development contributes towards increasing the national income because of increased production, while at an enterprise level, skilled labour contributes by reducing production costs and increasing profitability levels (Daugherty, 1996:85; Oakland and Oakland, 1998:188). At the individual level, skills acquisition has advantages such as higher earnings and boosting individual morale, which results in better productivity. Learners entering the labour market without the required skills may secure low-paid jobs, face the consequence of retrenchments or simply remain unemployed.

Nafukho, Hairston and Brooks (2004:549) support the above statement by arguing that “investing in people through training and education has a direct and indirect impact on organisations, communities and societies at large. When looking at human capital, one can distinguish between general human capital (the ability to read and write) that can be applied in different contexts and specialized human capital (specialist knowledge in engineering) that is only relevant for a specific sector or firm (Bourdieu, 1986:46).

Rotundo and Sackett (2004:127) claim that “competitive pressures, globalisation and the changing technology are causing firms to re-evaluate the process of how work is done”. Mulcahy’s (2000:217) view is that “global economic and technological change requires workers to exhibit a broader range of skills in the workplace that makes employees flexible and adaptable in different environments”. Thus, due to the influence of external forces on work processes, workers should be helped to become agents of change and to be innovative at their workplaces. Conceicão and Akdere (2006:295) argue that the fast-changing workplace associated with new work methods is forcing employees to be flexible and adaptable. In this way, they become responsive to changing demands in the workplace and learn to cope with the challenges of acquiring new sets of skills in order to be up to date with technological changes.

The above-mentioned authors point out the implications of the economic transformation that requires employees to adapt their skills, knowledge and attitudes to make them flexible and adaptable in a changing environment. The above-mentioned authors, among others, have become increasingly aware that the workplace transformation is demanding new sets of skills, to which the education and training system should respond. Ashton and Green (1997:14) argue that the manifestation of global integration and technical changes at the workplace has made education and training very important in a competitive process. They further argue on the importance of determining how the education and training systems should be improved in raising skills levels of trainees to achieve greater prosperity. Kraak and Young (2005:6) call for a cross-sectoral policy co-ordination or 'joining up', arguing that educational reform should interlock with macroeconomic, industrial and labour market reforms so that their combined efforts could better meet the new conditions for global competitiveness. They further argue that such conditions could result in high quality manufacturing through a highly skilled and highly productive workforce and they point out that high-skills theorists place greater emphasis on the interdependence between education, industrial policies and the broader economy.

According to Kraak (2003b:662), the manifestation of the global economy over the past two decades means that individual states need to emphasise the value of high quality, high value added export-oriented manufacturing in order to achieve competitiveness. For this to be successful, there need to be higher participation rates in general education and the development of multi-functional capabilities. Kraak argues that multi-functional skills are broad capacities acquired in excess of current demand due to the changing nature of work organisations. This requires workers to possess additional capabilities to be able to shift into diverse enterprise activities.

Since employers demand employability skills from VET graduates entering the labour market, this study attempted to identify which employability skills are most important in the workplace. In research conducted by the OECD (2001:99) it was found that workers should be able to demonstrate "teamwork, the ability to cooperate in an unclear environment, problem solving, the capacity to deal with non-routine processes, the ability to handle decisions and responsibilities, communication skills and the capacity to see workplace developments in a wider context".

According to the human capital theory, productivity is enhanced at the workplace if an employee possesses the right skills. This leads to economic benefits and improved individual income. Brooks and Nafukho (2006:122) state that social capital and emotional

intelligence have the potential to influence an organisation's performance. Lin (2001:25) defines social capital as "the resources embedded in social networks accessed and used by actors … and [it] can also be envisioned as investment by individuals in their interpersonal relationships useful in the markets". Prusak and Cohen (2001:86) argue that businesses perform better when people in an organisation have a better trust relationship, work faster and smarter, teams are more productive and people learn more quickly and perform more creatively. In support of the above statement Coleman (1998:S101) states that social capital exists because of a relationship among persons which facilitates productive activity just as human capital does. Coleman (1998:S101) further argues that within a group that has "extensive trustworthiness and extensive trust is able to accomplish much more than a comparable group without that trustworthiness and trust". Therefore, one can argue that a relationship of trust within a group enhances openness among the group members, which then motivates them to work more effectively and productively as a team.

Salovey and Mayer (1990:189) define emotional intelligence as the "social intelligence that involves the ability to monitor one's own and others' feelings and emotions, to discriminate among them and use this information to guide one's thinking and actions". Dwyer (2001:316) contends that employment skills for the twenty-first century have a close relationship to the attributes of emotional intelligence. Employees should seize the opportunities that arise to promote emotional intelligence in the workplace and to foster harmony, productivity, innovative behaviour and team building. The researcher believes that if the emotions of others within a group are not considered, their feelings may be hurt and this may cause distrust, poor performance and diminishing productivity. Thus, it is important for group members to be sensitive to the feelings of other group member's for the sake of harmony and productivity of the team.

The above assertion argues that competences and technical skills are not the only factors that are relevant to enhancing productivity at the workplace. Social capital, emotional intelligence and non-technical skills (referred to as employability skills) are integral parts of human capital and are equally relevant in enhancing better relationships among workers that can lead to improved productivity. It can therefore be argued that the theory of human capital should not only be concerned with job-specific technical skills but should also be concerned with skills and competences as discussed above that make one flexible and adaptable in changing working environments.

Through focusing on the importance of employability skills as a crucial ingredient for improving overall workplace performance and productivity, a major criticism of human capital

theory is addressed. Critics argue that the return to education and the improvement in the level of wages are not due only to skills or knowledge imparted by education, but possibly also to social factors or superior ability (Dore, 1997:9). Indeed, employability skills are often not taken into account when looking at an individual's education. As was discussed above, they are, however, an important element influencing individuals' performance in the workplace. As this study demonstrates, formal education is still a major screening device used by employers. At the same time, the employers who participated in the study stated the importance of employability skills for overall performance in the workplace. A greater focus on developing employability skills is therefore crucial. One key question that has emanated from this discussion is how and where the investment in skills — including employability skills — does and should best occur.

Education and training represent a lifetime investment for individuals. Parents send their children to school expecting that the children will gain knowledge, skills and attitudes that will enable them to obtain well-paid employment, to live a meaningful life and to make a significant contribution to society. Hatch and Smith (2004:1) support this view, arguing that the main goal of education is to assist learners in acquiring the knowledge and skills needed to solve problems that will occur in life.

A major assumption of the theory of human capital is that human capital is obtained through education and training, and that the more education (years of schooling) a person has attained, combined with work experience, the higher the individual's productivity levels and consequently a higher income. A key research question of this study is to determine whose responsibility it is to develop employability skills and whether it is the responsibility of the education and training system, or whether it should be done outside the school system by families or at the workplace. This is closely linked to the question of the types of human capital and differences in the willingness to invest in them. One major issue is the fact that firms tend to invest less in general human capital as they incur the costs, but cannot be certain to reap all of the benefits of this investment as employees might switch to another employer where they can use the imparted human capital. Consequently, firms are more willing to invest in specialist skills or knowledge that is more difficult to transfer to other sectors or firms.

As employability skills are of a general nature (they are relevant across sectors and businesses), investments by firms tend to be low. The main responsibility for investing in employability skills lies with the individuals and within the public space. Thus, in order to develop the employability skills required in the workplace, it is fundamental that a quality

education and training system be put in place in each country. Steyn (2000:174) refers to quality as “those features of products and services which continuously meet or exceed customer needs and thereby provide satisfaction” and emphasises that "[c]ustomer satisfaction is a vital goal and is considered as the absolute test of an organisation’s effectiveness”.

According to Steyn (2000:174) and Edwards (2008:87), quality service in higher education should seek to meet the goals, needs, desires and interest of students and the broader community, and it is important that all “education processes contribute directly or indirectly to the quality as described by clients (students)”. Adopting Edwards’s definition of quality education, the researcher is of the view that the VET sector in Namibia should be designed in a manner that meets the employability skills demands of trainees at VTCs so that trainees can become employable when seeking jobs in the labour market or are sufficiently empowered to become self-employed.

This apparent importance of employability skills in the workplace prompted many governments of industrialised nations to contribute to the improvement of delivery of employability skills in their education and training systems. The researcher therefore argues that the education and training sector needs to play a significant role in the development of employability skills of trainees. For this reason, an integrated curriculum model for the development of employability skills was developed for this study. It will be introduced and discussed in detail in Chapter 7.

1.7 CLARIFICATION OF CONCEPTS

It is vital to clarify the underlying concepts used in this study. A number of concepts that have a direct bearing on this study and needed to be clarified within the context of this study are explained below.

1.7.1 Competencies

The Learning and Skills Council in England (2005a:174) defines competencies as “a collection of skills and abilities that allow the individual to successfully fulfil his/her role in the organisation”. They explain that no definition or agreed taxonomy of “soft skills exist as yet, because competencies consist of a wide range of skills”. Competencies “include a mix of

skills, experiences and personal attributes that enables someone to successfully fulfil a particular set of roles" (Learning and Skills Council, 2005a:174).

Competencies are nothing other than that set of knowledge, skills and attitudes that an individual possesses, be it technical or non-technical, and that will enable him or her to carry out specific tasks or responsibilities related to a specific job. A lack of competencies will hamper an individual in performing a task to a required performance standard. For example, if a person is employed in an organisation as a motor mechanic and lacks the competencies required from a motor mechanic, he will not be able to fix motor vehicle components.

In the context of this study, it can be argued that if a graduate from a VTC does not possess the technical abilities to fix a motor vehicle, or certain non-technical abilities such as working in a team, being able to solve problems, or being capable of communicating effectively, such a graduate may not be able to function in the broader context of the organisation.

1.7.2 Curriculum integration

The aim of this study was to determine the employability skills considered to be important in the workplace in Namibia and to integrate such skills in the Namibian VET curriculum. Curriculum integration is gaining world-wide attention in educational circles because of the teaching approach that is considered to be more applicable to real-life experiences of students (Ignatz, 2005:38). According to Beaver and Moore (2004:42), teachers rarely use one method in teaching a concept; instead, they use various approaches in a classroom situation to achieve their educational objectives.

Schoemaker (1989:5) defines curriculum integration as follows:

> [It is] education that is organised in such a way that it cuts across subject-matter lines, bringing together various aspects of the curriculum into meaningful associations to focus upon broad areas of the study. It views learning and teaching in a holistic way and reflects the real world, which is interactive.

It can be deduced from the above definition that curriculum integration is an approach in education that connects classroom learning and the educational needs of learners with real-life experiences. The curriculum should be relevant and meaningful to learners and should be geared towards solving real-life problems. In this regard, Lanning, Martin and Villeneuve-Smith (2008:2) contend that "employability skills are discrete set of skills and behaviours,

often packaged into qualifications that can be taught and assessed". From the above statement, it can be argued that employability skills should be part of the VET curricula and should be part of a formal qualification.

Parker (2005:452) explains that an integrated curriculum is

> a curriculum approach that purposefully draws together knowledge, perspectives and methods of inquiry from more than one discipline to develop a more powerful understanding of a central idea, issue, person or event. The purpose is not to eliminate the individual disciplines but to use them in combination.

The researcher regards an integrated curriculum as an approach that can be used to teach learners, using a combination of various subjects and real-life experiences to attain educational goals. Vocational Training Centres can use the integrated curriculum approach to transfer employability skills to learners using a combination of subjects in a real-life setting to address specific problems at a workplace.

1.7.3 Employability

The term 'employability' is associated with the likelihood that a person will gain employment and will remain in such employment for a considerable timespan in changing economic situations. Brown, Hesketh and Williams (2003:111) define employability as "the relative chance of acquiring and maintaining different kinds of employment". According to Berntson, Sverke and Marklund (2006:226) "human capital indicated by education, competence development and job tenure, has a positive relationship with perceived employability". They further contend that "employability represents a way for the individual to improve his or her attractiveness to the labour market".

Hillage and Pollard (1998:2) extend this definition by arguing that employability is an individual's ability to gain initial employment, maintain employment, move between roles in the same organisation, obtain new employment if need be and secure a suitably fulfilling job. Employability is considered to be the prospect for students to enhance their employment opportunities (Fallows & Steven, 2000:75).

In support of the above definition, Pool and Sewell (2007:280) observe the following: Employability is having a set of skills, knowledge, understanding and personal attributes that make a person more likely to choose and secure occupations in which they can be satisfied

and successful. De Grip, Van Loo and Sanders (2004:216) analysed the various definitions on employability they had found in the literature. They identified three aspects that are central to the concept 'employability', namely: employability is about employees who are *willing and able* to be as *pro-active* as possible – considering the organisational and institutional constraints – to remain attractive for *the labour market*. They therefore defines employability as

> the capacity and willingness of workers to remain attractive for the labour market (supply factors), by reacting to and anticipating changes in tasks and work environment (demand factors), facilitated by the human resource development instruments available to them (institutions).

The researcher defines employability as the individual's ability to obtain employment and remain in a job under changing labour circumstances. The above-mentioned definitions imply that an individual should be able to gain employment in any circumstances and stay in such a job, while having greater opportunities in changing roles, whether in the same working environment or somewhere else. The ability to maintain employment indirectly implies the ability to perform in the given work environment. This performance, on the other hand, depends, among other things, on the employee's skills. Those skills, which can be defined as employability skills, are explained in the next section.

1.7.4 Employability skills

Robinson (2000:1) defines employability skills as "those basic skills necessary for getting, keeping and doing well on a job". Hartshorn and Sear (2005:71) argue that employability skills are "the skills sets required to compete within an increasingly flexible labour market".

Overtoom (2000:2) defines employability skills as "transferable core skills groups that represent essential, functional and enabling knowledge, skills and attitudes required by the 21st century workplace … necessary for career success at all levels of employment and for all levels of education".

As it is evident nowadays that the workplace has changed in terms of production processes as well as in shifting from servicing-oriented towards more customer-oriented economies, the modern workplace requires new sets of skills from workers to enable employees to adapt to such workplace demands in any given occupation and to manage their own career opportunities.

Billing (2003:335) points out that employability skills are transferable and can be used in a variety of situations, while Hofstrand (1996:51) and Robinson (2000:1) posit that employability skills are basic and generic by nature and assist every person in entering the workforce. The above definitions refer to non-technical skills that can be applied across many different jobs or professions.

The researcher sees employability skills as those skills required by industry that make it easier to transition from school to work and that increase employment opportunities for high school graduates.

1.7.5 Vocational Education and Training

In this study, the term 'Vocational Education and Training' (VET) is used interchangeably with 'Technical and Vocational Education' (TVE) and 'Technical and Vocational Education and Training' (TVET). Gasskov (2000:60) defines vocational education and training as a system whereby "technical and technological instruction is offered to learners, supplemented with a range of academic subjects". According to Lauglo (1995:1), vocational education and training refers to "deliberate measures organised to bring about learning as preparation for a work task in designated occupations or clusters of different occupations, and are aimed at improving labour productivity". Both of these definitions refer to an organised intervention aimed at equipping learners with knowledge and specific technical skills for a given occupation. McGrath et al. (2006:89–90) argue that VET programmes are supposed to prepare learners for the world-of-work and such programmes require that relevant skills and knowledge be developed for current and future economic skills demands.

The Ministry of Labour and Manpower Development (1991:2) in Namibia defines vocational education and training in accordance with the definition of the International Labour Organisation (ILO):

> [It is] training designed to prepare, update or retrain persons for employment or self-employment in any branch of economic activity. It may be provided on-the-job or off-the-job or a combination of the two. In most cases it needs to be complemented with related studies, but the emphasis is on practical training.

The definition provided above is concerned with the knowledge and skills development of individuals for employment purposes in any given occupation, irrespective of the locality

where such an intervention is taking place. In this case, the training emphasis is on both technical and non-technical skills for employment purposes.

From the above definitions, it can be argued that vocational education and training are deliberate attempts to provide individuals with skills and competencies to enable them to execute specific tasks in an occupation, such as bricklaying, carpentry and auto-mechanics.

However, the definitions provided above do not go beyond skills and competencies required to manage daily life challenges that confront human beings because the emphasis is on practical skills. By implication, these definitions exclude provisions for non-technical skills because the emphasis is on practical skills. Concepts such as employability skills as well as curriculum integration, which are directly related to this study, are discussed in more detail in Chapter 2.

1.8 RESEARCH DESIGN AND METHODOLOGY

This section outlines the research design and methodology used for the study. The ethical considerations maintained throughout the research process, as well as the delimitation of the study, are further discussed.

1.8.1 Research design

Mouton (1996:107) defines a research design as “a set of guidelines and instructions to be followed in addressing the research problem”, while Bak (2004:2) argues that a research design is the procedures followed by a researcher to answer a research problem or to test a hypothesis.

Bieger and Gerlach (1996:49) define research design as a procedure used by researchers “to answer the research question or the research hypothesis with a high degree of confidence”. The research design thus indicates the steps the researcher follows in providing answers to the research problem under investigation. The research design includes the methods used in collecting and analysing data. The research design adopted for this study is a survey using mixed method consisting of interviews and questionnaires (triangulation). This method is discussed in more detail in Chapter 4.

1.8.2 Methodology

The methods used for collecting and analysing data for this study were a combination of qualitative and quantitative approaches. Mouton (1996:39) explains that in social research, qualitative and quantitative research methods can be applied simultaneously to improve on the quality of research being conducted.

Qualitative researchers "try to understand the ways in which different individuals make sense of their lives and to describe those meanings" in words. Quantitative research aims at testing theories, determining facts, statistical analysis, demonstrating relationships between variables and predicting findings (Van der Merwe, 1996:283).

The researcher adopted the descriptive research approach as opposed to exploratory research and experimental and quasi-experimental research approaches. Descriptive research was used in measuring the attitudes of respondents and in determining respondents' perceptions about the employability skills expected from VTC graduates entering the job market.

1.8.2.1 Data collection and analysis

Data for this study were collected through the administration of a questionnaire that consisted of both closed and open-ended questions, as well as face-to-face interviews. The data collected during the research were analysed by means of qualitative and quantitative methods. In the qualitative approach, emphasis is placed on descriptive data, while in the quantitative approach emphasis is placed on numerical data using statistical analysis (Muijs, 2004:6).

Computerised statistical software, Statistica 7, was used for the statistical analysis of the research results.

1.8.3 Population sample

The population for this study was employers who provide on-the-job training or who employ VTC graduates in the Namibian labour market. Bless and Higson-Smith (1995:85) define a population as "a set of objects or group of people under investigation during a research process". In identifying the population for this study, the researcher obtained a list of employers who provide on-the-job training or who employ VTC graduates from the Namibia

Institute of Mining and Technology (NIMT), the Windhoek Vocational Training Centre (WVTC) as well as the Directorate of Vocational Education and Training (DVET) in the Ministry of Higher Education, Vocational Training Science and Technology. Although the researcher attempted to obtain employer data from institutions such as the Rundu Vocational Training Centre, Okakarara Vocational Training Centre, Zambezi Vocational Training Centre and Valombola Vocational Training Centre, no such information could be made available. The researcher thus assumed that no employer data were available at the latter centres and relied on the lists obtained from NIMT, WVTC and DVET, which entailed a population of 493 employer representatives.

1.8.4 Research validity and reliability

Bernard (2000:46) refers to validity as the accuracy and trustworthiness of instruments, data and findings in research. Babbie and Mouton (2001:122) explain that validity is "the extent to which an empirical measure adequately reflects the real meaning of the concept under consideration".

Reliability refers to the consistency of results obtained using the same instrument at different times (Flick, 1998:223). Bernard (2000:47) argues that reliability refers to "whether or not you get the same answers by using an instrument to measure something more than once". Kane and O' Reilly-de Brún (2001:121) posit that reliability concerns accuracy and precision of the measuring instrument used in the research process. In other words, the instruments should provide the same answers if the instrument is administered at different intervals.

In order to identify the employability skills required by employers to be integrated in the VET curriculum, the researcher ensured that the conclusions derived from the study were valid and reliable. Reliability and validity were maintained in the study by ensuring that the data-gathering instruments were of a high quality and that they would measure what was required for the study. The questionnaire used for collecting data was first piloted on a selected group of employers, who were not part of the target population of this study, to determine its validity and reliability.

1.8.5 Triangulation

In order to validate the overall research results, conclusions were based on a variety of sources (triangulation). Terre Blance and Kelly (2004:128) says that triangulation "entails collecting material in as many different ways and from as many diverse sources as possible".

Apart from using results derived from the survey questionnaire and face-to-face interviews, data were also collected through a review of the literature.

A detailed account of the methodology followed in this study is presented in Chapter Four.

1.9 ETHICAL CONSIDERATIONS

According to Struwig and Stead (2003:66), research ethics provides moral guidelines to researchers on how to conduct research, thus helping researchers to avoid scientific misconduct such as distorting and inventing data, plagiarism, publishing other researchers' work as their own contribution without acknowledging the source, failing to maintain anonymity and confidentiality to the respondents, and falsely reporting results.

The researcher maintained a high level of ethics in line with the research code of conduct throughout this study. This was done through acknowledging sources used throughout this study, not distorting facts, avoiding plagiarism and not disclosing respondents to any other third party (Mouton, 1996:157).

1.10 DELIMITATION OF THE STUDY

According to Best and Kahn (1989:38), delimitation is the "boundaries of the study" in terms of which a researcher could confine the investigation and from which he or she could draw conclusions for the study.

While Namibia has 13 political regions, the study was only conducted in the four regions where the majority of employers providing on-the-job training or employing VTC graduates are situated, namely Khomas, Erongo, Otjozondjupa and Oshana (see Appendix A: Map of Namibia). The regions for this study were selected from the list of employers as discussed in paragraph 1.8.3.

The study focused on formally registered businesses only and excluded the informal sector. A simplistic definition of formal businesses offered by Statistics South Africa (1998:14) is that these include all businesses that are registered. According to Horn (2006:113), formal businesses are considered to be formally organised, regulated and registered enterprises.

Informal businesses are not officially recognised and are in most cases engaged in illegal activities and do not pay taxes (Mohr & Fourie 2004:345). Statistics South Africa (2003:xiii) refers to the informal sector as consisting of "unregistered businesses, run from homes, street pavements or other informal arrangements". In South Africa, informal businesses are not registered with the South African Revenue Services (SARS) for tax purposes (McGrath, 2005:112).

The list of employers obtained could not provide full details of some of the businesses, such as postal addresses, telephone numbers or the locality from where they operate, and the researcher assumed that such businesses were informal and thus excluded them from the study.

1.11 RESEARCH OUTLINE

In **Chapter One** of this study, the research overview and problem statement are presented to provide insights on the proposed research. Research goals and questions, a theoretical framework, clarification of concepts, research design and methodology as well as ethical considerations are also discussed.

Chapter Two focuses on the literature review with the aim of providing an international perspective on the importance of employability skills in the workplace.

Chapter Three presents a comparative perspective on the development of employability skills, with particular emphasis on developed and developing countries.

Chapter Four describes the research design and outlines the research methodology followed in terms of the design, instruments, sampling, data collection and methods of data analysis.

Chapter Five provides a descriptive account of the research results.

Chapter Six presents an analytical account of the research result findings.

Chapter Seven, the concluding chapter, presents a synthesis of all the chapters, as well as conclusions and recommendations based on the findings of the study.

1.12 SUMMARY

This chapter provided background information on why the suggested study is useful. The importance of employability skills in the workplace due to structural changes in the economy was discussed.

It was argued that the work processes in the workplace are being reorganised due to new technologies being introduced in the workplace, resulting in the demand for new sets of skills from graduates entering the job market. It was reported that employers need workers who possess not only technical skills but also non-technical skills, which is the focus of this study.

The next chapter presents a review of relevant literature to provide more insight into the topic under discussion.

CHAPTER TWO

INTERNATIONAL PERSPECTIVES ON THE IMPORTANCE OF EMPLOYABILITY SKILLS IN THE WORKPLACE

2.1 INTRODUCTION

This chapter focuses on the key drivers influencing the reform of the education and training sector to respond to new changing demands at the workplace. In this chapter, it is argued that the manifestation of globalisation, emerging new technologies, expansion of information communication technologies, changing structures of firms and industries as well as production processes demand new forms of skills other than technical skills.

While looking at these key drivers, the chapter analyses the concepts used in denoting skills that are not of a technical nature, but that can be used in various occupations. The current skills now in demand are invariably referred to as employability skills, core skills, generic skills, life skills, workplace know-how as well as transferable skills in various contexts.

Finally, the chapter provides the researcher with insights to responses of the main research questions of the study and how these relate to the broader context of similar studies conducted by other researchers in responding to employability skills development debates.

2.2 CONCEPTS AND TERMINOLOGIES USED FOR EMPLOYABILITY SKILLS

The debate on employability skills has been driven by individuals and employer groups, in order to highlight employers' responses about employability skills and the goals that need to be achieved by the education and training systems in transferring employability skills. The need exists for education and business to work together more productively and to learn from one another in this process of equipping the youth with employable skills (Curtis & McKenzie, 2001:vii).

There is a wide range of terms used synonymously to denote employability skills. Concepts such as 'employability skills', 'key or core skills', 'transferable skills' and 'personal skills'

express similar basic abilities, although they are used in different contexts (Kearns, 2001a:84). In New Zealand, employability skills are referred to as 'essential skills', while they are known as 'core skills' in the United Kingdom, and in Australia they are called 'key competencies' (Ramsey, 1997:25). Table 2.1 gives an indication of the international application of terminologies relating to employability skills used in various countries.

According to Curtis and Mckenzie (2001:vii), there is a lack of common understanding that is reflected in the language being used in different circles and forums regarding employability skills. Curtis and Mckenzie further argue that "adjectives such as core, key, generic and essential are variably used to preface nouns such as skills, competencies, capabilities and attributes". Kearns (2001a:85) posits that it would be desirable for an agreement to be reached on a common terminology for employability skills among stakeholders such as schools, vocational education and training, higher education, employers, individuals and communities.

TABLE 2.1 Concepts used for employability skills

Country	Framework
Australia	Key competencies
New Zealand	Essential skills
United States of America	Basic skills, necessary skills, workplace know-how
United Kingdom	Core skills, key skills, common skills
Australia	Key competencies, employability skills, generic skills
Canada	Employability skills
Singapore	Critical enabling skills training (CREST)
France	Transferable skills
Germany	Key qualifications
Switzerland	Trans-disciplinary goals
Denmark	Process independent qualifications

Source: National Centre for Vocational Education Research (2003:2)

It is evident that various countries, as reflected above, have identified specific employment-related generic skills, while others have placed emphasis on qualification frameworks and assessment approaches. These variations do not only reveal the use of parallel concepts, but also the fact that matching concepts are given different meanings in different national contexts (Kamarainen, 2002:25).

The literature consulted indicates that definitions of life, key or core skills, transferable skills and personal skills describe similar basic abilities, even although there are slight differences in terminology and emphasis. The emphasis is on non-technical skills that help individuals to enrich life in a meaningful way. Onstenk and Brown (2002:89) observe that core skills are considered entry-level skills for employment, which are "fundamental to many tasks and a whole range of occupations and to ground specific occupational skills".

In the context of this study, the term 'employability skills' is used to delineate the concept from other terms and to clarify the purpose of this study, namely to identify the employability skills required in the workplace.

2.2.1 Definition of employability skills

There has been growing consensus among researchers over the importance of employability skills in the workplace (Atkins, 1999:267; Butterwick & Benjamin, 2006:76; Lange & Gibbons-Wood, 2000:24; Payne, 2000:353; Robinson, 2000:1; Stasz, 2001:385)

The term 'employability skills' is used synonymously with concepts such as 'soft skills', 'key skills', 'key competencies', 'core competencies', 'transferable skills' and 'personal skills' to describe the skills underpinning competent performance in an occupation (Lange & Gibbons-Wood, 2000:24). Key developments in defining employability skills in the United Kingdom were similar to those in Australia. Initially, they were called 'core skills' and following their revision, 'key skills'. Employers in Australia have since added other skills and now refer to such skills as 'employability skills' (National Centre for Vocational Education Research, 2003:6). In the United Kingdom, key skills are defined as those skills relevant to a person's learning, career and personal life, with a strong emphasis on the application of such skills to employability.

The Australian Education Council Mayer Committee (1992:7) defines key competencies as "competencies essential for effective participation in emerging patterns of work and work organisations. They focus on the capacity to apply knowledge and skills in an integrated way in work situations". In this definition, emphasis is placed on those cognitive abilities essential for workers to be effective in the workplace due to the re-organisation of work processes.

The Australian Education Council Mayer Committee (1992:7) further asserts the following:

> Key competencies are generic in that they apply to work generally rather than being specific to work in particular occupations or industries. These characteristics mean that key competencies are not only essential for participation in work, but are also essential for effective participation in further education and in adult life more generally.

The emphasis of the above definition refer to abilities that relate both to work specifically and non-specifically to any given occupational discipline. Such abilities could just as well be used in other life contexts.

According to the Australian Government (2006b:8), employability skills are "non-technical skills and competencies which play a significant part in contributing to an individual's effectiveness and successful participation in the workplace". Greatbatch, Murphy, Wilmut, Macintosh and Tolley (2004:8) define employability skills as "transferable skills independent of the occupational sectors and organisation in which individuals work and [which] are perceived to contribute to an individual's overall employability by enhancing their capacity to adapt, learn and work independently". In support of the above, De Grip et. al (2004:214) put it that "transferable skills include social and relational skills that are not only important in obtaining a job, but also in keeping it and, eventually in moving on to the next job".

A narrow definition of employability skills presented by Fallows and Steven (2000:75) is that these are skills that enhance students' employment prospects. Employability skills are defined by the Australian Chamber of Commerce and Industry and the Business Council of Australia (2002:2–3) as "skills required not only to gain employment, but also to progress within an enterprise so as to achieve one's potential and contribute successfully to enterprise strategic directions". Cassidy (2006:508) is of the view that, because of the their relevance to professional functioning, non-technical skills are commonly referred to as employability skills, and include basic skills such as oral communication;, reading, writing and arithmetic;, higher-order thinking skills such as learning skills and strategies;, problem-solvingsolving, decision-making and affective skills;, and traits such as dependability and responsibility, positive attitude, interpersonal skills, teamwork, self-discipline, self-management and the ability to work without supervision.

The researcher sees employability skills as the skills required by industry that are not restricted to a given occupation and which make it easier to transition from school to work and which increase employment opportunities for high school graduates. The researcher is

of the view that, without employability skills, a person would find it difficult to cope in a changing work environment and would also have difficulties in retaining his or her job; thus increasing the unemployment prospects of such person.

2.2.2 Values, attitudes and motivation

Kearns (2001a:46) recognises the relevance of values, attitudes and motivation to economic success in the knowledge-based economy. Quisumbing (2001:3) points out the important role that vocational education and training should play in the provision of values, attitudes, modes of behaviour and ways of life needed to promote a culture of peace and democracy. Values, attitudes and motivation are considered just as relevant in a workplace as employability skills, because they are also in demand by employers (Dawe, 2002:70). Curtis and McKenzie (2001:41) assert that "values, attitudes and motivation are those personal and interpersonal attributes that are described in some schemes as soft skills". Curtis and McKenzie further identify the following personal attributes: "self-esteem, ethics, integrity and honesty, self-management, resourcefulness, initiative and accepting feedback". In Table 2.2, Turner (2002:58) lists attributes, skills and behaviours which are essential for the development of an entrepreneurial workforce.

TABLE 2.2 Attributes, skills and behaviours essential to an entrepreneurial workforce

Attributes	**Skills**	**Behaviours**
• self-confident • autonomous • achievement-oriented • versatile • dynamic • resourceful	• problem solving • creativity • persuasiveness • planning • negotiating • decision-making	• acting independently • actively seeking to achieve goals • flexibility in responding to challenges • coping with and enjoying uncertainty • taking risky actions in uncertain environments • persuading others • commitment to making things happen • opportunity-seeking • solving problems/conflict creatively

Source: Turner (2002:58)

'Attributes' is a term that refers to the "qualities or characteristics" inherent in a person or thing and comprises traits such as being self-confident, resourceful and versatile. 'Skill' is a

word that can be associated with an ability that has been acquired through training, and this could consist of skills such as problem solving, negotiating or planning. While behaviour is seen as an action or reaction to something, which could consist of acting independently, taking risky actions in uncertain environments or persuading others. The researcher found it useful for workers to demonstrate the above character traits to enable them to interact with peers in a workplace in the execution of their tasks and responsibilities.

Values, attitudes and motivation are described by the researcher as those universally accepted norms which include compassion, courage, courtesy, fairness, honesty, kindness, loyalty, perseverance, truthfulness, respect and responsibility. Vocational education and training programmes should aim at developing cognitive, affective and personal behaviours towards the holistic development of a person. Dawe (2002:70) is of the view that employers prefer to teach values, attitudes and personal attributes specific to their industry needs. However, teachers should be aware of values, attitudes and personal attributes needed by industry to assist students who are unemployed or who wish to be engaged in self-employed activities. Such an approach could result in the development of values and attitudes such as creativity and adaptability, productivity, quality and efficiency, patience and perseverance, loyalty and commitment, freedom and responsibility, accountability, a spirit of service, a future orientation and a genuine love for work (Quisumbing, 2001:3).

The emergence of globalisation has altered the nature of the workplace and has simultaneously affected the VET sector. It would therefore be required from the VET system to respond to the changing skills demands of the workplace.

2.3 THE IMPACT OF GLOBALISATION ON EMPLOYABILITY SKILLS

The importance of employability skills, particularly in the workplace, can no longer be ignored, especially in the context of the global economy.

Globalisation is defined by Friedman (2000:9) as follows:

> The inexorable integration of markets, nation-states and technologies to a degree never witnessed before – in a way that is enabling individuals, corporations and nation-states to reach around the world farther, faster, deeper and cheaper than ever before, and in a way that is enabling the world to reach in to individuals, corporations and nation-states farther, faster, deeper, cheaper than ever before.

In the context of globalisation, Ashton and Green (1996:71) are of the view that the world has become one trading place, while Stetar (2000:28) sees globalisation as "the increasing integration of world capital, knowledge and trade". According to the OECD (1994a:2), globalisation refers to an "evolving pattern of cross-border activities of firms, involving international investment, trade and collaboration for the purposes of product development, production and sourcing and marketing".

The researcher sees globalisation as a phenomenon that allows for the integration of world economies, thus permitting open trade and investment across nations. This convergence of economies came about as a result of different nations deregulating their policies and allowing the transfer of products and services across national borders. In the context of this study, globalisation was viewed in relation to the transfer of technology coupled with skills transfers across national borders.

Trends in economic reform, particularly in the context of the global economy, have placed emphasis on the need of the workforce to possess a set of skills that makes employees flexible and adaptable in a workplace (Mulcahy, 2000:506). During the mid-20th century, many world economies underwent major transformations from manufacturing economies to service- and technology-oriented economies. This transformation resulted in major shifts in the skills needed in the workplace (Barker, 2000:134). Butterwick and Benjamin (2006:78) are in agreement with Mulcahy, stating that "life and employability skills are a response to post-industrial revolution needs."

Stasz (2001:385) observes that, "Changes in the nature of work and the workplace in the post-industrial economy are transforming the kinds of knowledge, skills and attitudes needed for successful employment and work performances." The need for soft skills, sometimes referred to as 'key, generic skills' by employers, is also expressed by Buhler (2001:1), who argues that employers of the 21st century should be committed to soft skills. Meyer (2003:349) recognises the challenges that globalisation imposes on the workforce and notes that the effects of globalisation require workers to demonstrate knowledge and skills to function effectively in a globalised environment. The pressure of globalisation has put new demands on the education and training sector such that the education and training sector should adopt new forms of knowledge production. A central tenet of globalisation is the need for a highly skilled labour force that is able to use new technology and to add value to existing goods and services (Kraak, 2000:11). Kraak further argues that it is not only specialised skills that are in demand, but more well-rounded and diverse skill competencies are also in demand, and enterprises expect from the labour force to be adequately skilled to

adapt to unpredictable and volatile global product markets and rapid technological change. He further argues that such capabilities can only be offered by the education and training system.

The impact of technological advances and the nature of organisational changes in the workplace demand a higher level of skills than ever before, particularly skills in areas of information technology, problem solving and communication. Mulcahy (2000:217) points out that "global economic and technological change require workers to exhibit a broader range of skills in the workplace that make employees flexible and adaptable in different environments." Thus, workers should be assisted in becoming change agents and becoming innovative at their workplaces. In addition, Gelpi (1999:33) states that "the competencies of workers depend not just on technical knowledge and basic skills, but on attitudes, values and behavioural patterns as well as personality traits such as initiative, creativity, adaptability, responsiveness and problem-solving abilities." Brown (2001:1) supports this statement by noting that "global economic competitiveness rests on the knowledge and skills of the workforce." This argument has led to most developed countries developing policies to upgrade the skills of their workforces to ensure economic competitiveness.

The OECD (1994b:5) asserts that, if OECD economies are to foster the creation of high-skilled, high-wage jobs, lifelong learning must be a process that upgrades the skills and competences of workers. Therefore, education and training policies should be directed towards investing in the transition from school to work as well as in work-related skills, particularly for the least-qualified workers.

The new workplace is characterised by many complex, tactical and strategic tasks that require the assimilation of increasing amounts of new knowledge, personal thinking/application/problem-solving abilities, and high workloads with extremely variable content. Not only are employers confronted with the emergence of new skills demands in the workplace; policymakers are also confronted with the challenge of improving the skills of existing national workforces through education and training to ensure national competitiveness. The challenge now facing employers is to respond to new skills requirements in the workplace due to technological advancements, new working approaches and global competitiveness. The above challenges require new forms of skills and competencies from young people if they are to succeed in the work environment.

Global economic competitiveness depends on the knowledge and skills of the workers in the working environment. Therefore, organisations are seeking ways to develop the knowledge, skills and attitudes of their workers so that they can be more productive in the workplace. The researcher regards skills transformation and the acquisition of skills demanded by the 21st century business as vital for the success of a business as well as for employees to be able to secure employment across national borders.

Technological and organisational changes in the workplace are argued to be generating increased demands for higher-level skills and for particular skills in the area of information technology, problem solving and communication. The changes that have taken place in the workplace due to globalisation and emerging technologies have been highlighted in the United States of America's Secretary's Commission for Achieving Necessary Skills (SCANS) report (Department of Labour, 1991:3), saying that in the past the workplace was characterised by work that was routine, repetitive and organised along hierarchical lines, while in today's workplace, work is problem-oriented, flexible and organised in teams and characterised by flexible production processes, which are customised with decentralised control systems. Similarly, people are working in teams where authority is delegated to the workers (Department of Labour, 1991:3).

Sheehan (1998:317) observes the following: "With ever-increasing productivity in the production of goods, the balance of work activity is shifting rapidly from the production of goods to the provision of services needed by business and the community as a whole". Sheehan further recognises the implication of the shift in the dominat form of work and the devaluation of skills traditionally involved in the production of goods in favour of interpersonal and cognitive skills.

The demand for skills is driven by changing patterns in the demand for goods and services as well as changing ways in the production of goods and services that workers are employed to provide. In this regard, Kraak (2000:11) argues that the manifestation of globalisation has put demands on the education and training sector to produce a highly skilled labour force that can put in practice new technologies to add value to existing goods and services. Kraak further argues that it is not only specialised skills that are in demand, however, well- rounded and diverse skill competencies are required which will enable the labour force to adapt to unpredictable and volatile global product markets and rapid technological change. It can therefore be argued that the modern workplace is now more service-oriented and customer-focused, requiring workers to possess non-technical abilities to satisfy customer needs.

2.4 EMPLOYABILITY SKILLS NEEDED IN THE WORKPLACE

It is increasingly becoming evident that employability skills make it easier to obtain employment, to remain in it and to adapt easily to the changing demands of the labour market (Riordan & Rosas, 2003:91).

Employers today are looking for workers who are knowledgeable, who get along well with other people, who are able to work as part of a team, who are dependable and reliable, who are eager to learn and who have good written and oral communication skills. Levy and Murnane (2001:153) use the words 'competencies' and 'skills' synonymously and have identified the following six key competencies critical to economic success:

- basic reading and mathematics skills;
- the ability to communicate effectively;
- the organisation of work within firms;
- teamwork;
- familiarity with computers; and
- formal educational credentials.

Kelly (2001:227) has identified the following employability skills that make individuals flexible, adaptable and mobile in the labour market:

- communication;
- information technology;
- working with numbers;
- working with others;
- problem solving; and
- improving your own learning and performance.

According to Pretorius (2001:77), the skills sought by employers in the workplace include: proficiency in mathematics, computing, reading, writing and reasoning;, the ability to use resources and information constructively;, interpersonal skills;, the ability to understand systems and master technology, as well as the flexibility to cope with changes in the workplace.

In Australia, the focus with regard to key competencies is on the integrated application of knowledge and skills that are not specific to a particular occupation or profession and which can be utilised at a workplace or social environment. The Australian Chamber of Commerce

and Industry and the Business Council of Australia (2002:2–3) identify the following employability skills essential in the workplace:

- communication;
- teamwork;
- problem solving;
- initiative and enterprise;
- planning and organising;
- self-management;
- learning; and
- technology.

The importance of employability skills as opposed to specific skills is clearly underscored by the United States of America's Secretary's Commission for Achieving Necessary Skills (SCANS) report (Department of Labour 1991:22), which recommends specific competencies and skills required from someone entering the labour market. The SCANS Report (Department of Labour 1991:22) identified the following competencies and foundation skills which are essential for successful employment:

Competencies – effective workers can use these productively:

- resources – allocating time, money, material, space and staff;
- interpersonal skills – working in teams, teaching others, servicing customers, leading, negotiating and working well with people from culturally diverse backgrounds;
- information – acquiring and evaluating data, organising and maintaining files, interpreting and communicating, and using computers to process information;
- systems – understanding social, organisational and technological systems, monitoring and correcting performance, and designing or improving systems; and
- technology – selecting equipment and tools, applying technology to specific tasks and maintaining and troubleshooting technologies.

Foundation skills – here competence requires:

- basic skills – reading, writing, arithmetic and mathematics, speaking and listening;
- thinking skills – thinking creatively, making decisions, solving problems, seeing things in the mind's eye, knowing how to learn and reason; and
- personal qualities – individual responsibility, self-esteem, sociability, self-management and integrity.

According to Turner (2002:1), in the United Kingdom key skills are defined as "the generic and transferable skills that all people need to succeed in education and training and in the work and life in general". They comprise a list of skills similar to Australia's key competencies and are divided into a core set of three basic skills and three wider key skills:

The three basic skills that comprise a national Key Skills Qualification include:

- communication;
- numeracy or the application of numbers; and
- the use of information technology.

The three wider key skills are:

- working with others;
- improving own learning and performance; and
- problem solving.

Stasz (2001:386) identifies four broad types of skills which employers in the United States of America require from workers, and classifies them as follows:

- Foundational or cognitive skills – these are referred to as "academic skills", which can be acquired through formal education settings, and they are linked to specific subject areas such as English, science, mathematics and history.

- Basic works skills – these are generic skills, which include things like problem solving, communication and teamwork.

- Broad occupational/technical skills – these skills are job-related and can be acquired through training before entering a job.

- Job-related skills – overarching capabilities required for maximising organisational performance. The above skills are also referred to as "soft skills", and they can be associated with motivation, reliability, flexibility, willingness to learn and accepting responsibility for learning.

The OECD Project *Definition and Selection of Competencies: Theoretical and Conceptual Foundations (DeSeCo),* takes a very different approach to defining employability skills (Gilomen, 2000:5). The DeSeCo project aimed to establish a theoretical and conceptual

basis by involving academics and commissioning papers from philosophical, anthropological, economic, psychological and social perspectives. Approaches used by the DeSeCo project to identify and define generic skills were based on the opinions of informed community leaders. The project concluded that there are three very broad competencies, each of which can be broken down to provide a more extensive list of employability skills (Rychen, 2001:12).

These three competencies are:

- acting autonomously and reflectively;
- using tools interactively; and
- joining and functioning in socially heterogeneous groups.

The generic skills identified by the DeSeCo project are common to employability skills found in Australia, the United Kingdom and the United State of America. Table 2.3 below presents a comparative analysis of employability skills found in Australia, United Kingdom and the United States of America.

TABLE 2.3 Comparative table of employability skills by country

Australian Mayer key competencies	United Kingdom (NCVQ) core skills	United States (SCANS) workplace know-how
• Collecting, analysing and organising information	• Communication	• Information • Foundation skills • Basic skills
• Communicating ideas and information	• Communication • Personal skills • Improving own performance and learning	• Information • Foundation skills • Basic skills
• Planning and organising activities	• Personal skills • Improving own performance and learning	• Resources • Foundation skills • Personal abilities
• Working with others and in teams	• Personal skills • Working with others	• Interpersonal skills
• Using mathematical ideas and techniques	• Numeracy • Application of numbers	• Foundation skills • Basic skills
• Solving problems	• Problem solving	• Foundation skills • Thinking
• Using technology	• Information technology	• Technology systems

Source: Adapted from Werner (1995:38)

The findings on employability skills developed by the various countries studied above reveal common trends in the employability skills sought by employers in the respective countries. Employability skills such as problem solving, working in teams, managing information, numeracy, communication and using technology all feature as important in the workplace and represent those skills that employers require these from workers.

2.5 EDUCATION, TRAINING AND LIFELONG LEARNING IN FOSTERING EMPLOYABILITY SKILLS

This section attempts to discuss how education and training as well as lifelong learning could contribute to employability skills development. A discussion is presented on the transition from school to work as well as on how lifelong learning could contribute to employability skills development.

2.5.1 The role of education and training in the 21st century

The role that education and training institutions should play in this modern era is gaining significant prominence. Since the beginning of the 21st century, the world has been at the threshold of an information and micro-electronic revolution, ushering in new ways of living and working which, in turn, are making new demands on the education and training system (United Nations Educational Scientific and Cultural Organisation, 1990).

The technological revolution is having a profound effect on the structure and organisation of society, and the rate at which new technologies are adopted largely depends on the education and skills level of the workforce. Teichler (1999:285) argues that there is a growing consensus among experts on how the education and training sector should respond to the changing challenges of the world of work to prepare students for globalised economic environments.

Subotzky (2003:353) recognises the role the higher education system should play in South Africa in relation to human resource development, arguing that higher education should produce graduates equipped with an optimal mix of high-level knowledge, skills and generic competencies that are relevant to the country's priorities in an increasing knowledge-driven society. Supporting the same observation, Absalom (2000:6), quoting John Mutorwa, Minister of Basic Education, Education Sport and Culture in Namibia, states that "the challenge of education is to offer a school experience that will provide students with opportunities to develop the understanding, skills and attitudes necessary to become lifelong learners capable of identifying and solving problems and dealing effectively with change."

In this millennium, sustained competitiveness in the global economy will depend on technological or innovation-based strengths, such as the ability to apply new technology, to develop new products, to successfully access new markets, to incorporate best practices in the management of enterprises and to develop skills levels across the full spectrum of the labour force. Considering the challenges faced by the education and training sector, Green, Wolf and Leney (1999:1) make the following argument:

> Education and training are now high on the policy agendas of governments in all the advanced nations, both within and outside the European Union. This is not only because people have ever-increasing aspirations for learning and qualifications and because governments devote more resources to meeting these demands, it is also

> because education and training systems face a range of complex, and historically novel challenges.

In recognition of the challenges facing the TVE system, UNESCO (1999:61) recommends the following:

> The twenty-first century will bring a radically different economy and society with profound implications for technical and vocational education (TVE). TVE systems must adapt to these key features which include globalisation, an ever-changing technological scenario, the revolution in information and communications and the consequent rapid pace of social change.

UNESCO (1999:61) continues to argue:

> The implications of these transformations include the increased mobility of labour and capital, uneven impacts upon rich and poor, and emerging market economies in both rural and industrial sectors. The knowledge-based society which these changes are bringing offers exciting new modalities for education and training.

According to McGrath et al., (2010:1), educational providers across all levels are required to respond to the employability imperative. They further argue that public and higher education institutions have been encouraged to transform their curricula and pedagogies to become responsive to the manifestation of the rapid changes associated with the globalisation era. In this context, Kraak (2006:6) points out the necessity for integrating education, labour market and macroeconomic policies so that their combined impact can have a better chance of meeting new conditions of global competitiveness, which is the attainment of high-quality manufacturing through a highly skilled and productive workforce.

In support of the above arguments, Gleeson and Keep (2004:57) argue that employers desire that initial skills formation of their employees be transferred to the education system. The authors further contend that, from the educational perspective, employers' demand for vocational relevance, skills and experience be reciprocated in partnership between education, the state and employers. Lack of partnership between training providers and employers leaves the education system trying to offer learning situations and types of skills that are best developed in part within a workplace situation (Gleeson and Keep, 2004:57).

It is evident that failure to innovate, or more precisely to develop mechanisms that will aid the process of innovation, could be a significant barrier to the long-term competitiveness of any economy. Therefore, it is imperative that education and training systems be developed in such a manner that they are responsive to the increasing competitive global economic challenges that are confronting the modern workplace. For education and training to respond to the challenges of employability, there should be improved communication between employers and training providers to ensure that the training offered is relevant to both employers and employees alike, but also to challenge the attitudes and practices of employers (McQuaid et al., 2005: 192–3). Taking a similar position, Kruss (2004:674) further argues that "… the call for higher education to become more responsive to societal and economic needs, globally and in South Africa, is largely premised on the desirability of a more direct and closer relationship between higher education and economic development."

There is a need for a greater relationship between higher education and the labour market to ensure that "tacit skills, knowledge and attitudes formerly developed through work experience are an integral part of higher education programmes and curricula" (Kruss, 2004:673). Moreover, McGrath (2009:11) is of the view that employability should not just be something to be done to learners in response to what employers and governments want, but employability should rather be located in a dialogue between multiple stakeholders, including providers, learners and communities as well as businesses and government. In support of the above, Badroodien (2003b:66) argues for the importance of the Further Education and Training Colleges to move away from a reactive college approach to one which engages with South Africa's economic and developmental challenges and as such there is a need to foster partnerships with business, industry and community.

Fostering a relationship between employers and VTCs will enable employers to articulate employability skills they see relevant in producing highly skilled employees who are able to be responsive to global economic competitiveness. It could also be assumed that through such a partnership relationship, employers could afford trainees from VTCs the opportunity to develop employability skills in a real-life working situation. The researcher is of the view that if education and training systems are not able to respond to the increased global competitiveness by providing the required skills and knowledge to workers, this could lead to an economic, social and political catastrophe in a nation.

2.5.2 Teaching and learning implications of employability skills for vocational education and training providers

Human capital theorists place a great emphasis on the education and training sector to develop workers who are highly skilled possessing various skills that will make them productive at the workplace. For example, the challenge facing South Africa and other developing economies is the high unemployment levels and the fast growing informal economies that now necessitate interventions to assist individuals to develop skills and knowledge needed to enter the labour market parallel with economic development needed to expand employment (Unwin, 2004:244).

According to Kearns (2001b:3), "fostering employability skills requires active learning strategies in which learners take responsibility for their own learning so that they develop the attitude, habits and skills of motivated lifelong learners and the acquisition of employability skills becomes a lifelong process." Kearns has found many examples of good practice in countries such as Australia and the United Kingdom using strategies such as action learning, situated learning and project-based learning in transferring employability skills. Kearns concludes that the impact of new learning technologies is enhancing these opportunities, but learning strategies need to keep pace with technological changes.

De la Harpe, Radloff and Wyber (2000:234) are of the view that a teaching and learning process that reflects a teacher-centred and content-focused approach could be an obstacle to developing employability skills. In contrast, they argue that a student-centred and process-focused approach to teaching and learning could promote the development of employability skills. According to McGrath et al. (2010:14), there is a link between employability and quality teaching of employability skills, arguing that good teaching improves learners' employability. They further point out that there is an international drive by Further Education and Training Colleges moving away from the old views of vocational education content, as a combination of trade theory and practical skills development, towards one that highlights core skills and attitudes, job-seeking skills and a repackaged set of vocational skills and occupational/sectoral knowledge.

McGrath et al. (2010:51), in their case study of colleges in England and South Africa, found that youngsters in the colleges investigated are aware of the knowledge, skills and attitudes that promote employability, however, they seem not to have a sense of the social capital dimension of employability. The authors further argue that, in contrast, staff from the colleges investigated is "conscious of the need to balance human and social capital aspects

of employability promotion". Building social capital requires a partnership between VTCs and employers in the promotion of employability skills.

The researcher thus believes that students learn more effectively if the teaching and learning situation is interactive between the teacher and students, while students are afforded the opportunity to put in practice the content they have learnt. Thus, to ensure the transfer of employability skills at VTCs, teachers should adopt the learner-centred approach in teaching employability skills so that learners can take responsibility in developing skills that will facilitate their employment in the labour market.

2.5.3 Lifelong learning and employability skills development

The role of lifelong learning in this dynamic and ever-changing world due to globalisation and the emergence of new technologies should never be overlooked. Because of these phenomena, workers today are faced with many challenges in the workplace and are required to continue upgrading and updating their skills and competencies in order to remain productive in their places of work.

The success of nations in the 21st century will depend on each nation's ability to educate its citizens for the entire existence of their life. Lifelong learning thus comprises basic education, adult education, in-service training, formal and informal education and labour-market training (Borgir & Peltzer, 1999:54).

Lifelong learning is defined by the International Labour Organisation (2000:3) as a purposeful learning process that is "formal, non-formal or informal, as opposed to day-to-day learning that all people engage in throughout their lives". Aspin and Chapman (2001:1) asserts that lifelong learning is vital in developing skills and competencies of workers on a continuous basis due to rapid changing demands of new technologies and working processes taking place at a workplace.

One can therefore argue that lifelong learning signifies learning that takes place inside or outside traditional educational settings. The pace at which technology is changing in the workplace as demands for new sets of skills grow requires from workers that they learn continuously, irrespective of where such learning takes place. Lifelong learning should thus create adequate education and training opportunities for adults in a working environment to promote a learning culture so that individuals can gain the knowledge, skills and attitudes to fulfil their life aspirations.

2.5.4 Employability skills curriculum

This section explains the underlying reasons for continuously revising and updating school curricula to respond to the changing skills demands in the workplace.

While there is consensus among researchers on the importance of employability skills in the modern workplace, it is evident from the research that the process for preparing young adults for the world of work should take cognisance of the fact that the workplace is characterised by structural changes, globalisation, reorganised work processes, improved technology and an information revolution (Horn, 2006:127). Considering these external forces affecting the workplace, it is crucial that curricula at VTCs be reviewed on a continuous basis to take into consideration the skills demanded in the workplace.

Curriculum revisions should attempt to achieve goals such as modernising programmes to reflect service-oriented economies, improving skills and competencies and making the curriculum more hands-on, as well as to reflect the trends of the new economy such as e-business, global business and diversity (Academic Leader, 2004:2). According to McGrath et al. (2006:95), VET curricula is widely criticised because of outdatedness in terms of learning theory and lack of relevance to industry. They further argue that there has been growing acceptance in the Southern African Development Community (SADC) region to reform the VET curricula and to make it more responsive to the needs of industry as well as focusing on the promotion of graduates' employability across the region (McGrath et al. 2006:96).

Academic Leader (2004:2) further points to the need for educators to reassess their curricula to ensure that their curricula adequately address both employers' and students' employability skills needs. Considering the above arguments, it can be stated that the curricula should be periodically reviewed to take account of the changes taking place in the workplace and impacting on the education system to ensure that the education system is not imparting outdated and irrelevant skills and competencies to students entering the world of work.

According to McBee (2000:254), one way of enhancing learning and achieving educational goals is adopting and implementing the integrated curriculum approach in an educational institution. De la Harpe et al. (2000:233) argue that skills are best developed when they are integrated across the curriculum and students are afforded the opportunity to develop higher levels of skills as they progress through the course. According to Venville, Wallace, Rennie and Malone (1998:300) "curriculum integration is not an end in itself but a means of

achieving basic educational goals". Curriculum integration is further discussed in (Section 2.6).

Osteneck (2002:140) reports that employers should play an integral role in the development of vocational education and training curricula to ensure that the VTCs' curricula meet employers' skills demands. The role of education systems is to identify employability skills as required by employers and to teach such skills (McGrath et al. 2010:13). They further support the assumption of many policymakers who argue that a better relationship between colleges and employers improves learners' employability. The need for improved communication between training providers and employers has been cited by McQuaid et al. (2005:192–3) who point out that such a relationship ensures that training being offered by the training providers is relevant to both employers and employees.

2.5.5 Developing employability skills

This section looks at how employability skills could be developed in the context of this study to prepare young adults for the world of work.

Despite the recognised importance of employability skills, De la Harpe et al. (2000:3) state that employability skills are rarely taught as undergraduate programmes, observing that "when such skills were taught they were offered on an ad hoc basis, stand alone, out of context, add-on and often designated as remedial and of limited value."

According to Poole and Zahn (1993:55), the need to teach employability skills is gaining credibility and recognition because non-technical employment competencies have not been receiving the required attention in the classroom. Poole and Zahn, citing the Secretary's Commission on Achieving Necessary Skills in the United States of America, further argue that the acquisition of employability skills must begin in the schools and be refined through on-the-job experience and further training. Zinser (2003:402) supports the above statement by pointing out that "employability skills should be taught in high school, since many students leave education without the requisite skills to succeed in the adult work world."

According to McGrath et al. (2010:10), it is not only a matter of developing skills and attitudes within the educational system. Employability skills need to be supported by job-seeking skills that are mostly developed by careers and employment services. The authors further argue that better working relationships between colleges and employers can improve learner employability (McGrath et al. (2010:15).

Although the school system should play an important role in the development of employability skills, Poole and Zahn (1993:59) are of the view that the development of employability skills should begin at home through effective parenting. On the other hand, Spille (1994:17) is of the view that workforce development should begin at school with a curriculum that provides teachers with the content outline of employability skills. Spille further argues that the development of employability skills should continue throughout workers' lifetimes with formal and informal curricula that refine employability skills in education and training activities, whether they are to be developed in schools, workplaces or at home.

In support of the literature that encourages employability skills development, Butterwick and Benjamin (2006:81) consider teachers to be the main educators in the employability curriculum, and they argue their roles should be complemented by role models and mentors. Butterwick and Benjamin (2006:81) further argue that role models are significant, in the sense that they help building links between school and the community and help students "apply the skills they are learning to real-life situations".

Atkins (1999:274) points out that graduates should be able to make a contribution to the workplace from day one because companies cannot afford the cost of training new entry-level employees in employability skills. Osteneck (2002:140) criticised the shortcomings of the education and training system, arguing that students have not developed employability skills and they are ill-prepared to enter the workplace, and, as such, employers have recognised the importance of teaching and developing employability skills.

Virgona, Waterhouse, Sefton and Sanguinetti (2003:33) ranked the most important sources of developing employability skills in the following order: home/family/community, school, formal courses (post-school), workplace and experience/self-taught. This finding is contradictory to the assertion by the other researchers discussed above, who argue that the school system should be responsible for developing employability skills.

The researcher is of the view that employability skills development should be the responsibility of the school system. The school system is better equipped with resources to develop the employability skills, as opposed to transferring this responsibility to the parents who may not have the necessary expertise and resources to develop employability skills in their children. Teachers should be trained in such a way so as to develop the skills required by employers, while parents and experienced workers in the workplace should act as role

models for learners and support the education and training system in developing employability skills.

2.5.6 Employability skills assessment

This section provides an explanation on how employability skills could be assessed in response to one of the main research questions: How should employability skills be assessed?

It is apparent from Fallows and Steven (2000:75) and Tariq, Scott, Lee and Ryles (2004:78) that the education and training system should provide opportunities for students to develop employability skills. A question raised in this study is how employability skills should be assessed. Edwards (2000:88) defines assessment as the "process by which academics make judgements on how well learning has occurred". Heywood (2000:13) defines assessment as a multi-dimensional process of judging students in practice, and he makes use of different forms of assessment (Jovanovic & Latief, 2006:234).

Tariq et al. (2004:78) argue that "assessment provides evidence that the students have achieved the standards of proficiency required and have therefore met the learning outcomes." Therefore, students who have developed employability skills should demonstrate competence in the skills that they have acquired during the formal schooling system. The development of employability skills must be assessed to determine the extent to which the students have developed employability skills. Gopal and Stears (2007:17) argue that assessment is one of the most powerful influences on what and how teachers teach and what and how learners learn.

According to Jovanovic and Latief (2006:234), the assessment choice is dependent on the desired outcome of learning. The following assessment approaches are suggested in assessing employability skills: development of portfolios, utilisation of logbooks, case studies, written assessment, role plays, simulation, working in groups and using information technology (Australian Government, 2006b:50).

According to Virgona et al. (2003:56), results of written assessment and submission of portfolios could provide evidence on a person's employability skills profile. The use of portfolios by students can help them keep record of the skills they have learned over a period of time and to showcase to employers the skills they have developed over a period of time. De la Harpe et al. (2000:234) argue that the use of learning portfolios is a good way of

assessing skills development. A portfolio, according to Paulson, Paulson and Meyer (1991:60), is "a purposeful collection of student work that exhibits the student's efforts, progress and achievements in one or more areas".

In developing assessment approaches, cognisance must be taken of the fact that assessments can be conducted anywhere at places such as the workplace, classroom or through flexible approaches (Australian Government, 2006b:48)

2.6 CURRICULUM INTEGRATION IN PERSPECTIVE

This section attempts to provide insights on how employability skills can be integrated in the Namibian VET curriculum based on the findings of the empirical study conducted in response to one of the main research questions.

The aims of an education and training system are to impart knowledge, skills and attitudes that will enable learners to contribute meaningfully to the socio-economic development of a nation. While the objectives of an education and training system are clearly defined in a school curriculum, teachers are still confronted with the challenge of creating a stimulating learning environment for learners to relate their learning experience to real-life experiences.

Hahs (1999:197) and O'Reilly (1994:38) highlight the difficulties students experience in dealing with real-world problems because of their narrow understanding and appreciation of the business world, which requires a multidisciplinary view. Schatz (1997:679) points to the lack of integration, and argues that it is the result of courses and instructors who concentrate on their specialised knowledge areas. In addressing the above shortcoming, Vars (1991:14) argues that educators are "seeking ways to help students make sense out of the multitude of life's experiences and the bits and pieces of knowledge being taught in the typical splintered, over-departmentalised school curriculum".

Oates, Bresciani and Clemantine (2002:81) contend that "integrated delivery of key skills refers to the extent to which the key skills units are built into programmes of learning and assessment dedicated to specific work operations". Oates et al. further argue that non-integration approaches are those where the skills are learned or assessed in a stand-alone fashion with little or no reference to specific settings in which the learner will be using the skills."

Druger (2002:281) is therefore of the opinion that well-designed, integrated curriculum units provide a meaningful context for knowledge and skills with a balance of content and process. Providing students with opportunities to make connections with past and present real-life experiences and to deal with issues in a holistic manner enables students to retain knowledge, develop higher-order thinking skills and achieve a deeper understanding of their subject matter. Sellin (2003:31) calls for imaginative ways of integrating knowledge acquisition, problem-solving and key-skills development in work-related activities that would be relevant to the workplace and meaningful for the learner.

An integrated curriculum approach by design is a method used to transfer knowledge, skills and attitudes using a combination of subjects to attain educational goals. It can be argued that curriculum integration as an approach to teaching and learning can be used by the VTCs to impart employability skills to trainees using various teaching strategies through a combination of various subjects and projects.

This approach should endeavour to relate the learning process to a real-life situation, particularly in the context of developing the employability skills of learners. The failure of non-integrated approaches was observed by Oates et al. (2002:81) who argue that: "learners fail to make the link between key skills such as communication and the specific settings in which they communicate within work."

The researcher is of the view that adopting and implementing an integrated curriculum model into the Namibian VET system would enhance the development of employability skills of trainees at VTCs. In the context of this study, it would be desirable for the teaching of non-technical skills to be integrated with the transfer of technical skills by simulating a real-life experience.

2.6.1 The relevance of curriculum integration

An integrated curriculum is viewed as an effective method of teaching because of the numerous benefits associated with this teaching approach (Hatch & Smith, 2004:43). Hatch and Smith further claim that an integrated curriculum adds more relevance to the subject being taught. McBee (2000:258) supports Hatch and Smith, noting that curriculum integration facilitates making a "connection between skills, content and life itself".

According to McBee (2000:254) and Venville, Wallace, Rennie and Malone (2000:24), students engaged in an integrated curriculum are more involved in the learning process and

are better motivated to learn than students learning in a discipline-based curriculum. They also contend that an integrated curriculum teaches students to work in teams and students become more involved and excited, while demonstrating less competition. Clark and Clark, cited by Venville et al. (2000:24), say that students are more involved and excited by demonstrating less competition in implementing an integrated curriculum.

Researchers such as McBee (2000:56), Hargreaves and Moore (2000:90) and Venville et al. (2000:25) have found that an integrated curriculum could lead to higher student achievement, students performed better in an integrated approach than peers who were enrolled in traditional separate-subject programmes of study. Integration has a positive effect on students' attitudes towards learning and their self-concept as well as increasing the relevance of classroom learning and making the curriculum more relevant to students' lives. Lanning, et al. (2008:4) points to the benefits of experiential learning which aims at making employability skills programmes of study relevant to the workplace with employer involvement as well as students engagement (personalisation). They further contend that there are benefits by embedding employability skills development across the learner's main programme of learning. As McGrath et al. (2010:49) put it, the focus of employability enhancement is to change the Further Education Training Colleges curricula and pedagogy to respond to the call for employability skills development.

Although curriculum integration was found to be a relevant and effective method of teaching, the effectiveness of integration relies on the expertise and knowledge of the teachers. It is evident from research that students' achievements are dependent on the teachers' ability to integrate content effectively across disciplines in a meaningful manner, and teachers must have expertise in integrative techniques (Beaver & Moore, 2004:45).

The researcher sees curriculum integration as a relevant approach to teaching employability skills to young people entering the workplace because adopting the curriculum integration approach in developing employability skills could assist young people in getting more involved in the learning process and thus resulting in learners' achieving of employability skills to a greater extent. To successfully integrate the learning content it would be necessary for teachers at VTCs to acquire the skills on how to integrate the learning content across different subjects.

2.6.2 Forms of curriculum integration

Venville et al. (1998:297) identify eleven forms of integration used in various schools they researched. They identified the following categories of integrated teaching approaches in their study: the thematic approach; cross-curricular approaches; technology-based projects; competitions; the school specialist approach; topic integration; integrated assignments; synchronised content and processes; local community projects; teaching approaches and natural/informal integration.

The thematic approach entails integrating various subjects into themes that need to be taught during the teaching and learning process. The thematic form of integration entails integrating more subjects such as trade theory, science, mathematics and practice during a teaching lesson. In this case, the instructor will use a complementary theme to integrate the curriculum. For example, an auto-mechanic instructor teaching trainees a module on the vehicle braking system will combine these three subjects into a theme such as brake failure and explain to trainees the causes of a brake failure and combining the above four subjects on how to avoid brake failure in a vehicle.

Cross-curricular approaches focus on integrating cross-curricular subjects to achieve given learning objectives during the learning and teaching process. An example would be the integration of computing whereby trainees use word processors for research assignments and computer-aided design programmes for the design of projects.

Technology-based projects are assigned to trainees to execute and to integrate various aspects of the learning content to complete the project. An example of this form of integration is providing trainees of the auto-mechanic trade with a technology-based project such as designing and producing an electrically son-powered vehicle. In this case, the trainees will have to conduct proper research to construct a vehicle to meet the above specifications.

Competitions means integrating the learning content in such a manner that learners compete during the teaching and learning process to realise educational objectives. The competition form of integration involves the design and construction of individual projects by learners to be entered into a competition with other learners. For example, the VTCs could run a competition to build a project such as an electronic data analyser to be entered into competition.

The school specialist approach relates to 'centres of excellence' whereby integration focuses on a particular area of expertise related to the learning content to be transferred to learners. An example of a school specialist form of integration is a school that has a particular focus such as marine studies and where subjects such as science, technology, social studies and physical education are integrated into marine studies.

Topic integration is an approach used in combining different topics in a subject in order to meet a certain learning outcome. This form of integration involves the integration of two subjects, such as trade theory and trade practice, into an integrated project on the world environment. An instructor of the joinery and cabinet-making trade, for example, teaches trainees a module on the different types of joints. In the trade theory subject the instructor teaches the trainees the different types of wood from which joints could be constructed. In this process, the instructor relates the theoretical content to the environment where wood is planted and the process to be used in the joinery trade. The lesson also consists of a unit on how to take care of the environment.

There is need for the integration of learning content into assignments. Assignment integration takes place when the instructor provides the trainees with an assignment that integrates content from various subjects, which trainees have to complete within a specified timeframe and they will be expected to report their findings.

Synchronised content and processes allow the learning content and processes to be synchronised and to be taught at similar intervals. An instructor for example links geometry in mathematics and trigonometry problem-solving in trade practice and synchronises the teaching of the latter concepts by linking the ideas.

The local community projects approach involves the school in local community projects, thus integrating skills in a number of learning areas within the community. For example, this will involve a vocational training centre liaising with the local town council for the repair of a children’s play park in a particular suburb within the vicinity of the VTC. The VTC will, for example, investigate what should be repaired in the playpark and prepare a list of items to be procured by the local town council. The VTC will then constitute a team from various occupational trades such as joiner and cabinet making and the metal construction trades to repair the damage.

The learner-centred teaching approach is used in realising educational objectives. An example of this approach is utilising the learner-centred teaching strategy as much as

possible as a catalyst to integrate content and skills across learning areas. For example, the instructor wants to teach trainees a module on the failure of a TV to switch on. The instructor will provide the trainees with material on possible causes for power failure and will allow the trainees to identify the possible causes for TV power failure and rectify the problem.

Natural/informal integration just takes place naturally, such as when technology is promoted as a vital learning tool to extend and develop other subjects. For example, in the subject of technical drawing trainees may be using computer-aided design (CAD) software for drawing particular designs. In the fitting and turning trade trainees can then use CAD to design a metal component to be manufactured using various machines.

Hamilton, McFarland and Mirchandani (2000:122) identify other common models of integration such as "internship/cooperative education, live multi-disciplinary projects, guest speakers, multi-disciplinary tools, team teaching, multi-disciplinary case studies, new multi-disciplinary courses and course coordination through block scheduling".

2.7 SUMMARY

The purpose of conducting a literature review was briefly discussed in this chapter. It was stated that a literature review enables the researcher to analyse previous research conducted in a similar field of study with the aim of obtaining theoretical and empirical evidence that will enable the researcher to relate his or her own research to the existing literature.

A discussion was presented on prior research conducted on employability skills education to provide insights into the relevance of employability skills to the workplace. It was indicated that globalisation, accompanied with structural changes in the workplace, is now demanding new forms of cognitive and affective abilities. The literature review further revealed that today's workers are confronted with many challenges associated with emerging technologies and, as such, lifelong learning opportunities should be made available to workers to enable them to continuously improve their skills.

Approaches in developing and assessing employability were also presented and it was reported that an integrated curriculum approach could be a relevant and effective way of teaching employability skills.

A comparative study on selected VET systems in developed and developing countries, focusing particularly on the provisioning of employability skills development, will be presented in the next chapter.

CHAPTER THREE

A COMPARATIVE ANALYSIS OF EMPLOYABILITY SKILLS DEVELOPMENT IN SELECTED COUNTRIES

3.1 INTRODUCTION

This chapter focuses on a comparative study of the development of employability skills, particularly looking at developed and developing countries such as the United Kingdom (UK), the United States of America (USA), Australia, Botswana and Namibia. The scope of the study is restricted to the VET systems of these countries. The chapter looks at the key drivers influencing employability skills development, explores the approaches used to address employability skills by their respective VET systems and looks at the approaches followed by the selected countries in assessing employability skills. The analysis of this chapter will provide good lessons to Namibia in terms of the development and assessment of employability skills by the VET systems of the countries researched.

The UK, the USA and Australia were selected because of the considerable research conducted by their respective governments as well as employer organisations to address the employability skills requirements by employers in the workplace. Botswana is Namibia's neighbour and is facing similar economic, educational and training challenges. Botswana was selected to establish how employability skills are developed in that country and to compare the strategies implemented in addressing employability skills development with other countries researched in this study. The study further presents an overview on the provisioning of VET in Namibia to provide an understanding of the current initiatives of the VET sector, particularly looking at employability skills development. The next section looks at the key drivers influencing employability skills development in the selected countries.

3.2 KEY DRIVERS INFLUENCING EMPLOYABILITY SKILLS DEVELOPMENT IN THE SELECTED COUNTRIES

This section examines the key drivers that have influenced the development of employability skills in the selected countries.

As a result of the first industrial revolution that took place in the UK during the 19th century, the economy of the UK was primarily focused on manufacturing and industries until the 1980s. Since 1990, the UK economy has shifted towards a servicing industry, demanding different sets of skills from the labour force (Keating, Medrich, Volkoff & Perry, 2002:56). It is evident from the literature, as reported by the Learning and Skills Council (2005b:vii), that the structural changes in the UK economy and the labour market demand skills such as customer handling and information handling. The increased need for these skills reflects the overall economic changes of the UK economy and the accompanying need for new skill sets.

Similar to the UK, the economy of the USA has also shifted from manufacturing to a service-oriented industry, which also demands new forms of skills from the labour market (Barker, 2000:1). The shift from a manufacturing-based economy towards a service-oriented economy benefits those with the relevant education and skills that meet the demands of the workplace. A concern identified by business leaders in the USA was that high school graduates did not keep pace with workplace changes resulting in skills shortages. This skills shortage resulted in employers and policy makers looking at alternative skills required in the workplace (Ganzel, 2001:1; Overtoom, 2000:1; Robinson, & Garton, 2007:385).

Between 1996 and 2006, Australia had one of the most outstanding economies in the world resulting in a high-growth, low-inflation, low-interest rate economy with an efficient government sector, a flexible labour market and a very competitive business sector. Australia is one of the fastest growing trading economies in the world with a strong information communication technology infrastructure, innovative systems, business environment and a flexible labour market (Department of Foreign Affairs and Trade, 2006:1).

The emergence of new technologies, coupled with changing demands in the workplace necessitated the reform of the vocational education and training sector in Australia to respond to new skills demands. This reform called for industry involvement in the delivery of training as well as increased participation in training by various age groups in the country.

During the past three decades (1975–2005), Botswana was among the best-performing economies in the world, such that the government was able to transform the country's economy from one of the poorest in the world to a middle-income country boasting a high credit rating in Africa. Botswana is facing numerous challenges, among them HIV/Aids, poverty, inequality in in-come distribution, unemployment and the need to diversify its dependency on the diamond mining industry. These challenges necessitated the country to expand and refocus its skills development strategy (Akoojee, 2005:9). The Ninth National Development Plan (NDP9) linked to the country's Vision 2016 statement identified economic diversification, employment creation and poverty alleviation as key challenges to be addressed by the government. To meet the country's NDP9 goals it would be required that the country adequately develop its human resources (Government of the Republic of Botswana, 2003:268).

According to the government of the Republic of Botswana (2003:27) the economy of Botswana is undergoing a transition from an agro-economy to a formal-sector employment economy. In addition, the education levels of workers have improved over the years. As stated above, there is a need to diversify economic activities in Botswana, and to expand the private sector to create more employment opportunities, thus becoming globally competitive and efficient.

Namibia is rich in natural resources such as diamonds, copper, uranium, gold, lead, tin, silver, lithium, cadmium, zinc, salt, vanadium, natural gas and hydropower (Mabizela, 2005:81; Marope, 2005b:10). Another important sector contributing to export earnings is fishery. Although Namibia has arable land, it is estimated that in 1998 only 70 km^2 was irrigated, while nearly half the population is dependent mainly on subsistence farming, with manufacturing being the main contributor to secondary industries (Mabizela, 2005:82).

The Higher Education for Development Co-operation Report (1997:9) states that the fragmented and unequal education and training system contributed to factors such as a shortage of skilled labour to meet the needs of industry, inadequately trained technical teachers, lack of co-operation from government with the industry and lack of articulation within the formal education system.

From the above statement, it is evident that there was a need to reform the education and training sector to address the imbalances inherited from the previous education system and to make it responsive to the country's needs and its people.

In this context, Hultin-Crealius (1990:5) argues the following:

> There was a need in Namibia to develop a vocational education and training (VET) system, which is based on a unified non-discriminatory policy with public, and private sector VET schools and training centres offering flexible formal as well as non-formal course programmes of varying duration for teenagers and adults of both sexes depending on needs… There should be close co-operation between schools, labour market and employers… Curricula, teaching methods and examinations should be made relevant to the Namibian needs and not unduly based on foreign models.

The above statement implies that there was a need to reform the education system, to create diverse learning opportunities for learners across the spectrum and create employment opportunities for them in the economic sector. The implication is that the country would be able to produce sufficient skills to transform the economic growth of the country and thus make it competitive in the global economy. The next section analyses the policy reforms that impacted on the employability skills development in selected countries.

3.3 POLICY REFORMS INFLUENCING EMPLOYABILITY SKILLS DEVELOPMENT IN THE SELECTED COUNTRIES

This section explores the key policies that influenced the development of employability skills in the selected countries.

Key developments in defining generic skills (referred to as employability skills in the UK) have been similar to those in Australia. Initially, non-technical skills were referred to as core skills; following revision, they are now referred to as key skills. With the additions of other skills employers now refer to them as employability skills (National Centre for Vocational Education Research 2003:6). Both employer organisations and relevant government institutions such as the Department for Education and Skills (DfES) and the Department of Trade and Industry (DTI) underscore the importance of employability skills development. According to Turner (2002:5), the collaboration between DfES and DTI resulted in David Blunkett, Secretary of State for Education and Employment, to introduce 'Key Skills National Qualifications' which focus on effective communication, application of numbers and the use of information technology. Turner further points out that the British government policy papers such as the Lifelong-learning Green Paper highlighted the need for young people

and adults to develop certain skills at school, in the workplace or in life to enable individuals to develop and maintain their employability. In the UK, key skills are defined as those relevant to a person's learning, career and personal life, with a strong emphasis on their application to employability. According to Turner (2002:1), in the UK employability skills are defined "as the generic and transferable skills that all people need to succeed in education and training, work and life in general". Employability skills identified in the UK context needed in the workplace are presented in Section 2.4 of this study.

The Federal Government of the United States of America endorsed the Carl D. Perkins Vocational Technical Education Act of 1998 (referred to as Perkins III) to govern vocational education and technical training in the USA; however, each state has a responsibility to implement VET in its jurisdiction (Silverberg, Warner, Fong & Goodwin, 2004:2). Silverberg et al. (2004:12) further elaborate that Perkins III integrated academic and vocational education training in order to strengthen the academic content of vocational classes by helping students acquire employability skills as recommended by the Secretary's Commission on Achieving Necessary Skills (SCANS).

To address the skills gap, the US Federal Government became involved in addressing workforce issues and adopted two major policy guidelines in the early 1990s, which described the specific skills required for workers to be able to respond to the changing demands of the labour market. The policy framework encompassing the skills required by employers was named "What Work Requires of Schools" (Secretary's Commission on Achieving Necessary Skills [SCANS], 1991), better known as the SCANS Report. Employability skills identified in the USA as required by employers are reported in Section 2.4.

The debate on employability skills development in Australia started during the 1980s, and it was revitalised in the early 1990s because of industry-driven initiatives. The Australian Education Council Mayer Committee (1992:viii) advocated the development of employability skills in Australia, which led to a decision by the Mayer Committee in the late 1990s on employability skills impacting on educational policies.

Since 2002, the Mayer key competencies have been reformulated to employability skills to address shortcomings which the Mayer key competencies did not satisfy in terms of industry needs (Allen Consulting Group, 2006:14). In Australia, the focus on employability skills is the integrated application of knowledge and skills that are not specific to a particular

occupation or profession and can be utilised in any way, workplace or social environment. Employability skills required by employers are reported in Section 2.4.

Notwithstanding the challenges facing technical and vocational education and training (TVET) in Botswana, the government has acknowledged the need to reform the TVET system to make it responsive to the changing demands of the 21st century. In an attempt to reform the TVET system, a stakeholder group consisting of government, employers and workers' representatives was tasked to draft a National Policy on Vocational Education and Training (NPVET) aimed at integrating the different types of training offered by a comprehensive system of TVET.

The focus of the NPVET was to integrate the different types of vocational education and training programmes into a comprehensive and robust system (Government of the Republic of Botswana, 1997:10). The expectation was to afford the TVET system a comparable status to that of academic education in providing opportunities for further education. The NPVET identified the following objectives for the national technical vocational education and training system:

- the promotion and delivery of skills and technical training to out-of-school youth and adults commensurate with the demands of the formal sector standards as defined by commerce and industry and to contribute to the productive development of the informal sector;
- providing continuous education and training in anticipation of rapid technological changes;
- creating opportunities for out-of-school youth with basic school education to acquire skills for employment and self-employment; and
- increasing national productivity and the promotion of total training (such as development of knowledge, skills, positive work attitudes, quality consciousness and the belief in lifelong learning) and inspiring the youth and the labour force.

Amongst the TVET reform was the introduction of Botswana Technical Education Programme (BTEP) programmes aimed at equipping trainees with various skills, knowledge and understanding of the occupation as well as vital skills, mandatory key skills that one needs to succeed at work and in life. The Ministry of Education (2005c:1) identified the following mandatory key skills as outlined in the BTEP curriculum:

- communication;
- numeracy;
- entrepreneurship;
- personal and interpersonal skills; and
- information and communications technology.

According to the Ministry of Education (2005c:1), the BTEP programmes are offered in nine vocational areas, namely business, hairdressing and beauty therapy, building construction, hospitality and tourism, clothing design and textiles, information and communication technology, electrical and mechanical engineering, multi-media as well as agro-based occupations.

In 1994, the President of Namibia gazetted the National Vocational Training Act, No. 18 of 1994 (Republic of Namibia, 1994). This Act outlines the framework in which vocational training activities must be promoted, provided and co-ordinated in an independent Namibia. This Act substituted the Apprenticeship Ordinances of 1938 that regulated apprenticeship training prior to the independence of Namibia.

The legal documents governing VET activities in Namibia are the National Vocational Training Act (NVTA), 1994 (No. 18 of 1994) and its amended version of 1996 (Republic of Namibia 1994, 1996). The NVTA provides for the regulation of training of apprentices and vocational trainees and establishment of regulating bodies such as the Vocational Training Board and Trade Advisory Committees. It further regulates the establishment of vocational training standards and training schemes as well as a testing and certification body. It also provides for the registration of vocational training providers, a financing system, imposing training levies and other matters related to vocational training. The NVTA prescribes a 'tripartite approach' consisting of the state, employers and unions in the organisation of vocational training activities in Namibia (Republic of Namibia, 1994:2).

Significant progress has been made in publishing vocational training standards and training schemes. According to the Report of the Ministry of Higher Education, Vocational Training, Science and Technology (1996:34), twenty-five draft curricula for Technical trades were approved by the Vocational Training Board and implemented at VTCs. However, there seems to be serious confusion regarding the implementation of the standards and schemes. The Windhoek Vocational Training Centre and the Ministry of Higher Education, Vocational Training, Science and Technology confirms that there was a concern regarding the

uniformity and implementation of curricula and training standards by the various VTCs (Ministry of Higher Education, Vocational Training, Science and Technology 1996:42; Windhoek Vocational Training Centre, 1998:8).

The Presidential Commission on Education and Training (2000:58) found similar evidence and asserts that training at VTCs is not uniform. This is especially so in trades whose examination body is the National Training and Testing Centre. All this is brought about by the fact that there are no syllabi available especially in subjects like Mathematics, Science and Drawings.

A further analysis of the vocational training standards in Namibia reveals that although they outline the theoretical as well as the practical aspects of an occupation to be learned by trainees, they do not outline the employability skills to be developed by trainees at VTCs. Given the above analysis, it appears as if the VTC system does not cater for the development of employability skills in the country. Having discussed the policies that impact on employability skills development in the selected countries, the next section provides a review of the education and training system and how it addresses employability skills development in the selected countries.

3.4 STRUCTURE OF THE EDUCATION AND TRAINING SYSTEMS OF THE SELECTED COUNTRIES

This section analyse the education and training of the selected countries.

In the UK there is an effort to improve the education system to make the UK economy competitive with other member states of the OECD. One key driver in increasing the country's competitiveness identified by the government was to raise the skill levels of the citizens to "create a more flexible and productive workforce" (Learning and Skills Council, 2005a:7). The Department of Education and Skills in the UK is responsible for the implementation of lifelong learning in the country. The objective of the department is to build a competitive economy and an inclusive society (Department of Education and Skills, 2005:1).

The education system of the UK is divided into three stages, namely primary education, secondary education and further education. After attending five years of secondary

education students sit for a General Certificate of Secondary Education (GCSE), which enables students to leave secondary school with the option of further education at colleges such as vocational or technical courses (British Council, 2010). On completion of compulsory formal education in the UK at the age of 16, learners are awarded a General Certificate of Secondary Education, after which they have the option of entering into the youth training and apprenticeship programme, further education colleges, specialist schools or upper-secondary comprehensive grammar schools.

Further Education Colleges and private training providers as well as youth training and apprenticeship schemes offer formal, continuing vocational training within the National Qualification Framework. An apprenticeship scheme is a programme that offers employment and training opportunities, mostly to young school-leavers seeking employment opportunities in the labour market. Through an apprenticeship scheme, employers contract school-leavers for a specific time, depending on the training duration of the occupation in which the apprentice is to receive on-the-job training in the workplace as well as off-the-job training at a registered institution (Smith & Wilson 2003:12). During the apprenticeship contract, the apprentice usually receives a training wage which is usually below the minimum rate for a qualified employee doing comparable work (Cully & Curtain, 2001:205). Misko (2006:11) points out that during secondary schooling, learners are able to undertake vocational programmes related to industry needs such as tourism, manufacturing, business, engineering, social care, leisure and health. During such programmes, students are afforded the required work experience, skills and knowledge as well as a wider choice of subjects.

The USA has a well-structured public school system of which the higher education is mostly privately owned. Since the 1990s, there has been an attempt to reform public secondary schools in the USA to enable them to respond to the challenge of preparing students for the increasingly competitive skills marketplace.

Keating et al. (2002:157) identify the following strategies adopted in the reform process:

- integration of the academic and vocational curriculum to emphasise relationships among disciplines;
- technical preparatory programmes to prepare students for technical careers;
- block scheduling of courses to allow students enough time for laboratory or project-centred work, field trips or work-based learning;
- career majors programmes aimed at preparing students for the world of work;

- skills standards promoting knowledge and competencies required to perform successfully in a workplace; and
- skill certificates, to recognise portable industry credentials, demonstrating competency levels of individuals in a given occupation

In the USA students complete high school after 12 years of schooling. After completing year twelve or the twelfth grade at a secondary school, students are awarded a certificate called the high school diploma. Upon completion of high school, learners have the option to further their education at technical schools, community colleges, four-year colleges or at university. With a high school diploma students are eligible to enrol at any college or university for further education (USA Study Guide, 2007).

According to Silverberg et al. (2004:20), vocational training in the USA is offered in three main public school locations, namely:

- comprehensive high schools, the traditional American secondary institutions, which offer a wide range of academic and vocational courses;
- area vocational schools established in some states, offering occupational programmes that students attend for part of the day and return to comprehensive schools for core academic instructions; and
- full-time vocation schools, offering comprehensive academic preparation as well as offering various occupational programmes.

The post-secondary vocational, technical and education system includes various providers such as business and industry associations, unions and profit-generating institutions offering credit and non-credit courses. Vocational and technical education at the post-secondary level offers courses leading to associate degrees and sub-baccalaureate certificate programmes. Both four-year and less than four-year post-secondary institutions offer sub-baccalaureate vocational programmes. Public four-year institutions and public two-year institutions, sometimes called community colleges, offer sub-baccalaureate vocational programmes. Four-year institutions award bachelors or graduate degrees, while two-year institutions award associate degrees or certificates as their highest awards (Silverberg et al., 2004:120).

Apprenticeship training is a private concern offered by employers. The duration of apprenticeships varies between one and six years, and upon completion of the apprenticeship programme, apprentices receive an apprenticeship-completion certificate.

In Australia, the Federal Government together with Australian State territories are responsible for the administration of the education and training system. The Australian State territories are constitutionally empowered to regulate training in the respective states through the departments of education and statutory authorities. The Australian Government through the Department of Education, Science and Training, collaborates with the various stakeholders (State and Territory governments, parents, educators and other organisations) to enhance the quality of education (Australian Government, 2006a:7).

In Australia, VET focuses on the provision of skills needed by the labour market, thereby linking learning to work (Australian Government, 2006a:48). By law, training providers aspiring to offer VET training programmes as well as those offering nationally recognised qualifications are required to register as Registered Training Organisations with the relevant authority, the Australian National Training Authority. A key feature of the Australian national training system is that it is industry-led, competency-based, nationally-consistent and quality assured, and there are currently efforts underway in Australia to reform the national training system to make it demand-driven and responsive to the ever-changing needs of business and industry (Australian Government, 2006a:42).

After completing compulsory secondary schooling, students are issued with an upper or secondary certificate or VET certificate and they then have the choice to proceed to higher education or VET, join adult and community education centres or take up an apprenticeship programme. Technical and Further Education (TAFE) are the largest providers of VET programmes and are mainly owned and administered by state and territory governments (Australian Government, 2006a:55). In Australia, only registered training providers such as schools, TAFE Colleges or institutions working in close partnerships with registered training organisations can provide industry-specific training programmes leading to accredited vocational qualifications (Misko, 2006:31; OECD, 2003). Accredited training providers working in partnership with schools, technical and Further education Colleges as well as private training providers are registered to provide training in certain fields or occupational areas, while apprenticeships are offered in specific trade and craft occupations. Although there has been considerable criticism regarding apprenticeships or traineeships (Smith & Wilson, 2003:16), there are proponents that believe that such traineeships provide trainees with opportunities to enter the labour market and that such programmes are useful (Cully & Curtain, 2001:214).

In Botswana no uniform policy on VET exists and the system is fragmented and unequal in terms of quality. Government has recognised the need to transform the VET system to

make it more integrated, uniform and of better quality if the country is to respond to the changing demands of the 21st century. The Department of Vocational Education and Training under the Ministry of Education is responsible for overseeing VET activities in the country. The above reform process resulted in the establishment of the Botswana Training Authority (BOTA) under the Vocational Training Act No. 22 of 1998 (Botswana Training Authority, 2003:3). BOTA is made up of employers and employee representatives and is mandated to "coordinate vocational training activities in order to achieve better integration and harmonisation of the vocational training system" in the country (Botswana Training Authority, 2003:3).

After completing 13 years of junior secondary education (Form 5), learners are awarded a Junior Certificate of Secondary Education issued by the Ministry of Education. In continuing their education, learners have the choice to proceed to Senior Secondary Education, to take up VET programmes, or to pursue distance education and part-time studies. The two-year broad-based secondary curriculum provides learners with diversified subjects that include academic, technical as well as commercial subjects (Ministry of Education, 2005a:1).

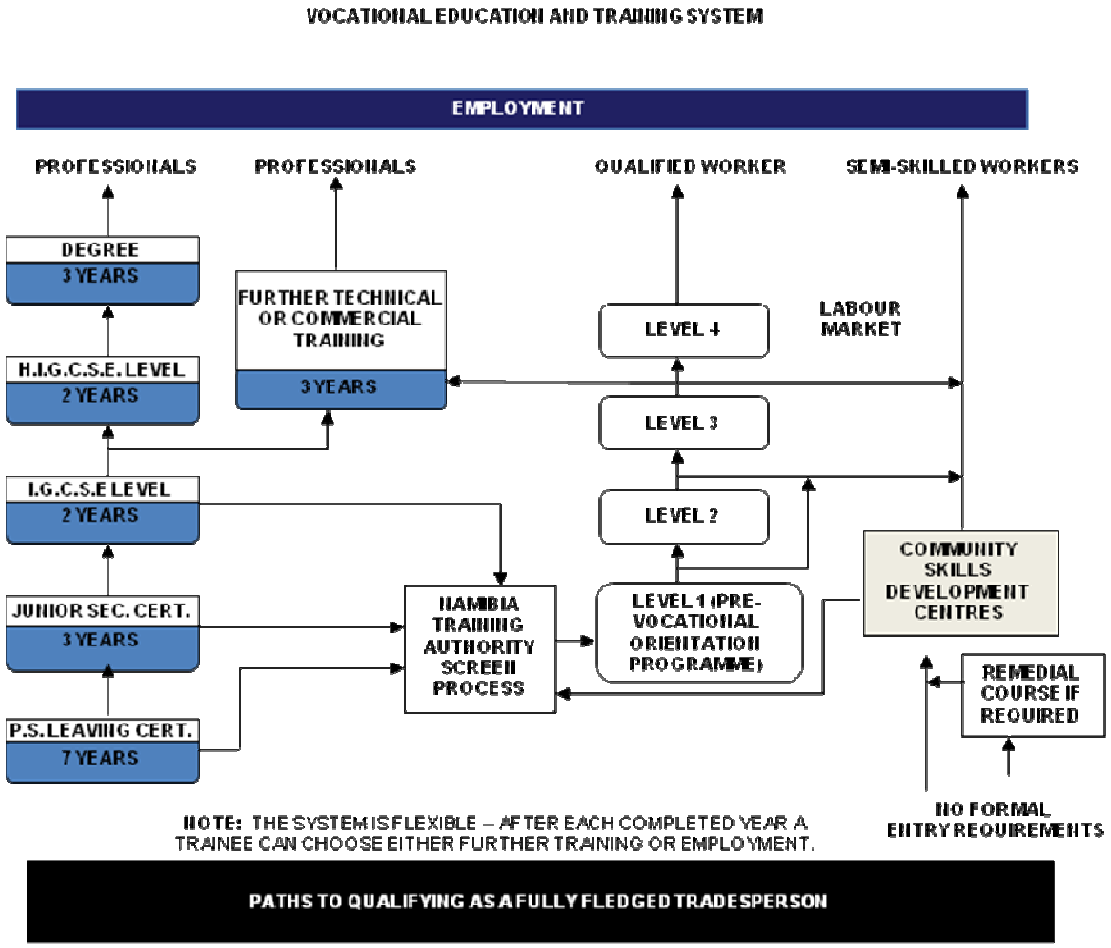
Institutions such as the University of Botswana, Technical Colleges (formerly known as Vocational Training Centres), Auto Trade Training Schools, Botswana Brigades, Private Training Institutions, the Botswana College of Agriculture and the Construction Industry Trust Fund offer vocational training programmes. The Department of Non-Formal Education in the Ministry of Education is responsible for providing lifelong education and training to the out-of-school population. The lifelong education programme is aimed at equipping adults with life skills through basic education and post-literacy programmes empowering adults to become more effective and competitive in a global village (Ministry of Education, 2005b:1).

In Namibia prior to 2005, two ministries were responsible for education and training, namely the Ministry of Education and Culture – responsible for basic and secondary education – and the Ministry of Higher Education, Vocational Training, Science and Technology – responsible for higher education and vocational training. During 2005 there was a restructuring of government ministries, where the President of Namibia dissolved the two ministries and established one ministry, namely the Ministry of Education, now responsible for education and training in the country (Republic of Namibia, 2005:4 & 7).

Johanson and Kukler (2003:22), Marope (2005a:49) and Sangari (1999:18) highlight some shortcomings of the VTCs, such as lack of uniformity in the VET system, which led to the establishment of the Namibia Training Authority (NTA) to oversee the management and

implementation of vocational education and training activities in the country (Republic of Namibia, 2008b:2).

Figure 3.1 below shows the education and training system of Namibia and its pathways.



Source: Amended leaflet, Ministry of Labour and Human Resource Development (1994)

FIGURE 3.1 Vocational Education and Training System of Namibia

The Namibian Government has adopted a 7:3:2 education system (seven years lower and upper primary, three years junior secondary and two years senior secondary). The Namibian Government has opted for an open-entry system to VET programmes which allows for recognition of prior learning and enhanced articulation between community training centres, schools, VET providers and institutions of higher learning (Ministry of Education, 2005e:6).

According to Wolf (2009), the Namibia Training Authority (NTA) is in the process of reviewing the VET qualification structures for levels 1 to 4 to cater for better skills development by the VET sector and to facilitate articulation between VET and tertiary institutions. Trainees who have opted for the vocational training stream can obtain fully-fledged craftsman status after completing either level 3 or 4 depending on the specific industry's requirements (Wolf, 2009).

Currently, there are 12 VTCs in Namibia of which six are managed by the Ministry of Education. The Ministry of Fisheries and Marine Resources manages the Namibia Fisheries Institute (NAMFI). The Namibia Institute of Mining and Technology (NIMT) in Erongo Oshikoto and the Karas region are private institutions. There is also a centre for people with disabilities, the Ehafo VTC, operated by the Office of the Prime Minister and the Kaiganaxab VTC, managed by the Ministry of Youth National Service, Sport and Culture. There are also Community Skills Development Centres (COSDECs) in five different locations offering non-formal short-term training for youth and adults (Republic of Namibia 2008a:140).

Vocational Training Centres offer courses such as auto-mechanics, boilermaking, welding, fitting and turning, joinery and cabinetmaking, air-conditioning and refrigeration, plumbing and pipefitting, radio and TV repair and electrical installation that lead to full-craftsman status, while COSDECs offer one-year bridging courses that lead to fulfilling the entry requirements of the formal VTC (Marope, 2005a:45–6; Naanda, 2001:34&40).

In addressing the shortcomings of the VET system, government adopted a new Vocational Education and Training Act (Act No. 18 of 2009) which provides for the establishment of a National Training Authority (NTA). According to the government of the Republic of Namibia (2005:29), the NTA is responsible for managing the VET system under the direction of employers and other stakeholders as well as for entrusting VTCs with greater authority to improve their "management capacity and contextual relevance". The next section investigates the development of employability skills in the selected countries.

3.5 THE DEVELOPMENT OF EMPLOYABILITY SKILLS IN THE SELECTED COUNTRIES

This section discusses initiatives taken by the governments of the selected countries in addressing employability skills development.

In the UK, employability skills are developed by any education and training providers or workers' organisation and are acquired by any persons such as students or employed persons in the industry. There are no minimum entry requirements to developing employability skills, which are developed alongside other qualifications. Employability skills can further be developed as part-time or full-time courses at schools or colleges as part of some of the higher education courses (Government of the United Kingdom, 2006:1). The strategy chosen by the UK government in developing employability skills is to address them at all levels of the education system and the workplace.

In the USA, the SCANS Report underscores the importance of schools and workplaces in providing opportunities for the development of SCANS skills. Teachers and schools are expected to provide opportunities to learners at an early stage to see the relationship between what they are studying and how to apply it in real-life situations (Secretary's Commission on Achieving Necessary Skills, 1991:16).

According to the Australian Government (2004:13), employability skills are developed through formal and informal settings such as educational institutions, workplaces, home, social settings, leisure and through voluntary activities. The Report further states that developing employability skills through education and training systems can follow any of the following three approaches. Firstly, through an integrated approach that assumes that employability skills are integral to the development of workplace or vocational knowledge and skills and that employability skills should form part of the formal learning programme that prepares people for employment in specific occupations. Secondly, through an approach that entails development of employability skills separately for technical and other vocational skills. Thirdly, through the informal portfolio approach, using portfolios to demonstrate the development of employability skills (Australian Government, 2004:16).

As stated in Section 3.3 mandatory key skills are similar to employability skills found in the UK, USA and Australia. It is asserted by the Botswana Ministry of Education (Ministry of Education, 2005c:1) that the development of mandatory key skills includes practical work, projects and work experience, with learning broken down into units consisting of approximately 40 hours of learning. The Botswana Technical Education Programme (BTEP) courses are offered at 41 community vocational schools referred to as brigades, as well as the seven technical colleges operational in the country.

In Namibia, there was an attempt by the College for Out of School Training (COST) in 1991 to design a training model for VTCs to address specific employability skills in the VET

curriculum. No evidence could be found of such a curriculum. The proposed tradesman-training model suggested by COST aimed at contributing to the students' personal development by helping them to:

- understand and promote their mental, emotional, physical and spiritual development;
- discover their own potential, personality and self-image;
- develop social skills for self-reliance in occupational and community circles;
- become dignified, responsible and proactive citizens who contribute to development and harmony in Namibia;
- understand and practice logical, critical and problem-solving skills; and
- communicate effectively (College for Out of School Training, 1991:4).

Wolf (2009) points out that the new Vocational Education and Training Act mandates the NTA to develop national unit standards, modular curriculum, assessment and qualification arrangements for the vocational education and training system. He further states that the NTA is in the process of reviewing the VET qualification structures for levels 1 to 4 to cater for better skills development by the VET sector and to facilitate articulation between VET and tertiary institutions. Wolf further indicates that trainees who have opted for the vocational training stream can obtain fully-fledged craftsman status after completing either level 3 or 4 depending on the specific industry's requirements. Wolf asserts that the NTA has developed 443 unit standards for more than 45 qualifications, which are registered on the National Qualifications Framework (NQF). In addition, a total number of 189 training manuals have been produced and printed to address the shortage of quality resource material for learners in the occupational fields, such as hospitality, plumbing, automotive mechanics, electrical and electronics, joinery and cabinet making, office administration, information communication technology and metal fabrication.

A desktop review of national curricula for level 1 to 4 for the joinery and cabinetmaking as well as the automotive mechanics programmes developed by the NTA does not include any training content specific to employability skills development. It can thus be assumed that the current curricula being adopted and implemented by the NTA based on the Competency-Based Education and Training approach does not embrace employability skills development in the Namibian VET curriculum. The National Teachers' Union of Namibia (NANTU), expressed dissatisfaction with the Competency-Based Education and Training curriculum (CBET) being implemented at VTCs because it excluded subjects such as mathematics, science, technical drawings and others (Mari Smith, 2010:3). NANTU's Secretary General,

Basilius Haingura quoted by Mari Smith (2010:3), argues that “the current curriculum will not supply the nation with technical skills in the long run and will not address the shortage of skilled labour...”.

There appears to be dissatisfaction among trainees as well at VTCs with the newly implemented CBET curriculum. Trainees at the Valombola Vocational Training Centre in the Oshana Region boycotted classes during the month of June 2010 citing that new courses on offer at their VTC does not include mathematics and English which is a barrier in articulation between VTCs and other institutions such as the Polytechnic of Namibia and the University of Namibia (Halwoodi, 2010:11).

Mueller (2010) in his presentation at the 8th International Vocational Education and Training Association - Africa Regional Conference held on the 18–21 April 2010 in Swakopmund, noted that the Namibia Institute of Mining Technology (NIMT) is offering the following subjects: mathematics, engineering science, engineering drawing, trade theory and trade practice for occupational trades, such as fitting and turning, boilermaking, automotive mechanics, plumbing & pipefitting, as well as joinery and cabinetmaking. He further stated that the technical trade subjects are supplemented with subjects such as entrepreneurial development, English communication, computer literacy, first-aid, National Occupational Safety Association (NOSA) safety courses, business management as well as environmental control. During an interview with two VTC Principals (Haukongo, 2010 and Malangu, 2010), they confirmed that their VTCs do not offer employability skills development at their respective vocational training centres. They indicated that their VTCs are only offering trade occupational-related courses with subjects similar to the ones offered at NIMT.

The attempt to introduce employability skills in the vocational education and training curriculum in Namibia, like in the other countries cited in this study, was a good effort, although no evidence could be found of employability skills development in the country, particularly in terms of the VET system. It could be assumed that failure to introduce employability skills development in the VET curriculum was because of the absence of a policy regulatory framework addressing employability skills development. The next section looks at the approaches used in assessing employability skills in the selected countries.

3.6 EMPLOYABILITY SKILLS ASSESSMENT IN THE SELECTED COUNTRIES

Employability skills assessment is conducted using two approaches in the UK, namely portfolio of evidence submitted by the learner or by sitting for an employability skills test marked by an external awarding body. Written tests can be taken at level 1 and 2 and can consist of 40 multiple-choice questions; the duration of such test is half-an-hour. Level 3 tests are more complex and their duration is one-and-a half hour (Turner, 2002:2).

Wilhelm, Logan, Smith and Szul (2002:65) indicate that in the USA assessment of employability skills takes the form of "criterion referenced assessment such as performance tasks, open-ended response questions, journals, portfolios and videos".

A key feature of the education and training system of Australia is the competency-based system, which focuses on the learners' outcomes rather than on the inputs to the training system. The Allen Consulting Group (2006:16) points out that the learners' outcomes from training packages are assessed in collecting evidence and taking decisions on whether units of competency have been achieved. The Australian Government (2004:20) argues that assessment can be used to report individual achievements as well as for evaluating system-level performance. Curtis (2004:143–4) identifies four approaches used in assessing employability skills in the Australian VET system, namely holistic judgement, portfolio assessment, workplace assessment and standardised instrumental assessment.

In Botswana there exists a quality assurance unit called the Botswana Quality Assessment and Assurance Unit (QAA) in partnership with the Scottish Qualification Authority in Scotland. It is duly responsible for accrediting and certifying qualifications. In line with the Scottish system, trainees have to demonstrate competency in mandatory key skills as part of the course (Akoojee, 2005:23). The assessment of mandatory key skills in Botswana takes the form of case studies, an investigation or a practical assignment at the appropriate level (Ministry of Education, 2005d).

As stated in Section 3.5 above, there was an attempt by the COST to introduce employability skills in the VET system in Namibia, but no evidence of an employability skills curriculum in terms of which employability skills should be developed and assessed could be found. The researcher could not find evidence or any documentation relating to the assessment of employability skills. The next section provides a synthesis on the findings of the comparative analysis on the selected countries investigated regarding the key drivers influencing the

development of employability skills, employability skills policy reforms, the provision as well as the assessment of employability skills.

3.7 SYNTHESIS ON THE FINDINGS OF THE COMPARATIVE ANALYSIS ON THE SELECTED COUNTRIES

As previously discussed, the skills changes in the UK reflect the change in the structure of the UK economy. The transformation towards a service-oriented economy entails a greater need for skills such as communication and teamwork skills. The government identified the need to develop these skills, as expressed in its various policy papers. Employability skills development is reflected in the overall structure of the education and training system, which supports skills mobility across education levels. In essence, the overall skills development strategy comes close to a lifelong learning approach, where skills development is not a once-off activity but occur throughout an individual's life.

The USA, just like the UK, experienced an economic transformation, shifting to a service-oriented economy, which demanded a different set of skills, as reported in Section 2.4. In response to the demand for a new set of skills, the government adopted policies to influence the education and training system to address the skills required in the workplace. The strategy to address employability skills development is well reflected in the overall structure of the education and training sector.

As stated above, Australia is one of the strongest economies in the world, and this is attributed to its flexible workforce. The government of Australia made efforts over the years to develop employability skills among the workforce to ensure a flexible workforce. The introduction of new technologies resulted in the reform of the education and training system to make the system responsive to the skills demanded by business and industry.

Botswana, being a developing nation, understood the importance of growing its economy to make the country a globally competitive nation. The government of Botswana realised that it can only achieve global competitiveness with a highly skilled workforce equipped with skills that will respond to the changing skills demands of the workplace. As pointed out earlier, the government reformed its education and training system to cater for mandatory key skills among the workforce in anticipation of technological advancements.

From the discussion above, it is evident that Namibia is rich in natural resources. However, the country faces a shortage of skills that can respond to the socio-economic needs of the country. It is argued that a need was identified to reform the education and training sector to make it responsive to the changing skills demands in the workplace. It was shown above that there is no evidence that the education and training system is producing graduates who possess the required employability skills.

The previous sections examined five different VET systems in developed and developing countries to provide insight into how they address employability skills development in their respective countries. It is, therefore, necessary to provide a comparative analysis on how the different countries addressed the development of employability skills by the various education and training systems. The next section provides a comparative analysis on the major characteristics of the vocational education and training systems of the selected countries in terms of employability skills development approaches.

3.8 COMPARATIVE ANALYSIS OF VOCATIONAL TRAINING SYSTEMS

This section presents a comparative analysis of the development of employability skills of the different countries researched. Table 3.1 below provides an analysis of the countries studied.

TABLE 3.1 Major characteristics of the different vocational education and training systems

Description	Country				
	United Kingdom	**United States of America**	**Australia**	**Botswana**	**Namibia**
Governance	State regulated	Municipal regulated	State and industry regulated	State regulated	State regulated
Training provider	State, private and industry	Private and public	State and private	State	State and private
Predominant method of learning	Combination of theory and practice	Combination of theory and practice	Combination of theory and practice	Combination of theory and practice	Combination of theory and practice
Elements of the curriculum	Directed at meeting industry needs	Directed at meeting industry needs	Directed at meeting industry needs	Directed at meeting industry needs	Supply driven and not meeting industry needs
Quality assurance	Industry driven	Industry driven	Industry driven	State driven	State driven
Employability skills considered important in the workplace	**Key skills:** Communication, numeracy or the application of numbers, use of information technology, working with others, improving own learning and performance, problem solving	**Know-how skills:** Basic foundational skills i.e. numeracy, higher-order thinking skills i.e. problem solving, Interpersonal and team skills i.e. communication, personal characteristics i.e. positive self-worth.	**Employability skills:** communication, teamwork, problem solving, initiative, planning and self-management.	**Mandatory key skills:** personal and interpersonal skills, communication, numeracy, entrepreneurship, information and communication technology	No evidence could be found on the development of employability skills
Development of employability skills	Any approved centre, part-time or full-time	No entry requirements can be developed parallel to other qualifications	Fully-integrated approach; separate approach and informal portfolio approach	Practical work, projects and work experience	No evidence could be found of the development of employability skills
Employability skills assessment approaches	Portfolios and test	Criterion referenced assessment such as performance tasks, open-ended response questions, journals, portfolios and videos	Holistic judgement, portfolio assessment, workplace assessment and standardised instrumental assessment	Case studies, an investigation or a practical assignment	No evidence could be found of assessing employability skills

3.9 SUMMARY

This chapter attempted to describe current approaches to VET by looking at the development of employability skills in developed and developing countries in particular. The study revealed that employability skills development in the countries researched were driven by factors such as the introduction of new technologies in the workplace as well as economic shifts from manufacturing- to service-oriented industries that demanded new sets of skills.

The analysis revealed that in all countries cited in this study, with the exception of Namibia, there are policy frameworks in place governing the development of employability skills by their respective education and training systems. Employability skills are almost similar in the various countries researched, although different terms are used to denote them. No employability skills framework could be found in Namibia although efforts were undertaken to propose a tradesman-training model, which aimed at contributing to trainees' personal development as well as helping them to develop social skills for self-reliance in occupational and community circles

It emerged from the analysis that VET training providers in countries studied were state regulated, with countries such as the UK and the USA also having public training providers. It is apparent from the analysis that efforts by the training providers in developing employability skills were demand-driven, with the exception of Namibia whose skills development efforts were supply-driven. In countries where employability skills frameworks existed, such countries implemented various approaches in developing and assessing such employability skills in their respective VET systems.

The above analysis offers good examples to Namibia in addressing employability skills in the VET system. An important lesson offered to Namibia by the countries studied is the formulation and implementation of an employability skills development policy framework particularly for the VET system. The researcher is of the view that in the absence of an employability skills policy framework, the development of employability skills by the Namibian VET system will continue to be neglected by the education and training sector, which means that graduates from VTCs will continue to not meet the employability skills demanded by employers.

The next chapter discusses the research design and methodology employed to collect data for the study.

CHAPTER FOUR

RESEARCH DESIGN AND METHODOLOGY

4.1 INTRODUCTION

This chapter discusses the research design and methodology employed in this study. The chapter further explains the methods used to collect and analyse data. The procedures followed in selecting the samples for the study are presented. Finally, the chapter concludes by discussing the ethical considerations underlying the research and the delimitation of the study.

4.2 RESEARCH DESIGN

In Section 1.8 it was reported that the study adopted a survey method using interviews and questionnaires (triangulation) as well as a descriptive approach to answer the main research questions of this study. The reason for adopting mixed methods in this study is to supplement and enrich data obtained through the findings and to cut out possible biases from a single investigation. Using mix methods would thus strengthen the findings on the issues under investigation.

Before selecting a research design, a research problem has to be formulated on which the research designs will be based (Brown 2001:49). Research design is a strategy or a plan used in conducting research to obtain data that will respond to research questions or hypotheses. Borg and Gall (1989:324) state that a "researcher attempts to design a study so that it will yield the strongest possible evidence to support or refute a knowledge claim."

According to Bak (2004:25), "research design provides an indication of the means to be used to attain the research objectives." Bak further argues that it "outlines the procedures to be followed during the research and the sources for data collection". In other words, a research design is a combination of methods and procedures to be followed in conducting research to eventually come to the findings or testing of a hypothesis. Punch (2009:113) supports Bak's statement, saying that a research design deals with the following main questions in conducting research:

- Which strategy is to be followed during the research?
- Within which timeframe will the research be conducted?
- From where and whom will data be collected?
- How will the data be analysed and interpreted?

The research design to address the research questions of this study is discussed in the following sections.

4.3. RESEARCH PARADIGMS

Researchers base their findings on logical and empirical evidence following different paradigms used in a research process (Terre Blanche & Durrheim, 2004:3). Durrheim (2004:29) posits that paradigms "act as perspectives that provide a rationale for the research and commit the researcher to particular methods of data collection, observation and interpretation." Terre Blance and Durrheim (2004:6) posit that if the researcher is of the opinion that the reality to be studied is of people's subjective experience of the external world, an intersubjective or interactional epistemological approach towards such a reality can be used by making use of interviews or observations. This is recognised as interpretive research.

The research paradigm followed in this study was interpretive, since it aimed to investigate the perception of employers regarding the employability skills they expect from VTC graduates entering the workplace. The researcher was interested in the subjective world of the respondents' views. The aim was to describe the employability skills employers expect from VTC graduates entering the workplace.

Two research methods, the qualitative and quantitative methods, were used in collecting and analysing data for the study. Flick (2009:26) is of the view that a researcher may use qualitative and quantitative approaches in a single study. The qualitative and quantitative approaches are briefly outlined in sub-paragraphs 4.3.1.1 and 4.3.1.2 below:

4.3.1 Qualitative research method

The study followed a qualitative approach because the researcher attempted to identify and describe the perception of employability skills required by employers from VET graduates entering the workplace.

Gay, Mills and Airasian (2006:9) argue that qualitative research "is the collection, analysis and interpretation of comprehensive narrative and visual (non-numerical) data in order to gain insights into a particular phenomenon of interest". They further point out that qualitative research is an intensive method of collecting data through observation and interviewing, and the data collected is analysed inductively by way of categorising and organising data into patterns that produce a descriptive and narrative synthesis. Punch (2009:117) asserts that a major characteristics of qualitative research is that it is naturalistic, studying objects in a natural setting. He further identifies the following features of qualitative research:

- the researcher's role is to gain a holistic view of the context under study;
- researchers attempt to capture data on the perceptions of local actors 'from the inside';
- through reading material, researchers may isolate certain themes and expressions that can be reviewed with informants, but that should be maintained in original format;
- a main task is to explicate the ways people in particular settings behave in a particular manner;
- materials can be interpreted in many ways;
- standardised instruments are used least in this method, because the researcher is considered the main 'instrument' in the study; and
- data is analysed through words.

During the study the researcher took the above features into consideration and conducted the study in natural settings. The researcher expected respondents to speak for themselves and to provide their perceptions on employability skills they expect from VTC graduates entering the workplace.

4.3.2 Quantitative research method

Quantitative research, by contrast, is an approach by which numeric data is collected from a specified sample (Singh, 2007:123). Bieger and Gerlach (1996:37) maintain that "quantitative research uses numerical data such as mean and median to describe variables." They further argue that "quantitative researchers use numerical data such as correlation coefficients to show a relationship among variables."

The quantitative research approach is one in which the researcher primarily uses postpositivist claims for developing knowledge such as cause and effect thinking, reduction to specific variables and hypotheses, use of measurement and test of theories. Researchers

thus use quantitative methods such as experiments, surveys and predetermined instruments in the investigation of their hypotheses.

A quantitative survey approach was used during the study to obtain the perception of employability skills required at a workplace and to quantify the analysis through quantitative measurements such as “assigning numbers to the perceived qualities of responses” (Babbie & Mouton, 2001:49).

4.4 METHODOLOGY

This section discusses the methods and techniques used to collect and analyse the data for the study. The sample population, data-collection procedures and data analyses instruments are discussed in more detail in the sections below.

4.4.1 Population

Gay et al. (2006:109) define a population as the “group of interest to the researcher, the group to which the researcher would like the results of the study to be generalisable”. Singh (2007:88) defines a population as a “group of individuals, objects or items from among which a sample are to be taken for measurement purposes”.

As earlier reported in Section 1.8.3, the researcher obtained lists of employers providing on-the-job training or employing VTC graduates from the Namibia Institute of Mining and Technology, Windhoek Vocational Training Centre and the Directorate of Vocational Education and Training of the Ministry of Higher Education, Science and Technology. The lists obtained were consolidated into one sampling frame (see Appendix B). Singh (2007:88) defines a sampling frame as a “frame of entities from which sampling units are selected for a survey”.

The study targeted 493 employers contained in the sampling frame obtained, as indicated in the previous paragraph. Research participants represented the following occupational trades: building construction, metal, electrical and auto-mechanics.

The population of the study was categorised into the following four occupational trades:

Construction trades

- building construction
- woodwork
- plumbing and pipefitting

Metal trades

- boilermaking
- welding and fabrication
- fitting and turning

Auto trades

- auto and diesel mechanic
- auto electrician
- panel beating and spray painting

Electrical trades

- electrical installation
- radio and TV repair
- air-conditioning and refrigeration

The above trades are mainly the occupational courses offered at the various VTCs in the country, as reported in Section 3.4. Therefore, the study is restricted to the above occupational fields. The population consisted of the following occupational trades with their corresponding numbers of participants:

Occupational trade	**Number of employers**
Auto-mechanic	93
Building construction	171
Electrical	97
Metal	132
Total	**493**

Considering a population of 493 employers, the researcher deemed it necessary to target all employers identified for the survey and therefore the researcher recruited students to assist in administering the questionnaire to the entire population. Another reason for targeting the entire population was to ensure a high response rate that would increase the accuracy rate of responses that can be generalised to the entire population. The majority of the

participants were from the construction and metal trades, and no specific reasons could be obtained why there were more participants from the construction and metal trades as opposed to the other trades co-operating with the VTCs.

4.4.2 Sampling

During research, it is not always possible to investigate the entire population to draw inferences on the subject under study. Singh (2007:88) refers to a sample when dealing with people as a "set of target respondents selected from a larger population for the purpose of a survey". In research, there are alternative ways of sampling. These are probability and non-probability sampling (Struwig & Stead, 2003:111). According to Singh (2007:89), sampling is defined as a "process of selection of sampling units from the population to estimate population parameters in such a way that the sample truly represents the population".

For the purpose of this study, probability and non-probability sampling are not discussed because no sampling was done due to the fact that the study targeted the entire population identified in the sampling frame for this study. Although all employers in the identified regions were targeted for the study, the sample eventually obtained was 244 employers.

4.4.3 Data-collection procedures

In Sections 4.3.1.1 and 4.3.1.2, it was reported that the study employed both qualitative and quantitative approaches in collecting data for the study. The questionnaire used to collect quantitative data was administered concurrently with the qualitative data-collection process that consisted of face-to-face interviews conducted by the researcher. The researcher recruited ten second-year students from the Faculty of Education at the University of Namibia to assist with the administration of the questionnaire. The reason for employing students to assist with the data collection was threefold:

- firstly, to enable the students to gain exposure to data-collection methods;
- secondly, to enable the administration of the questionnaire to run concurrently with the face-to-face interviews to be conducted by the researcher; and
- thirdly, the students found it convenient to be engaged in this project because it occurred during their holiday.

Prior to administering the questionnaires, students were instructed on how to administer the questionnaires, such as properly introducing themselves at the companies they visited, being polite to the employers, explaining the purpose of the research as well as explaining and assisting participants to complete the questionnaire if the need arose.

Each student administering the questionnaires was offered a monetary reward for each completed and returned questionnaire. The reward was offered as an incentive to the students to participate in the survey. The incentive would further encourage students to visit as many targeted participants as possible, which could result in a high return rate of the completed questionnaires.

The students delivered the questionnaire in person at the employers' premises where they waited until it was completed. Where necessary, students had to leave questionnaires with employers or their representatives to complete questionnaires at their own pace if employers or their representatives were not ready to complete the questionnaire in the presence of the students. This required students to return and collect completed questionnaires. Only owners of companies or workers in supervisory roles were expected to complete the questionnaires; in instances where it was not possible, owners delegated this responsibility to other workers in their establishments to complete the questionnaire. Letters (cf. Appendix C(i) and C(ii)) inviting recipients to participate in the study as well as explaining the purpose of the study together with a letter from the University of Stellenbosch confirming the authenticity of the research accompanied the questionnaire.

4.4.3.1 Questionnaire

Administering questionnaires during research is considered to be one of the most popular tools to collect data. According to Middlewood, Coleman and Lumby (2001:142), questionnaires are the most popular research tool. Bless and Highson-Smith (1995:107) are of the view that administering questionnaires has the advantage of covering a large population during the data-collection process within a limited timeframe and at a minimal cost. They further argue that data collected through questionnaires can be used to determine frequencies of certain responses and to find relationships between answers to different questions, as well as to compare responses of a large number of research participants.

Given the large population of this study, as indicated in Section 4.4.1, it was necessary to use questionnaires to collect data from the population of this study because it would enable

the researcher to collect data in the shortest possible time available. It was also important for the researcher to compare the responses from the participants on the questions asked as well as to find relationships between responses to the different questions.

In order to obtain quantitative data and to explore in detail the employability skills requirements of the population of this study, the researcher designed a closed and open-ended questionnaire, which was administered by students recruited by the researcher to collect the data. Denscombe (2001:101) describes open-ended questions as those that the researcher "leaves the respondent to decide the wording of the answer, the length of the answer and the kind of matters to be raised in the answer". Closed-ended questions are structured in such a way to allow "answers which fit into categories that have been established in advance by the researcher" (Denscombe, 2001:101).

To probe responses from the respondents, the questionnaire consisted of closed and open-ended questions. Questions were ranked to enable the respondents to assess the importance of each statement in terms of a two-, three- and four-point Likert scale on statements such as 'yes or no', 'very satisfied, satisfied and not satisfied' or 'very important, important, somewhat important and not important' and 'strongly agree, agree, disagree and strongly disagree'.

The following questions were contained in the questionnaire:

- Which employability skills are important in the workplace?
- Who is responsible for developing employability skills?
- If it is the responsibility of VTCs to foster employability skills, at which educational level should employability skills education be introduced?
- How should the acquisition of employability skills be promoted?
- How should employability skills be assessed?

The questionnaire was structured as follows:

It contained an introductory paragraph with background information explaining the context of the study;

Part A of the questionnaire consisted of questions related to the demographic information of respondents;

Part B consisted of questions exploring the employment status of VTC graduates in the Namibian labour market;

Part C sought to identify the employability skills required in the workplace as well as employers' satisfaction levels with the employability skills displayed by graduates in the workplace; and

Part D sought to establish how employability skills should be fostered and assessed.

The literature review conducted in Chapter 2 provided insight into the type of questions asked and included in the questionnaire. The questionnaire was adapted from similar surveys conducted by the Australian National Training Authority (2001) as well as the report Skills Required of Graduates: One Test of Quality in Australian Higher Education (National Board of Employment, Education and Training, 1992).

Prior to administering the questionnaire, a pilot survey was conducted on a selected group of employers who were not targeted for the study. The purpose of piloting the questionnaire was to determine the relevance of questions as well as the validity and reliability of the instrument. The outcome of this exercise enabled the researcher to make final adjustments to the questionnaire before it was finally administered to collect data for the study. The questionnaire administered during the study is attached as Appendix D.

4.4.3.2 Face-to-face interviews

Face-to-face interviews were conducted with seven employer representatives employed by companies that either provide on-the-job training or employ VTC graduates. According to Punch (2009:144), an "interview is the most prominent data-collection tool in qualitative research. It is a very good way of assessing people's perceptions, meanings, definitions of situations and construction of reality."

Ruane (2005:147) defines an interview as a "personal exchange of information between an interviewer and an interviewee". Ruane (2005:149) further argues that the interview is a "purposeful conversation whereby the interviewer has a set research agenda such as key points or questions that must be addressed".

The interviews were structured because the researcher used a pre-designed questionnaire that he controlled during the interviews to question respondents. During the interview

process, the researcher used an interview schedule to enable him to provide the same experiences to all the interviewees during the interviews. It was necessary to use an interview schedule because interviews were conducted at different times and locations, depending on the availability of the interviewees.

In order to ensure that the interview discussions were properly recorded and nothing was omitted from the discussion, the researcher used an audio and visual recorder to record the interviews. Before commencing with the interviews, permission was obtained from the interviewees to use the recorders. It was explained to the interviewees that the purpose of using the audio recorder was to ensure that the interview discussion was recorded in full and that no discussions were omitted. Also, the intention of recording the interview on a video recorder was to produce a DVD on employability skills to be used for educational purposes. The advantage of using a tape recorder during the interviews was that it ensured that there was a "full record of what the informant said and how they have said it" (Hall & Hall, 1996:162). To eliminate researcher bias such as inaccuracy while recording the information, incorrectly translating the respondent's ideas or writing down only a summary or part of the answers (Bless & Higson-Smith, 1995:145), it was necessary for the researcher to use a tape-recorder during the conversation.

4.4.3.3 Data-analysis methods

Data collected during research can be analysed using two methods: quantitative or qualitative analysis. De Vos (2002:339) refers to data analysis as the process of "bringing order, structure and meaning to the mass of data collected". Qualitative methods put emphasis on the meaning of words, while quantitative methods attempt to describe the findings through statistical procedures.

According to Struwig and Stead (2003:169), data-analysis methods enable researchers to organise and bring meaning to the large amount of data collected during research. Struwig and Stead further argue that all "field notes, interview transcripts and documents should be complete and there should be no missing data". Interviews should be transcribed verbatim and not rephrased to be grammatically correct. Both qualitative and quantitative data-analysis methods were used in this study. The two methods are described in more detail in the following sections.

4.4.3.3.1 Qualitative analysis

Data collected by means of open-ended questions as well as face-to-face interviews were qualitatively analysed. After the interviews, data were transcribed to keep record of what had been said during the interviews.

According to Lichtman (2009:74), qualitative data analysis is a process that entails coding what the interviewee says (a step called open-coding), then moving to general categories or themes (a step called axial coding) and from these themes beginning to develop working theories to explain key concepts (referred to as selective coding). During the analysis of the interview responses, the researcher classified the data in search of common themes, sub-themes or similar dimensions of information collected from the respondents. These were captured into single statements to express the opinions of the respondents on the issues investigated.

4.4.3.3.2 Quantitative analysis

Data collected through the questionnaires were analysed quantitatively using computerised software, Statistica 7, from the University of Stellenbosch, Centre for Statistical Consultation. Descriptive statistics, such as frequencies, percentages, means, standard deviations and variable skewness, were used to describe the responses from the questionnaires. Chi-square tests were also carried out to compare result findings.

4.4.3.4 Triangulation

To identify the employability skills required by employers, the researcher ensured that the conclusions derived from the study were valid and reliable. In order to validate the overall research results, the major conclusions of the study were based on a variety of sources (data triangulation). Flick (2009:444) sees data triangulation as the use of different sources of data in a single study. An alternative definition of triangulation is the use of a "combination of different methods, theories, data, and/or researchers in the study of one issue" (Flick, 2009:475). Terre Blanche and Kelly (2004:128) note that "triangulation entails collecting material in as many different ways and from as many diverse sources as possible." Cohen and Manion (1994:233) put it that "triangulation may be defined as the use of two or more methods of data collection in the study of some aspects of human behaviour."

Flick (2009:444) further argues that four types of triangulations can be differentiated, namely data triangulation, which is the use of different data sources in a single investigation; investigator triangulation, which is the use of different researchers to minimise possible biases from one researcher; theory triangulation, which is the approaching of data with multiple perspectives and hypotheses in one's mind; and finally, methodological triangulation, which should be distinguished from within-methods and between-methods triangulation.

According to Hall and Hall (1996:44), the advantage of using triangulation in research is that the "problem associated with one strategy may be compensated for by the strength of another". Methods such as survey questionnaires, face-to-face interviews and documents were used for comparison purposes to validate or refute specific conclusions in this study. Data triangulation approach in interpreting the findings of this study will be reported later in Chapter 6 of this study.

4.5 RESEARCH VALIDITY AND RELIABILITY

The researcher endeavoured to ensure that the research findings of the study were valid and reliable. Denscombe (2002:100) argues that "validity concerns the accuracy of the questions asked, the data collected and the explanations offered." Generally, validity and reliability relate to the data and the analysis used in the research.

Bernard (2000:46) refers to validity as the accuracy and trustworthiness of instruments, data and findings in research. Validity is further described by Babbie and Mouton (2001:122) as "the extent to which an empirical measure adequately reflects the real meaning of the concept under consideration". Black (1999:192) posits that validity aims at maximising the consistency between concept, construct and operational definition. Hall and Hall (1996:43) have found a common definition for validity as "the extent to which a test, questionnaire or other operationalisation is really measuring what the researcher intends to measure".

According to Denscombe (2002:100) "reliability relates to the methods of data collection and the concern that they should be consistent and not distort the findings." Generally, it entails an evaluation of the methods and techniques used to collect the data. Babbie and Mouton (2001:119) refer to reliability as whether a particular method, applied repeatedly to the same object, would produce the same results every time.

Reliability refers to the consistency of results obtained the same time even though applying different instruments (Flick, 1998:223). Bernard (2000:47) argues that reliability refers to "whether or not you get the same answers by using an instrument to measure something more than once". In Black's (1999:195) view "reliability is an indication of consistency between two measures of the same thing." Hall and Hall (1996:44) have a common definition for reliability which is "the extent to which a test would give consistent results if applied by different researchers more than once to the same people under standard conditions".

Reliability and validity were maintained in the study by ensuring that the data gathering instruments were of high quality and that they measured what they were intended to measure during the study. This was managed by piloting the questionnaire to a group of selected respondents to eliminate errors before finally administering it. The purpose of piloting the questionnaire was to determine the relevance of the questions included in the questionnaire and to ensure that the questions would provide answers that address the main questions of the study. The outcome of this exercise enabled the researcher to make final adjustments to the questionnaire before it was administered to the research participants for data-collection purposes. In order to validate the overall research results, the researcher based conclusions on a variety of sources (data triangulation). The researcher used results derived from the survey questionnaire and face-to-face interviews to compare with the findings of the literature review to validate or refute specific conclusions.

4.6 ETHICAL CONSIDERATIONS

Ethics in conducting the research were maintained throughout the study. Struwig and Stead (2003:66) maintain that research ethics provide a code of moral guidelines to researchers on how to conduct research and thus how to avoid scientific misconduct like distorting and inventing data, plagiarism, publishing others' work as one's own contribution without acknowledging the source, failing to maintain the anonymity and confidentiality of the respondents and falsely reporting results. Mouton (1996:42) is of the view that during research the rights of research participants, such as the right to privacy, informed consent and confidentiality, must be protected. He further states that in the absence of the researcher protecting the rights of respondents, it would be impossible to find research participants for a study to be undertaken. Mouton (1996:157) further argues that target participants are sometimes reluctant or unwilling to participate in a survey because they

regard the investigation as infringing on their privacy; to reduce the effects of such fears, it is necessary to guarantee the anonymity and confidentiality of participants.

The researcher attempted to obtain a high response rate from the respondents and achieved this by ensuring anonymity and confidentiality and assuring respondents that the information provided would not be made available to any other third party, but would merely be used for the purpose of this study.

4.7 DELIMITATION OF THE STUDY

According to Bak (2004:24) and Creswell (2003:148), delimitation is used to narrow the scope of a study and to only focus on specific target groups. In Section 1.10 it was stated that the study was confined to four political regions in Namibia: Khomas, Erongo, Otjozondjupa and Oshana. In Section 1.10, it was stated that the study was confined to formal businesses.

It was necessary to narrow down the regions and only focus on four regions from which the findings of the study could be generalised to the wider population of the survey. The targeted regions are representative of the majority of employers training or employing VTC graduates.

4.8 SUMMARY

This chapter discussed the research design, methodology and techniques and instruments used to collect and analyse the data for the study.

It was reported that the study was descriptive because it was necessary to establish the perception of respondents regarding the employability skills considered important in the workplace and to describe such skills in words. Data collected were qualitatively (descriptive) and quantitatively (statistical inferences) analysed. The ethical considerations maintained during the study as well as the delimitation of the study were presented. The next chapter presents a descriptive account of the research results of the study.

CHAPTER FIVE

DESCRIPTIVE ACCOUNT OF THE RESEARCH RESULTS

5.1 INTRODUCTION

The previous chapter discussed the methodology used in collecting and analysing data for the study. The purpose of the study was to identify the employability skills that VTC graduates should possess when entering the workplace. No research study could be found in Namibia regarding the employability skills required by Namibian employers, and this study could be seen as an attempt to address the gap in knowledge on employability skills in the vocational education and training system in Namibia.

This chapter reports on the results obtained during the survey conducted. Results are presented in terms of the demographic information of the respondents, a section on the evaluation of the vocational education and training centre performance based on survey questions related to this study. Results are further presented in terms of the main research questions of the study.

5.2 PRESENTATION OF RESULTS

Research data by means of questionnaires were collected from 244 companies in Namibia, which represents a 49.5% response rate of the targeted population, and seven face-to-face interviews conducted. According to Gay et al. (2006:110), it is common to use a sample of between 10% and 20% of the population in descriptive research although such a guideline could be misleading. It is generally accepted that the larger the sample size the greater the likelihood of its precision and reliability (Struwig & Stead, 2003:119). The response rate obtained during the study is representative enough of the total population to generalise the findings of the study to the wider population of companies targeted for the study.

Results of the closed-ended questions are presented using inferential and descriptive statistics such as frequency tables and histograms. Cross tabulation and the chi-square test were used to compare categorical data. Comparisons of ordinal variables were done by using one-way analysis of variance (ANOVA) and the Kruskal-Wallis non-parametric test.

Bonferonni multiple comparisons methods were used to investigate where differences occurred. Open-ended questions and face-to-face interviews were reported in descriptive statements. The next section reports on the results regarding the demographic information on the respondents.

5.3 DEMOGRAPHIC INFORMATION

The demographic information provides an overview of the companies that responded to the questionnaire. The information relates to the company type as well as nature of industry, number of workers in the company, gender of the respondents, position of the respondents and the region from which the data were collected. Demographic information is presented in Section 5.3.1 to 5.3.6.

It was necessary for the researcher to know the demographic information of the respondents so that results from the findings could be used for correlation purposes between variables of the results obtained.

5.3.1 Type of company

Companies involved in training and employing VTC graduates are registered in different forms of ownership, and it was therefore necessary to ask respondents to indicate the type of ownership of companies they represented. Results on the type of companies are presented in Table 5.1.

TABLE 5.1 Type of company (n=244)

Type of company	Frequency	Percentage
Private	222	91.0
Government institution	13	5.3
Parastatal (state-owned)	9	3.7
Total	**244**	**100.0**

The results revealed that 91% of the respondents represented private registered companies, with 5.3% of respondents representing public institutions such as government ministries and local government authorities. The minority (3.7%) of the respondents represented state-owned companies (parastatals).

5.3.2 Distribution of respondents by gender

Information on gender was necessary to find out whether gender was a factor in considering employability skills in the workplace. The responses on the gender aspect shows that the male respondents were in the majority, representing 81.6% of the respondents, while the female respondents made up only 18.4% of the respondents.

5.3.3 Distribution of respondents by region

Companies that provide on-the-job training or employ VTC graduates are situated in various regions of Namibia. It was necessary for the researcher to know the distribution of respondents in the four regions identified for this study. Table 5.2 shows the distribution of respondents by region:

TABLE 5.2 Distribution of respondents by region (n=244)

Region	Frequency	Percentage
Khomas	197	80.7
Erongo	27	11.1
Otjozondjupa	11	4.5
Oshana	9	3.7
Total	**244**	**100.0**

The results in Table 5.2 reveal that the Khomas region represented the majority of the respondents (80.7%), followed by Erongo with 11.1% of the respondents, Otjozondjupa with 4.5% of the respondents and Oshana with 3.7% of the respondents respectively. One can assume from the results that most economic activities take place in the Khomas region because this is where most of the companies are situated.

5.3.4 Distribution of respondents by trade groups

Companies that participated in the survey were categorised into four trade groups: electrical, auto-mechanical, building construction and metalwork. It was necessary for the researcher to conduct research according to trade groups to assess the nature of employability skills needed by the different trade groups. The results of the trade groups are presented in Table 5.3:

TABLE 5.3 Distribution of respondents by trade group (n=244)

Industry Group	Frequency	Percentage
Auto-mechanical	94	38.5
Building construction	67	27.5
Metalwork	42	17.2
Electrical	41	16.8
Total	**244**	**100.0**

Table 5.3 illustrates that the auto-mechanic trade group represented the majority of the respondents with 38.5%, followed by the building-construction trade group with 27.5% of the respondents. The metalwork trade group represented 17.2% of the respondents, while the electrical trade group consisted of 16.8% of the respondents.

5.3.5 Number of workers in the company

Companies involved in training and employing VTC trainees vary in size. It was necessary to establish the distribution of respondents by size of the enterprise to determine whether bigger companies or smaller companies are more involved in employing or training trainees from VTCs. Table 5.4 shows the results on the number of workers employed by the companies surveyed:

TABLE 5.4 Number of workers in the company (n=244)

Number of Workers	Frequency	Percentage
Less than 10	75	30.7
11–50	95	38.9
51–100	38	15.6
101– 500	25	10.2
More than 500	11	4.5
Total	**244**	**100.0**

Table 5.4 suggests that 38.9% of the respondents employed between 11 and 50 workers, while 30.7% of the respondents employed less than 10 workers. Companies that employed between 100 and 500 workers represented 10.2% of the respondents, while companies that employed more than 500 workers were in minority with 4.5% of the respondents.

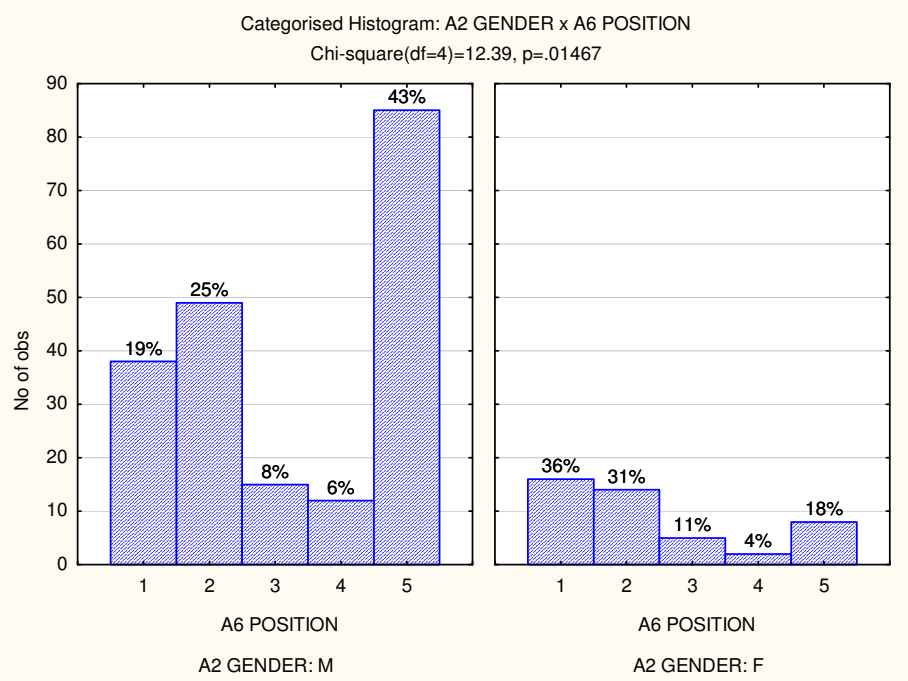
5.3.6 Respondents' position in the company

It was necessary for the researcher to know in which position the respondents were employed in the company so that findings of the results could be correlated with the positions of the respondents. Results on the distribution of respondents by position are indicated in Table 5.5.

TABLE 5.5 Respondents' position in the company (n=244)

Number of Workers	Frequency	Percentage
Owner	93	38.1
Supervisor	63	25.8
Human resource manager	20	8.2
Managing director/chief executive officer	14	5.7
Others	54	22.1
Total	**244**	**100.0**

Table 5.5 reveals that 38.1% of the respondents were owners of the companies surveyed, while 25.8% of the respondents were supervisors and 5.7% of the respondents represented managing directors/chief executive officers. Finance managers, secretaries, or deputy directors of government institutions accounted for 22.1% of the respondents. An assumption from this result is that the majority of companies surveyed are small- to medium-sized companies and are mostly managed by owners who completed the questionnaire. Figure 5.1 report on the contingency analysis of gender respondents compare with positions in the companies.



Legends: **Position:** 1 = Other 2, = Supervisor, 3 = Human Resource Manager, 4 = Managing Director/CEO, and 5 = Owner

Gender: F = Female, M = Male

FIGURE 5.1 Comparisons of gender respondents and position in the company (n=244)

When respondents were compared by gender versus position in the company with contingency table analysis, it was found that the genders differed significantly with respect to ownership. The maximum likelihood chi-square test yielded p= 0.0147> 0.05. Male respondents were in majority as owners of companies as compared to their female counterparts (see Figure 5.1). The next section reports on the findings regarding the performance of the vocational training centres in Namibia.

5.4 AN EVALUATION ON THE PERFORMANCE OF THE VOCATIONAL TRAINING CENTRES IN NAMIBIA

It was necessary for the researcher to establish the employment trend of VTC graduates in the Namibian labour market, as well as perceptions from respondents on the performance of

the VET sector. Results on respondent's perceptions regarding the performance of the VET system are presented in Sections 5.4.1 to 5.4.3.

5.4.1 Employment trend of vocational training centres trainees

This study concerned the employability skills of VTC graduates in the labour market and it was necessary to establish the employability of VTC graduates in the labour market. It was therefore important to assess whether respondents employed VTC graduates.

Results on whether respondents employed VTC graduates revealed that the majority of respondents (65.2%) employed VTC graduates, while 34.8% of the respondents had never employed VTC graduates. The reason why companies were employing VTC graduates might be due to the fact that graduates possessed basic technical abilities employers needed from graduates (see Figure 5.10).

In the past, vocational education and training, at least in Namibia, has always been dominated by male trainees. However, more female trainees are entering the VTCs now. Figure 5.2 presents the mean number of trainees employed per gender.

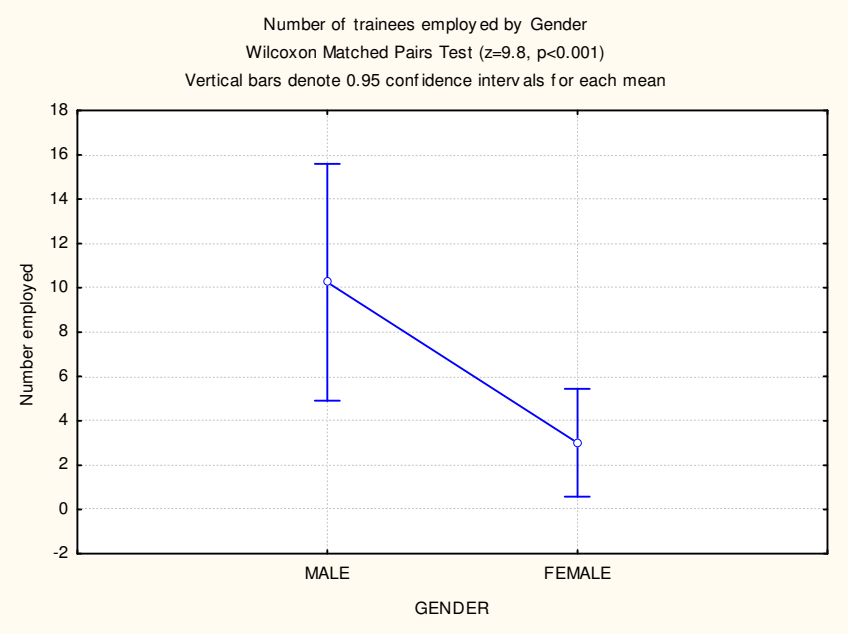


FIGURE 5.2 Mean numbers of graduates employed by gender (n=244)

There is still a significant difference between the number of male and female trainees employed by the respondent companies as determined with a Wilcoxon matched pairs test.

Figure 5.2 presents the mean number of trainees employed per gender with 95% confidence intervals added. Reasons for not employing graduates are discussed in the paragraphs below.

Some companies did not employ VTC graduates due to various reasons, ranging from unsuitable qualifications, irrelevant training and being unsatisfied with the quality of the vocational education and training system. Figure 5.3 shows results on reasons why respondents did not employ VTC graduates.

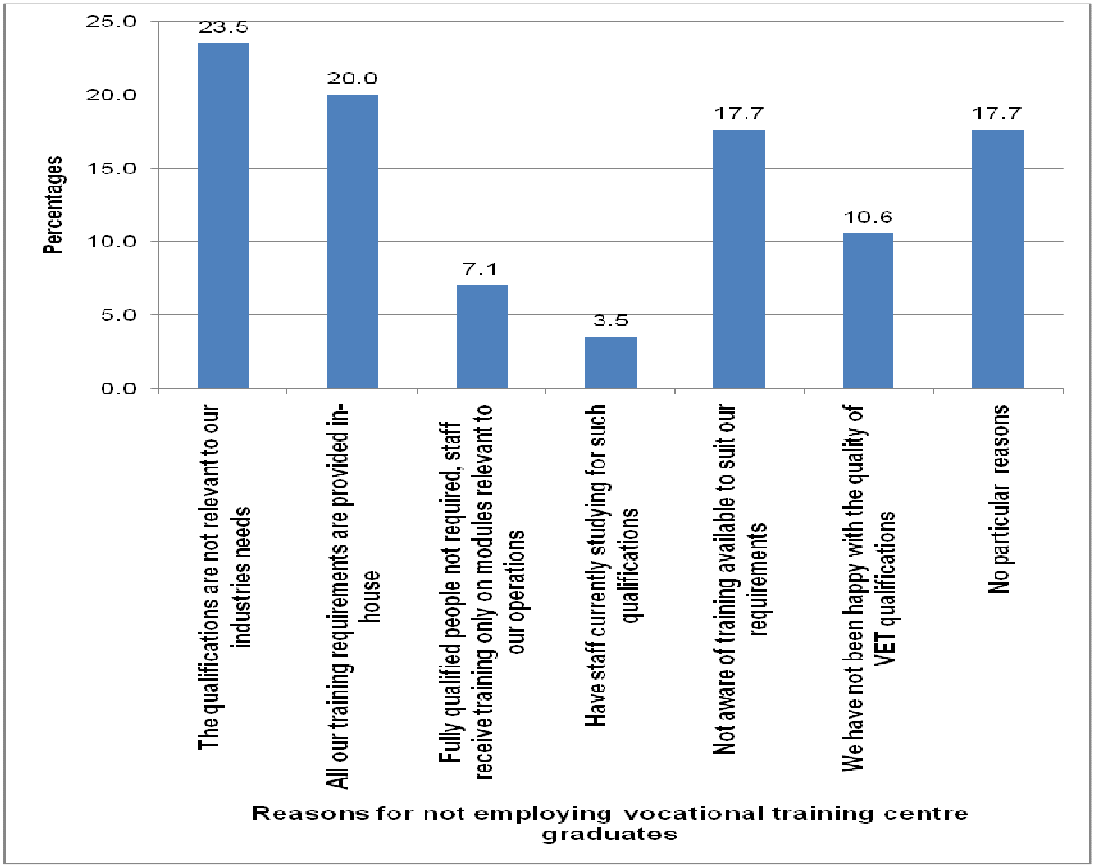
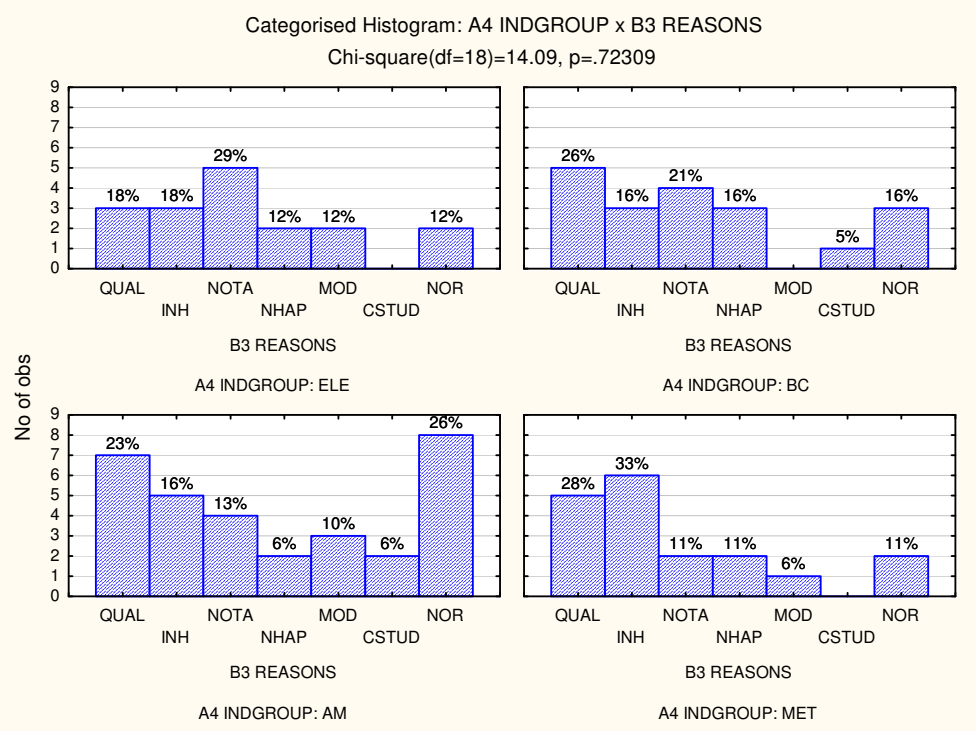


FIGURE 5.3 Reasons for not employing vocational training centre graduates (n=85)

As shown in Figure 5.3, the majority of the respondents (23.5%) indicated that their reasons for not employing graduates were because qualifications were not relevant to the needs of the industry. Respondents who indicated that their training requirements were provided in-house accounted for 20% of the respondents, while 17.7% of the respondents indicated that they were not aware of the availability of training opportunities that suited their needs. Respondents who indicated that they were not happy with the quality of VET qualifications were 10.6%, while 7.1% of the respondents indicated that they did not require fully qualified

people because their staff received training on modules only relevant to their operations. Of the respondents, 3.5% indicated that reasons for not employing graduates were because they already employed staff pursuing similar qualifications. Those who did not cite any particular reasons for not employing graduates made up 17.7% of the respondents. Figure 5.4 shows analysis on the cross tabulations regarding reasons for not employing graduates against trade groups.



Legends: Reasons:

QUAL = The qualifications are not relevant to our industry's needs
INH = All our training requirements are provided in-house
NOTA = Not aware of training available to suit our requirement
NHAP = We have not been happy with the quality of VET qualifications
MOD = Fully qualified people not required, staff receive training only on modules relevant to our operations
CSTUD = Have staff currently studying for such qualifications
NOR = No particular reason

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.4 Comparisons of reasons for not employing vocational training centre graduates per trade groups (n=244)

When reasons for not employing vocational training centre graduates were compared against trade groups, no significant differences could be detected on the reasons for not employing VTC graduates. Cross tabulation with the maximum likelihood chi-square test yielded $p = 0.723 > 0.05$.

More companies tend to employ VTC trainees who have completed their training at VTCs. It was necessary to determine at what educational level trainees were employed by respondents. Level 1 refers to the first year of training, where trainees have acquired basic skills for the trade. Level 2 is the second year of training where trainees obtained intermediary skills, while Level 3 is the final year of training where trainees are equipped with advanced skills and are eventually prepared for jobs in the labour market. A graduate refers to a candidate who has successfully completed the training programme and is certified as a skilled worker. Figure 5.5 shows the mean average number of trainees employed at each corresponding educational level by the respondents:

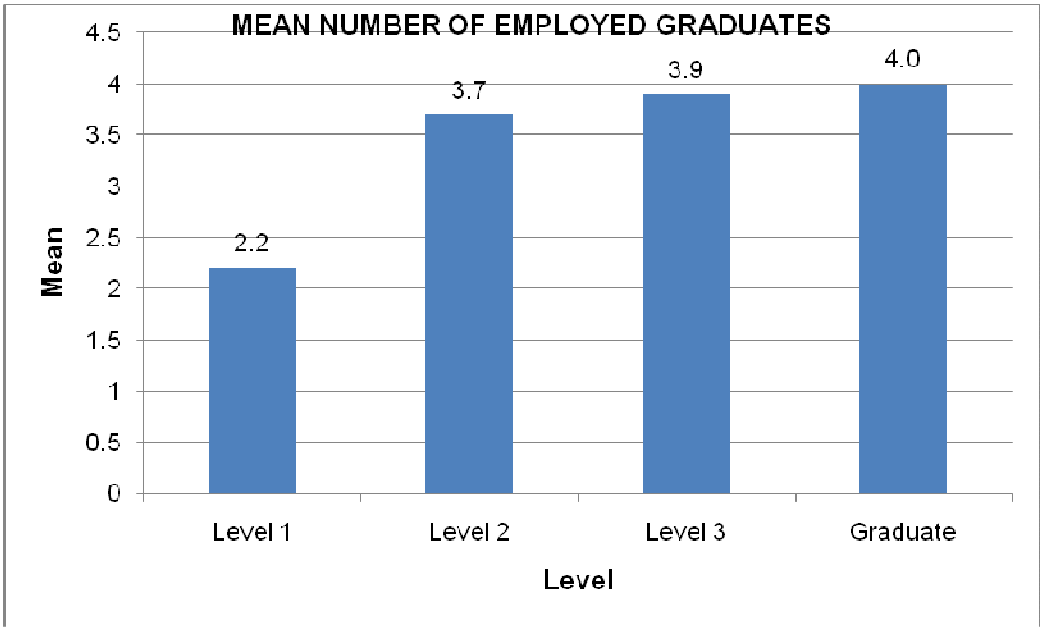


FIGURE 5.5 Employed graduates per educational level (n=244)

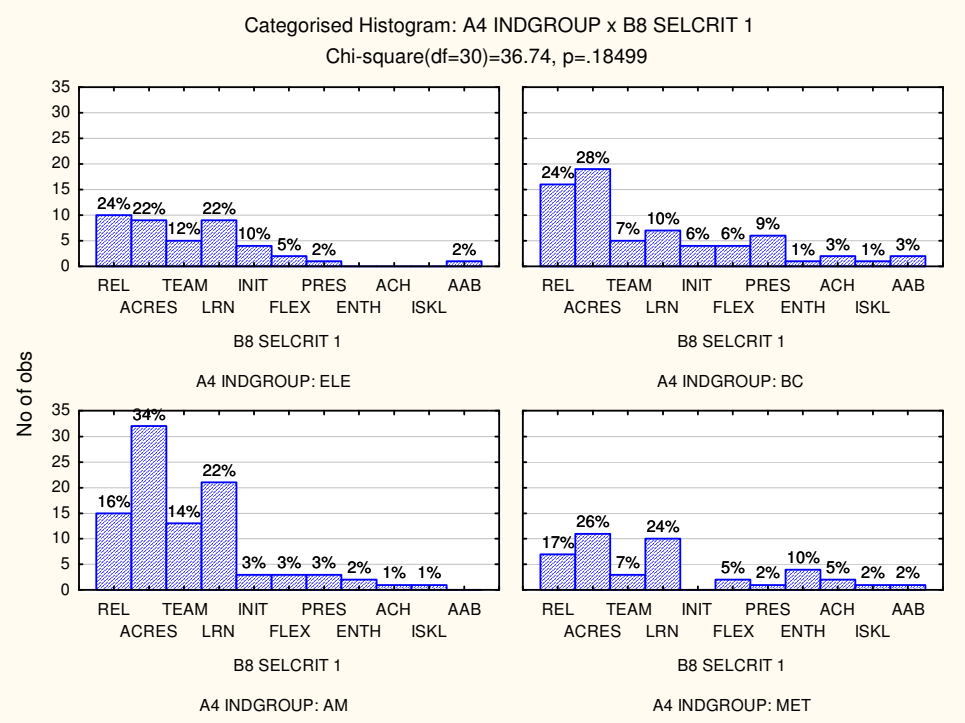
Figure 5.5 reveals that on average, participants employed four graduates, while each company employed, on average, 3.9 trainees who had attained Level 3 education. The number of trainees with a Level 2 education employed was 3.7 on average, while trainees with a Level 1 education level had an average of 2.2 trainees. This clearly indicates a tendency towards employing more qualified trainees, which might hint at industry's need for skilled personnel.

It was necessary to establish whether respondents used technical or non-technical knowledge as the most important selection criterion when recruiting VTC graduates. Respondents were provided with a list of choices to select the two most important criteria and to rate their first choice as the most important and their second choice as the-second most important criterion. Table 5.6 shows the findings from the respondents:

TABLE 5.6 Respondents selection criteria for recruiting graduates (n=244)

Selection criteria	Most important	Second most important	Total count
Relevant work experience	48	51	99
Academic results	71	17	88
Willingness to learn	47	39	86
Ability to work in team	26	39	65
Flexibility/adaptability	11	31	42
Presentation skills	11	13	24
Enthusiasm	7	15	22
Initiative taking	11	9	20
Achievement orientation	5	11	16
Conceptual and analytical ability	4	7	11
Interpersonal skills	3	4	7
Oral communication skills	0	7	7
Written communication skills	0	1	1
Total	**244**	**244**	**488**

The findings in Table 5.6 show that academic results was the most preferred selection criterion used by respondents in recruiting graduates, followed by relevant work experience, willingness to learn and the ability to work in teams. The least preferred criteria used in the selection of graduates were written and oral communication followed by interpersonal skills. These findings suggest that academic results are the preferred criterion for graduates to be recruited by employers. Figures 5.6 shows cross tabulations on the most important selection criteria per trade group.



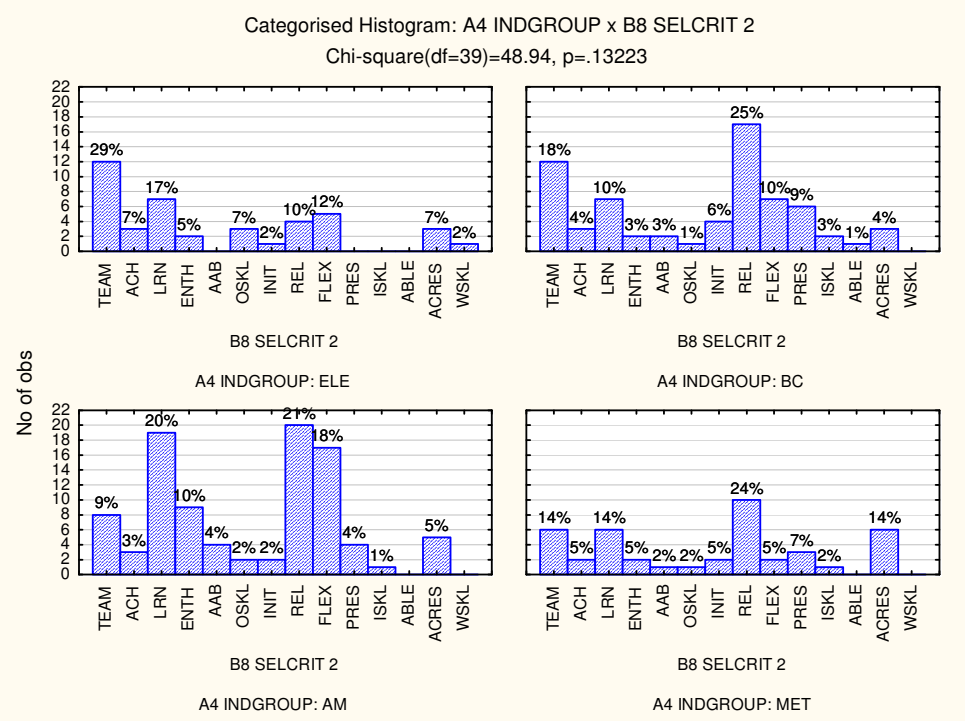
Legends: **Selection criteria:**

REL = Relevant work experience
ACRES = Academic results
TEAM = Able to work in a team
LRN = Willingness to learn
INIT = Initiative
FLEX = Flexibility/adaptability
PRES = Presentation skills
ENTH = Enthusiasm
ACH = Achievement-oriented
ISKL = Interpersonal skills
AAB = Conceptual and analytical ability

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.6 Most important selection criteria (n=244)

No significant differences could be detected with the maximum likelihood chi-square test (p=0.185> 0.05) on the most important selection criteria for recruiting graduates versus trade groups. Figures 5.7 indicate the cross tabulations on the second most important selection criteria per trade group.



Legends: **Selection criteria:**

REL = Relevant work experience
ACRES = Academic results
TEAM = Able to work in a team
LRN = Willingness to learn
INIT = Initiative
FLEX = Flexibility/adaptability
PRES = Presentation skills
ENTH = Enthusiasm
ACH = Achievement-oriented
ISKL = Interpersonal skills
AAB = Conceptual and analytical ability
WSKL = Written communication skills
OSKL = Oral communication skills

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.7 Second most important selection criteria (n=244)

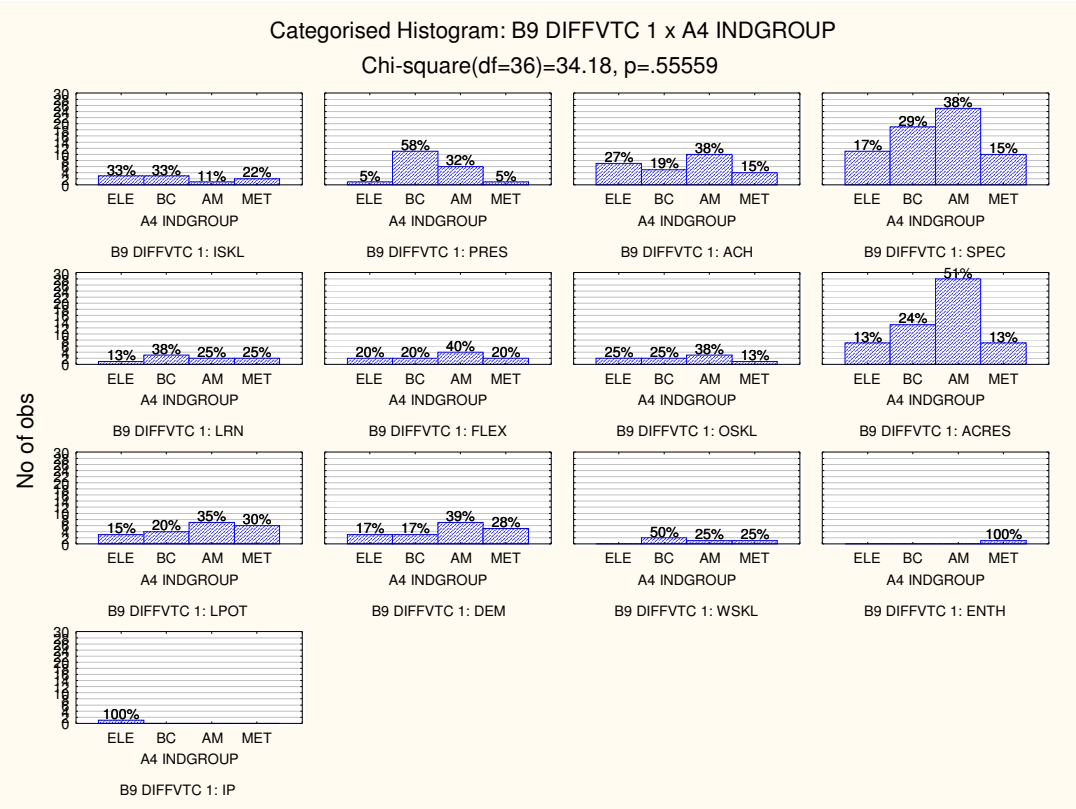
A cross-tabulation on the second most important selection criteria for recruiting graduates versus trade groups using cross tabulation yielded no significant differences with the maximum likelihood chi-square test (p=0.132> 0.05).

It was the researcher's interest to establish what differentiated successful graduates from unsuccessful candidates at the final selection stage for employment. Respondents were provided with a list of choices to choose from by selecting the two most important criteria and to rate their first choice as the most important and their second choice as the second most important criteria. The results indicated whether the differences were as a result of generic skills or qualifications. The findings are presented in Table 5.7:

TABLE 5.7 Differences between successful and unsuccessful graduates in the final selection process (n=244)

Selection criteria	Most important	Second most important	Total count
Specific desired skills or qualifications	65	51	116
Academic results	55	27	82
Flexibility/adaptability	10	38	48
Presentation at interview	19	22	41
Demonstrated interest in the organisation	18	21	39
All round achievers	26	11	37
Leadership potential	20	14	34
Interpersonal skills	9	15	24
Willingness to learn	8	15	23
Oral communication skills	8	10	18
Written communication skills	4	10	14
Enthusiasm	1	10	11
TOTAL	**243**	**244**	**487**

It is obvious from Table 5.7 that respondents suggested that specific desired skills or qualifications tended to differentiate successful from unsuccessful candidates at the final selection stage, followed by academic results as well as flexibility/adaptability. Enthusiasm, written and oral communication were the least important differentiators between successful and unsuccessful candidates and the final selection process. Figures 5.8 shows cross tabulations by trade groups on the most important differences between successful and unsuccessful graduates in the final selection process.



Legends: **Differentiating factors:**

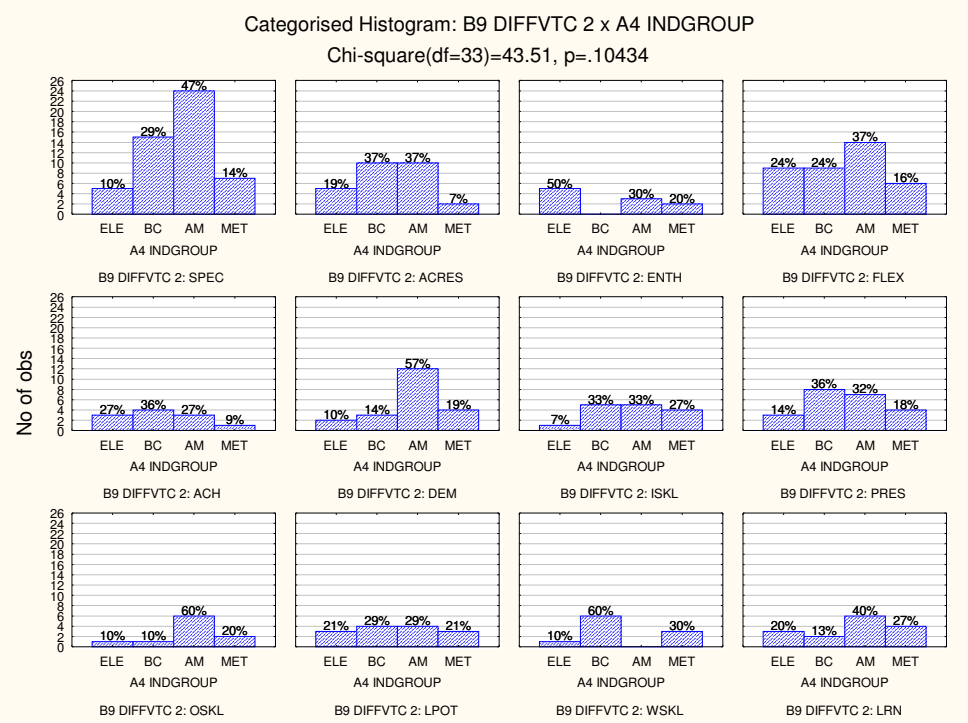
REL = Relevant work experience
ACRES = Academic results
TEAM = Able to work in a team
LRN = Willingness to learn
INIT = Initiative
FLEX = Flexibility/adaptability
PRES = Presentation skills
ENTH = Enthusiasm
ACH = Achievement-oriented
ISKL = Interpersonal skills
AAB = Conceptual and analytical ability
WSKL = Written communication skills
OSKL = Oral communication skills

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.8 Most important factors differentiating successful and unsuccessful graduates in the final selection process by trade groups (n=244)

A cross-tabulation of the most important factors differentiating successful and unsuccessful graduates in the final selection process versus trade groups using cross tabulation yielded

no significant differences with the maximum likelihood chi-square test ($p=0.556 > 0.05$). Figures 5.9 indicates cross tabulations on the second most important differences between successful and unsuccessful graduates in the final selection process by trade groups.



Legends: **Differentiating factors:**

REL = Relevant work experience
ACRES = Academic results
TEAM = Able to work in a team
LRN = Willingness to learn
INIT = Initiative
FLEX = Flexibility/adaptability
PRES = Presentation skills
ENTH = Enthusiasm
ACH = Achievement-oriented
ISKL = Interpersonal skills
AAB = Conceptual and analytical ability
WSKL = Written communication skills
OSKL = Oral communication skills

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.9 Second most important factors differentiating successful and unsuccessful graduates in the final selection process by trade groups (n=244)

A cross-tabulation of the second most important factors differentiating successful and unsuccessful graduates in the final selection process by trade groups yielded no significant differences with the maximum likelihood chi-square test (p=0.104> 0.05).

For correlation purposes, the researcher deemed it necessary to determine the benefits respondents derived from recruiting VTC graduates. The benefits respondents derive from recruiting graduates are shown in Figure 5.10:

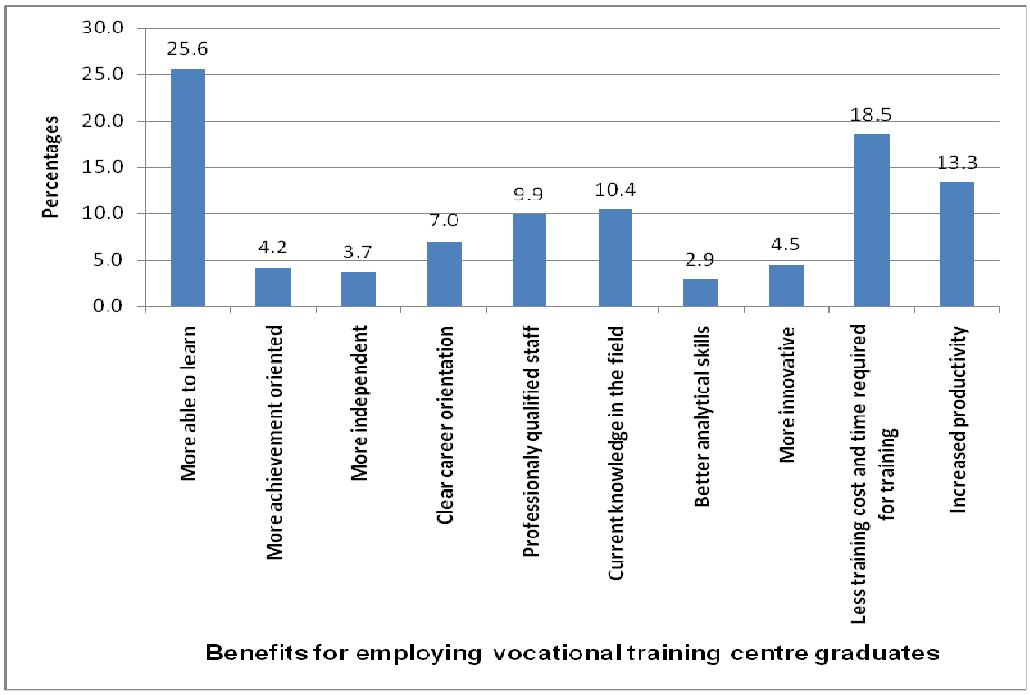
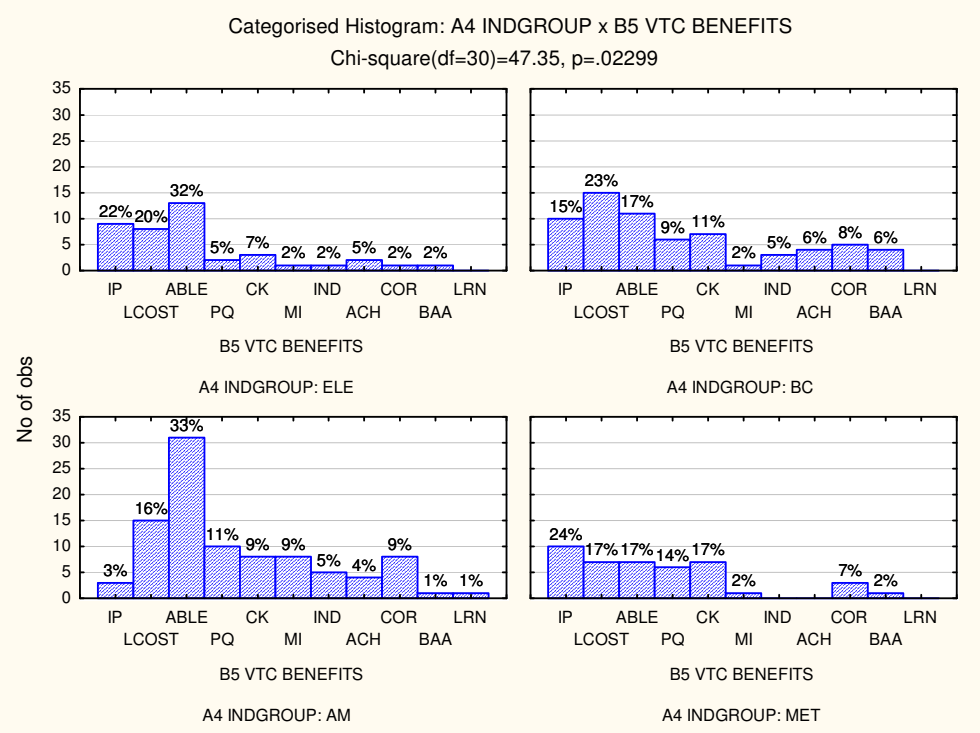


FIGURE 5.10 Respondents' benefits for employing graduates (n=243)

In Figure 5.10, it is indicated that 25.6% of the respondents recruited graduates because they were more able to learn. The second reason indicated was less training costs and time required for training graduates as expressed by 18.5% of the respondents, while 13.3% of the respondents indicated that the benefit of employing VTC graduates was increased productivity in the workplace. Current knowledge in the field was another benefit considered by 10.4% of the respondents; while 9.9% of the respondents pointed out that they recruited graduates because of their professional qualifications. Clear career orientation was considered a benefit by 7% of the respondents. Of the respondents, 4.2% cited being more achievement-oriented while 3.7% of the respondents cited being more independent as benefits they derived from employing VTC graduates. A few respondents (2.9%) indicated

that they recruited graduates because of better analytical skills. Figure 5.11 shows analysis on the benefits of employing vocational training centre graduates by trade groups.



Legend: **Benefits:**

IP = Increased productivity
LCOST = Less training cost and time required for training
MI = More innovative
BAA = Better analytical ability
CK = Current knowledge in the field
PQ = professionally qualified
COR = Clear career orientation
IND = More independent
ACH = More achievement-oriented
ABLE = More able to learn

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

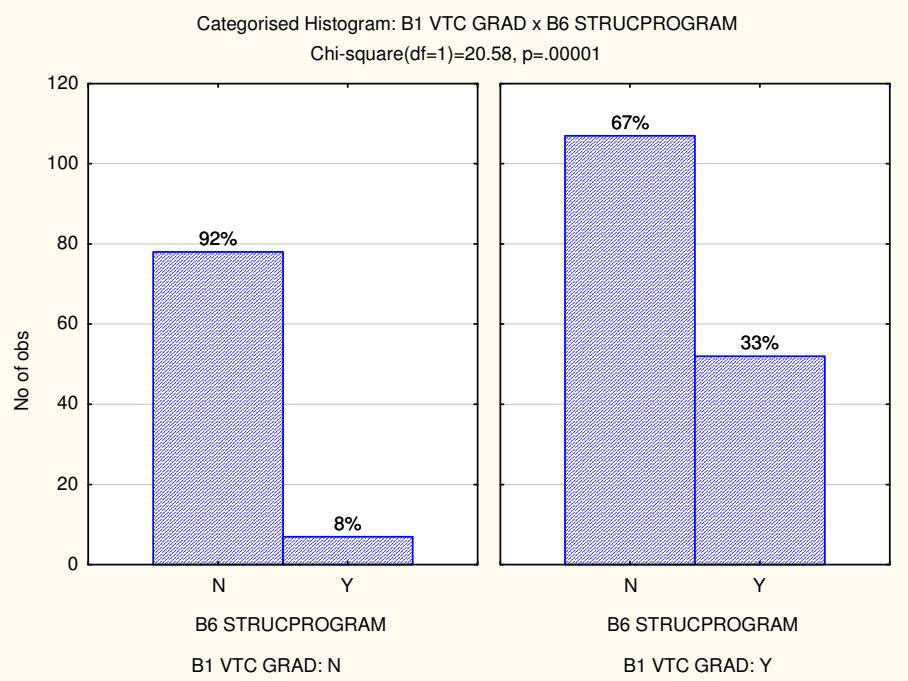
FIGURE 5.11 Comparisons on benefits of employing vocational training centre graduates per trade groups (n=244)

Contingency table analysis of the benefits on employing vocational training centre graduates against trade groups showed that significant differences exist. The maximum likelihood chi-

square test yielded (p= 0.023> 0.05). The electrical trades and auto-mechanical trades differed from the building construction and metal trades on the benefit of being more able to learn. The next section reports on the results regarding companies' in-house training and development initiatives.

5.4.2 In-house training and development initiatives

Respondents were asked to indicate whether they had in-company structured development programmes for graduates. A structured development programme refers to in-house training programmes which improve employees' specific skills. It was necessary for the researcher to establish whether respondents were involved in training graduates in their enterprises and in which areas respondents were training their employees. The results reveals that most of the respondents (75.8%) did not have structured development programmes in place for VTC trainees, while 24.2% of the respondents had such programmes in place at their companies. Figure 5.12 shows analysis on the contingency tables regarding respondent who have employed graduates versus in-house structured development programmes.



Legend: N = No Y = Yes

FIGURE 5.12 Comparisons of respondents who have employed/not employed graduates with structured in-house programmes (n=244)

Respondents who have employed or not employed vocational training centre graduates were compared against availability of structured in-house development programmes. A significant difference ($p=0.00001 < 0.05$) could be detected between those that indicated that they employed or not employed VTC graduates. A higher percentage of respondents who did not employ graduates indicated that they did not have in-house programmes. It was necessary for the researcher to establish areas in which respondents aspired to develop VTC graduates. The results indicated whether respondents aimed at developing technical skills or non-technical skills of graduates. The results are presented in Figure 5.13 below.

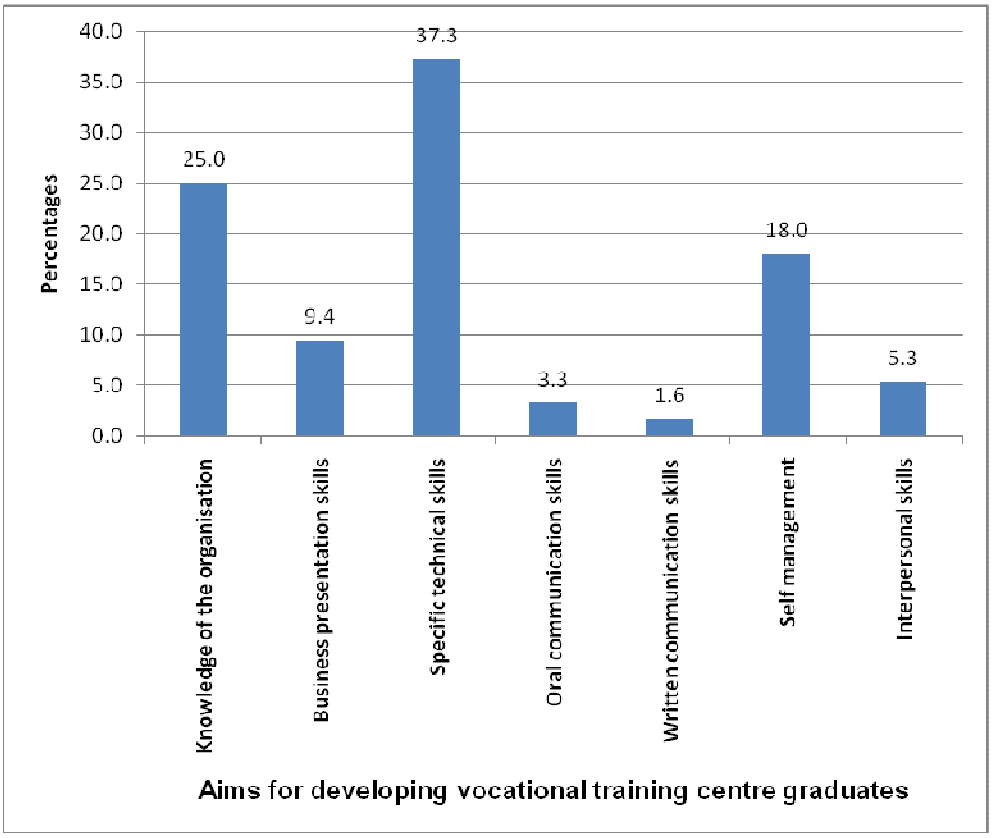
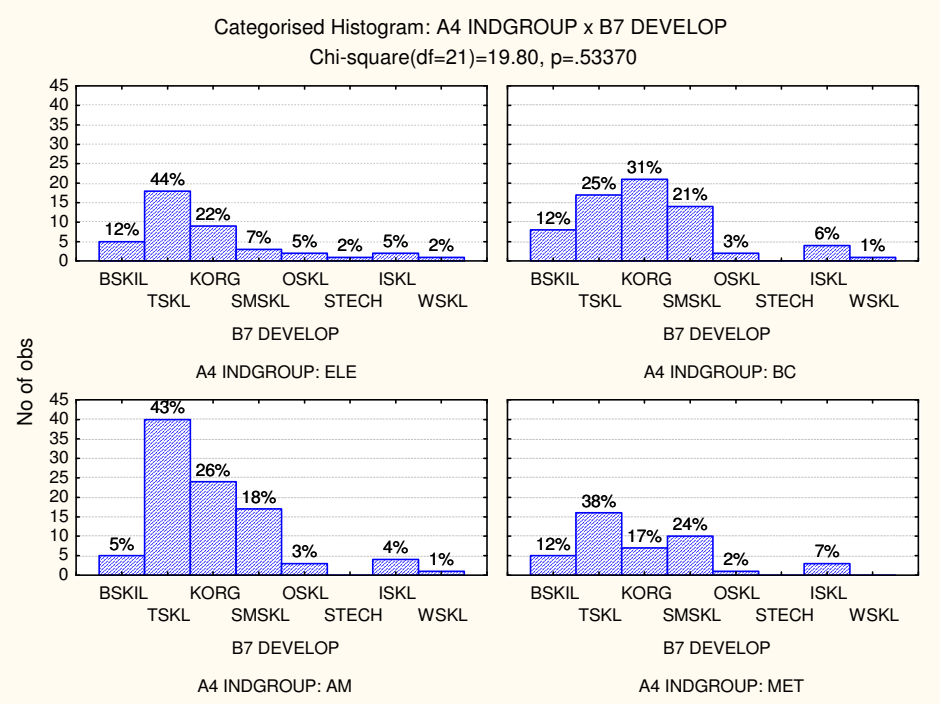


FIGURE 5.13 Aims for developing vocational training centre graduates (n=243)

From Figure 5.13 it is evident that 37.3% of the respondents indicated that they aimed to develop specific technical skills in trainees during the first year in employment, while 25.0% of the respondents indicated that they aimed at developing knowledge of the organisation. Respondents who wished to develop self-management skills constituted 18.0% of the respondents, while 9.4% aimed at developing business presentation skills. Only 1.6% of the respondents aimed to develop the written communication skills of VTC graduates during the first year of employment. It seems that companies are interested in training specific technical skills rather than soft skills such as business presentation skills, communication skills, self-management skills and interpersonal skills. Figure 5.14 shows analysis on the contingency tables regarding the aims of developing graduates versus trade groups.



Legend: **Aims for developing:**

KORG = Knowledge of the organisation

BSKIL = Business presentation skills

TSKL = Specific technical skills

OSKIL = Oral communication skills

WSKL = Written communication skills

SMSKL = Self-management skills

ISKL = Interpersonal skills

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

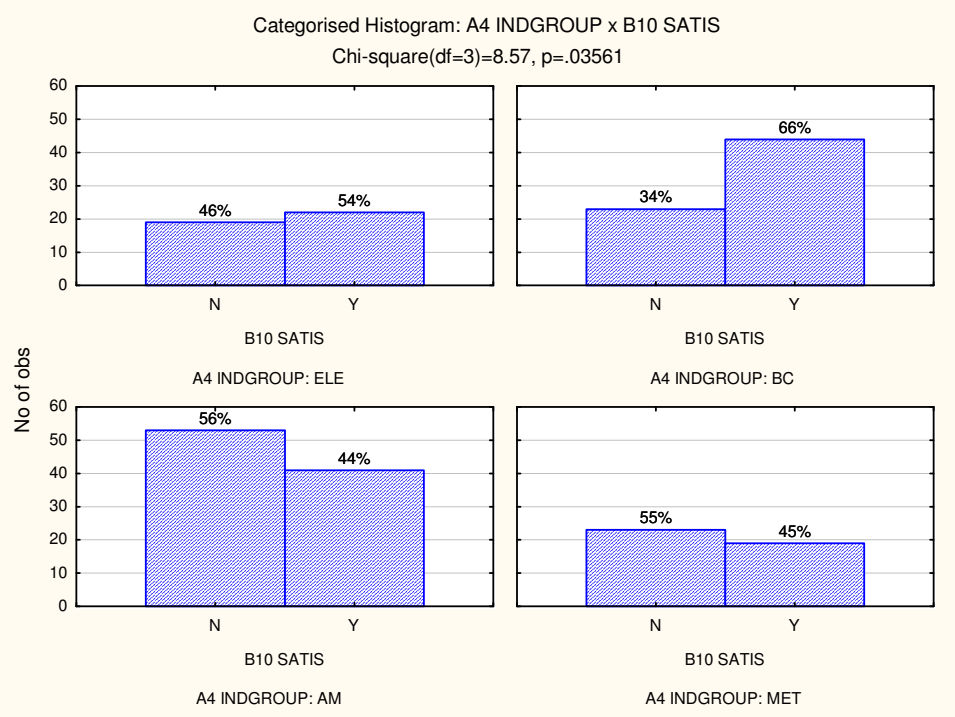
FIGURE 5.14 Comparisons on aims for developing vocational training centre graduates per trade groups (n=244)

When the aims for developing vocational training centre graduates were compared using contingency table analysis, no significant differences could be detected among trade groups with the maximum likelihood chi-square test (p=0.534> 0.05). The next section reports on the satisfaction level of respondents with the vocational training centre.

5.4.3 Respondents' satisfaction with the vocational education and training system

The researcher is of the view that employers play an important role in the development of a vocational education and training system of any country, and as such the VET system should take into consideration the needs of employers. It was therefore necessary to establish from respondents whether their needs were taken into consideration by the VET system.

It is apparent from the results that there is almost a balanced view among the respondents on their satisfaction level with the current VET system. The majority of the respondents (51.6%) indicated that they were satisfied with the current VET system, while the remainder (48.4%) were not satisfied with the current VET system. A cross tabulation analysis on respondents' satisfaction with the VET system versus trade groups are presented in Figure 5.15.



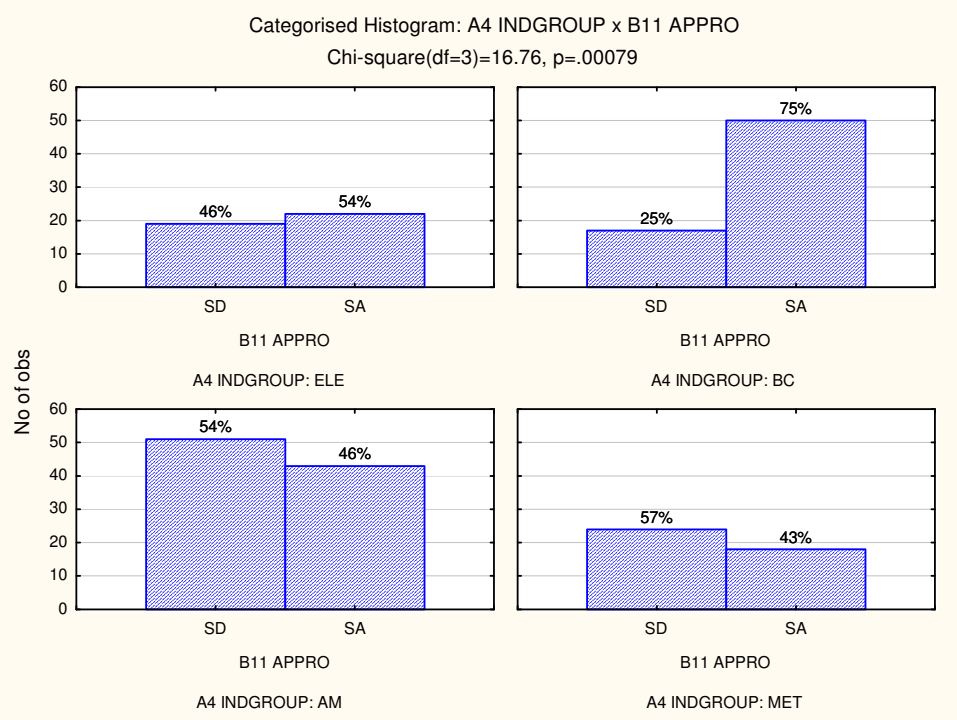
Legend: **Satisfaction:** N = No, Y = Yes,

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.15 Comparison of satisfaction level of the vocational training system per trade group (n=244)

The satisfaction level with the current VET system was compared against trade groups using cross tabulation. Significant differences among the industries were detected ($p=0.0356 < 0.05$). The building construction and the auto-mechanical trades differed from the metal and electrical trades regarding the satisfaction level with the VET system. The building construction and auto-mechanical trades indicated a higher percentage satisfaction level as compared to the metal and electrical industries.

Respondents were asked to indicate whether the VET system was producing graduates with skills relevant to employers' needs. It was necessary for the researcher to establish whether VET graduates met all the skill requirements of respondents. From the results it is evident that 54.5% of the respondents strongly agreed that the VET system provided graduates with skills relevant to employers' needs, while 45.5% of respondents strongly disagreed that the VET system provides graduates with skills relevant to employers' needs. The reason for such a high disagreement is supported by the fact that some employers (48.4%) were not satisfied with the VET system. Figure 5.16 shows contingency table analysis on the skills relevant to respondents versus trade groups.



Legend: **Approval:** SD = Strongly disagreed, SA = Strongly agreed,

Trade group: ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.16 Comparison of skills relevant to employers needs per trade group (n=244)

When the skills relevant to employers' needs were compared against trade groups using contingency table analysis, the metal, electrical and auto-mechanical trades differed significantly. The maximum likelihood chi-square test yielded p=0.0008> 0.05. The metal, electrical and auto-mechanical trades indicated a higher percentage disagreement with the VET system producing graduates with skills relevant to employers' needs.

Employers play an important role in the development of the vocational education and training system of a country, and as such the VET system should take into consideration the needs of employers. It was therefore necessary to establish from respondents whether their needs were taken into consideration by the VET system. It is apparent from the responses that there is almost a balanced view among the respondents who strongly agree or strongly disagree that the VET system does not take into consideration the needs of the employers,

although the majority of the respondents (52%) strongly agreed. This result is supported by findings where respondents indicated mixed views regarding their satisfaction levels with the VET system and where respondents indicated that the VTCs are providing graduates with skills relevant to employers' need.

Vocational education and training is a costly undertaking and it was important for the researcher to establish from respondents whether there was a return on investment from trainees. The responses from the respondents showed that the majority of the respondents (77%) strongly agreed that training of VTC graduates pays off and leads to increased productivity, while 23% of respondents disagreed that training of VTC graduates pays off and leads to increased productivity. The next section presents findings on the employability skills considered important in the workplace.

5.5 EMPLOYABILITY SKILLS CONSIDERED IMPORTANT AT THE WORKPLACE

Employers consider some skills more important in the workplace than others. It is important to assess which of these skills employers consider important in order to provide clear policy guidelines for VTC policymakers in designing policies and curriculum at national level. This section explores the participants' opinions regarding the employability skills they considered important and which VTC graduates should possess when entering the workplace.

In order to determine the employability skills considered important in the workplace, respondents were provided with a list of 39 employability skills to choose and rank using a four-point Likert Scale ranging from very important, important, somewhat important to not important (See Appendix D for the research questionnaire). The respondents' results are illustrated in Table 5.8:

TABLE 5.8 Respondents' perceptions of the important employability skills in the workplace (n=244)

Rank	Employability skills description	Mean
1.	Teamwork	3.71
2.	Time management	3.66
3.	Positive attitude	3.54
4.	Problem solving	3.50
5.	Coping with multiple tasks	3.46
6.	Planning	3.46
7.	Critical thinking	3.43
8.	Improving own performance and learning	3.42
9.	Creativity	3.39
10.	Customer-focused	3.39
11.	Communication	3.35
12.	Decision-making	3.33
13.	Work ethics	3.31
14.	Initiative	3.28
15.	Self-management	3.27
16.	Information technology	3.21
17.	Analytical ability	3.18
18.	Interpersonal skills	3.18
19.	Capacity for or commitment to lifelong/independent learning	3.17
20.	Logical reasoning	3.14
21.	Managing information	3.12
22.	Presentation skills	3.08
23.	Flexibility	3.07
24.	A democratic orientation to life	3.02
25.	Project management	3.02
26.	Career management	3.01
27.	Leadership	3.00
28.	Entrepreneurial skills	2.98
29.	Emotionally balanced	2.92
30.	Social responsibility	2.91
31.	Negotiation	2.84
32.	Application of numbers	2.83
33.	Tolerate uncertainty	2.83
34.	Sceptical but open-minded	2.81
35.	Persuasion	2.72
36.	Research skills	2.64
37.	Facilitation	2.62
38.	Citizenship/model citizen	2.61
39.	Empathy	2.51

Note. Scale: 4 = Very important, 3 = Important, 2 = Somewhat important, 1 = Not important

In Table 5.8, the thirty-nine employability skills were ranked in order of importance based on their mean importance. Consistent with other countries researched in this study, only six

employability skills will be considered important at the workplace. Six of the employability skills with the highest mean (3.46) and above were considered important in the Namibian context. The six employability skills identified to be important are teamwork, time management, a positive attitude, problem solving, coping with multiple tasks and planning.

Interviews provided the following responses on the question regarding the employability skills they considered most important in the workplace. Four respondents felt that the employability skill of working in teams was an important skill in the workplace. Their comments were stated as follow:

> "So working with people is very, very important also."
>
> "… to relate to people in teams."
>
> "… how to get on with other people."
>
> "How to work with others."

Planning and completing work according to work schedules was another skill considered important in the workplace, as stated by one respondent. The comment provided was:

> "Planning activities, planning skills needs to be integrated in some of these programmes so that people when they come out they know how to state their objectives and clearly work on a plan and complete something on schedule."

Another respondent stated that business communication was an important skill in the workplace. It was indicated by this respondent that VTC graduates lack communication skills and they have difficulties communicating. This is illustrated by the following comment:

> "... we expect that people completing their study should actually be able to express themselves in the official language which is English and they are actually sort of struggling with that."

Marketing skill was considered an important employability skill by one respondent who argued that it is not enough to possess technical skills alone. Employees should also possess marketing skills that will enable them to persuade customers to buy their products.

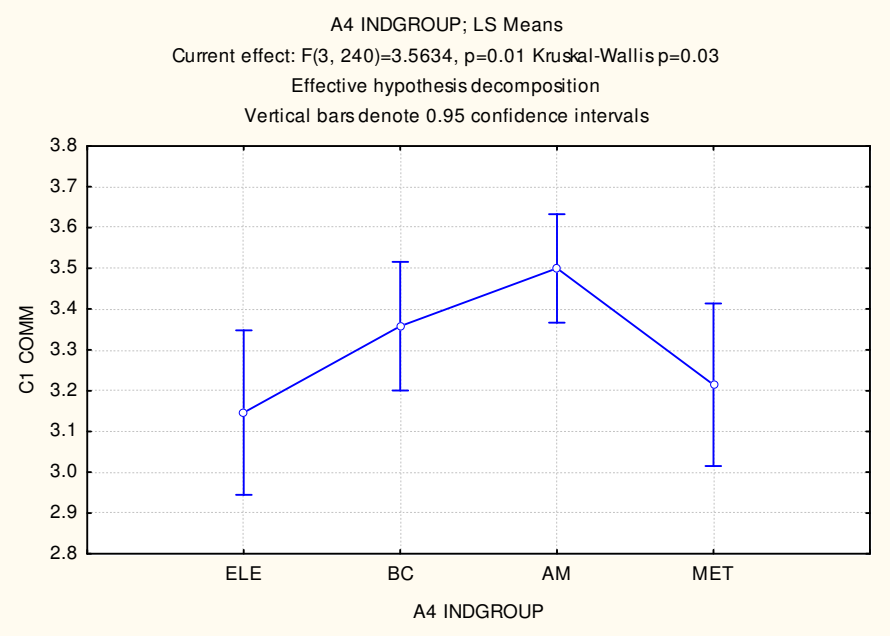
> "Marketing skills are currently very important. You can have the skill how to fix something but if you cannot talk to people and convince them that they should buy your product or they should buy, your services then you are doomed."

Most of the important employability skills are related to work processes, which is not surprising because most production processes have a high degree of labour specialisation. The next section reports on the analysis of important employability skills per trade group.

5.5.1 Analysis of important employability skills per trade groups

When comparing ordinal variables (like employability skills) vs. categorical variables (like trade group) non-parametric analysis of variance was used. The Kruskal-Wallis test was ideal for this purpose. When there were significant differences among the means/medians of the categorical variable (e.g. between the trade groups) the Bonferroni multiple comparisons method was used to investigate where these differences occurred. A significance level of 5% was used in all hypothesis tests, e.g. if the p-value of the test is $p < 0.05$, the hypothesis of no difference is rejected.

Using this approach on the scores of the employability skills of communication (C1COMM), flexibility (C1FLEX), improving own performance and learning (C1IMP), negotiation (C1NEG), positive attitude (C1POS), presentation skills (C1PRE), problem-solving (C1PRO), research skills (C1RES), teamwork (C1TEAM), tolerate uncertainty (C1TOL) and work ethics (C1WORK), significant differences among the trade groups were detected. Figures 5.17 to 5.27 show the various employability skills considered important at the workplacee where significant differences among the trade groups were detected. In each figure the p-values of a parametric ANOVA and the Kruskal-Wallis (K-W) test is given. The p-values of the K-W test are relevant for all these analyses. The graphs of means with variation around the means indicated by confidence intervals, however, give a nice visual interpretation. This visual interpretation is then discussed with the Bonferroni multiple comparisons to confirm where significant differences occurred. Cross-tabulation analyses for the skill of communication (C1COMM) are presented in Figure 5.17:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.17 Importance of communication per trade group (n=244)

The four groups differed significantly relative to the importance of the employability skill of communication as detected with the Kruskal-Wallis test (p= 0.03). Table 5.9 show the Bonferroni multiple comparisons on the importance of communication skills (C1COMM), which explains the difference in Figure 5.17. The Bonferroni multiple comparison on the importance of communication skills versus trade groups are indicated in Table 5.9.

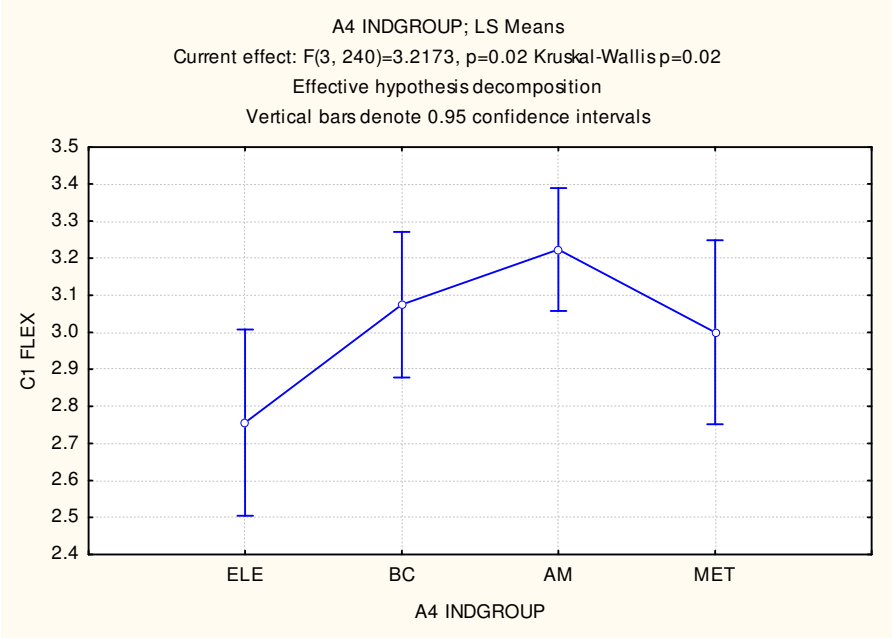
	Bonferroni test; variable C1 COMM (DATA 20100413.sta) Probabilities for Post Hoc Tests Error: Between MS = .42957, df = 240.00				
Cell No.	A4 INDGROUP	{1} 3.1463	{2} 3.3582	{3} 3.5000	{4} 3.2143
1	ELE		0.626107	0.025773	1.000000
2	BC	0.626107		1.000000	1.000000
3	AM	0.025773	1.000000		0.117894
4	MET	1.000000	1.000000	0.117894	

Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

Cell No: 1 = Not important, 2 = Somewhat important, 3 = Important, 4 = Very important,

Table 5.9 Bonferroni multiple comparisons on the importance of communication per trade group (n=244)

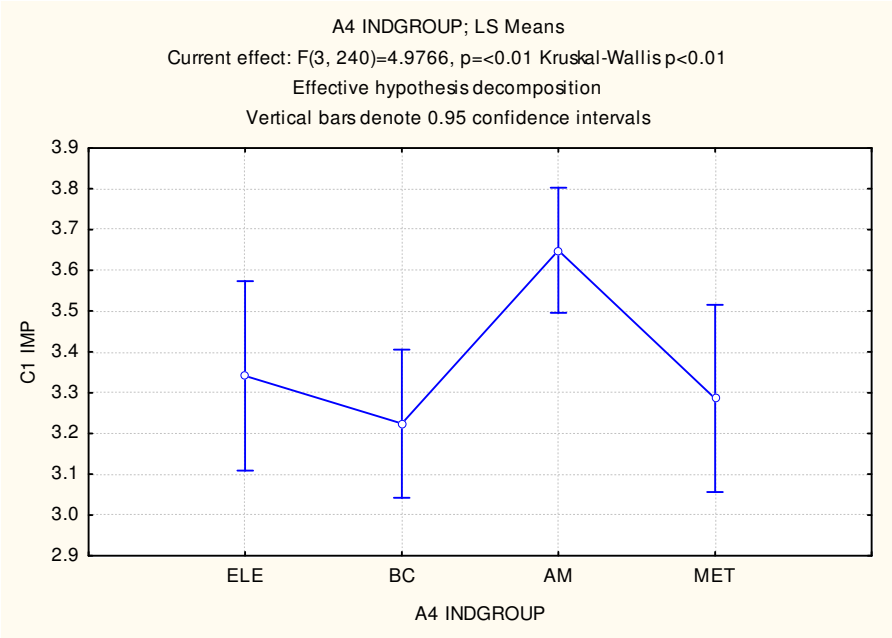
According to Table 5.9, the Bonferroni multiple comparisons show that the electrical and auto-mechanical trades differed significantly (p=0.026) on the importance of (C1COMM). Figure 5.18 represents an analysis on the importance of the employability skills of flexibility (C1FLEX).



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.18 Importance of flexibility per trade group (n=244)

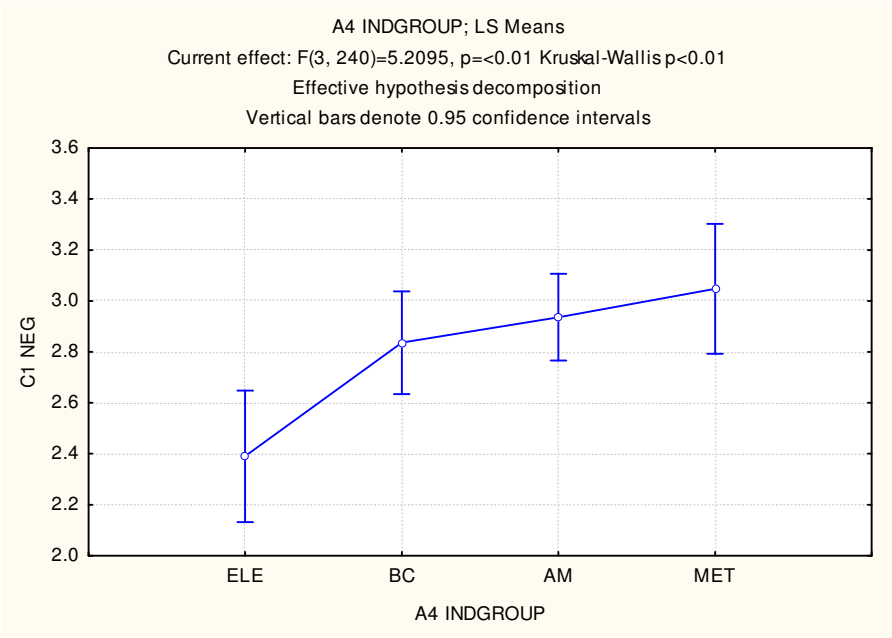
The four trade groups differed significantly on the employability skill of flexibility (C1FLEX) as detected with the Kruskal-Wallis test (p= 0.02). The electrical trades differed significantly (p=0.015) from the auto-mechanical trades on C1FLEX according to the Bonferroni multiple comparisons. Figure 5.19 show analysis for the skill of improving own performance and learning (C1IMP):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.19 Importance of improving own performance and learning per trade group (n=244)

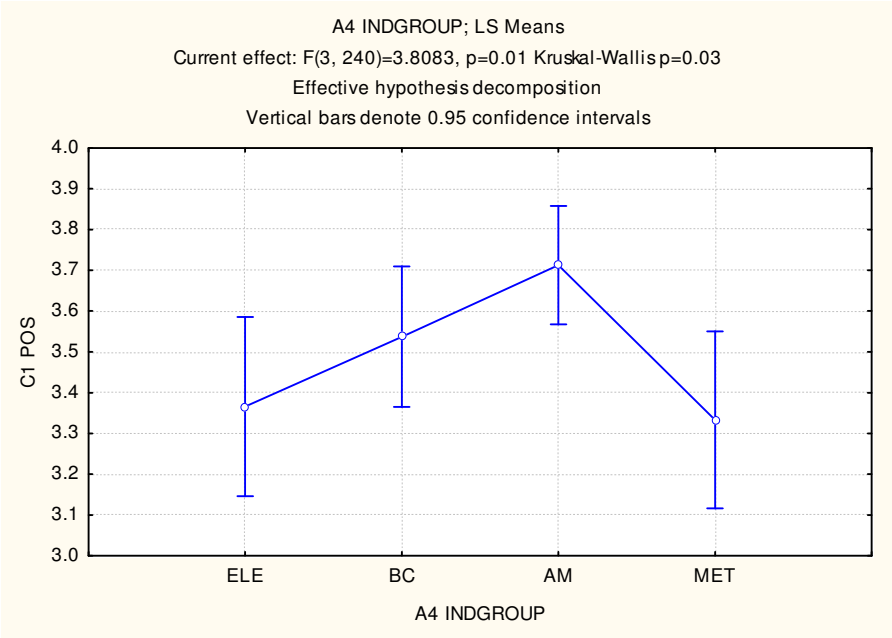
The mean scores on improving own performance and learning (C1IMP) differed significantly over the trade groups as detected with the Kruskal-Wallis test (p= 0.01). According to the Bonferroni multiple comparisons, the auto-mechanical trades differed significantly (p=0.003) from the building construction trades on (C1IMP). Figure 5.20 reports on the analysis of the negotiation skills (C1NEG):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.20 Importance of negotiation skills per group trade (n=244)

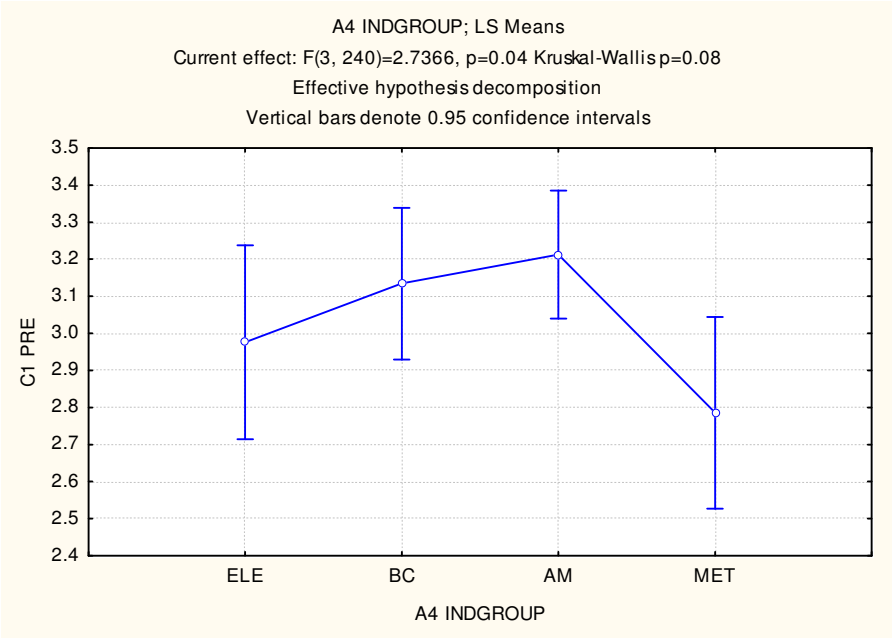
A significant difference can be detected among the trade groups on the importance of the employability skill of negotiation (C1NEG) using the Kruskal-Wallis test (p= 0.01). The Bonferroni multiple comparisons show that the electrical trades differed significantly from the building construction (p=0.047); auto-mechanical (p=0.004) and metal trades (p=0.003) on the employability skill of C1NEG. Analysis for the skill of positive attitude (C1POS) is indicated in Figure 5.21:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.21 Importance of positive attitude per trade group (n=244)

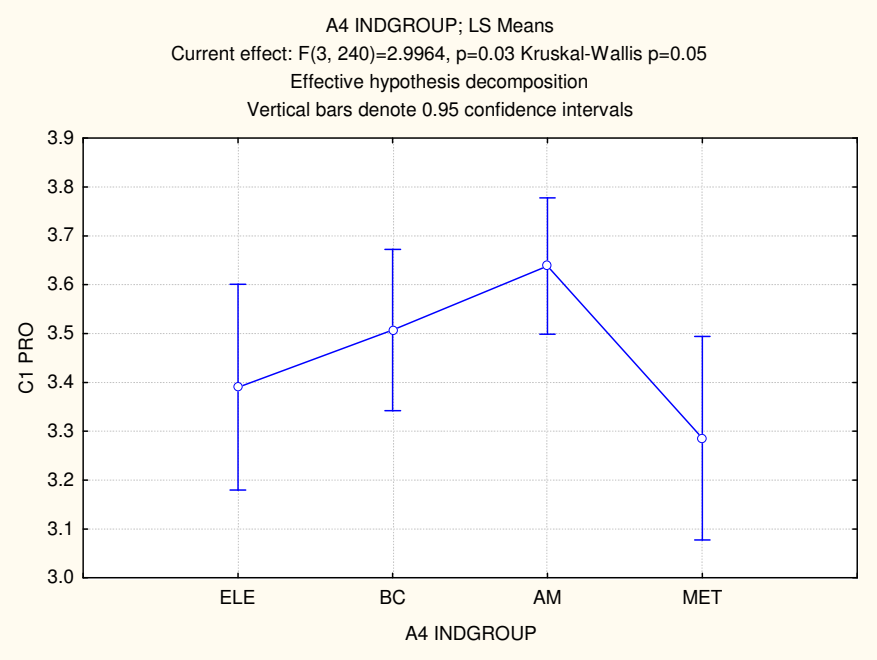
There is a significant difference among all trade groups as detected with the Kruskal-Wallis test (p= 0.03) on the importance of the employability skill of positive attitude (C1POS). The Bonferroni multiple comparison indicates that the auto-mechanical trades differed significantly (p=0.028) from metal trades on (C1POS). Figure 5.22 presents analysis of the presentation skills (C1PRE):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.22 Importance of presentation skills per trade group (n=244)

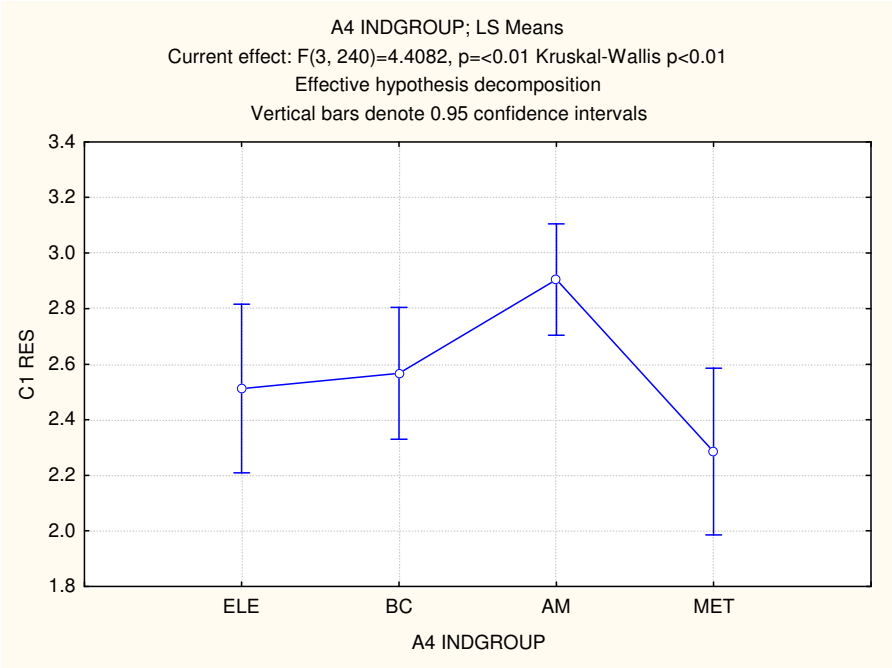
The trade groups differed significantly relative to the importance of the employability skill of presentation (C1PRES) as detected with the Kruskal-Wallis test (p= 0.08). The auto-mechanical trades rated the importance of (C1PRES) higher compared to the other trades. Interpreting the Bonferroni multiple comparisons the auto-mechanical trades differed significantly (p=0.044) from the metal trades on C1PRES. Figure 5.23 reports on the analysis for the skill of problem solving (C1PRO):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.23 Importance of problem solving skills per trade group (n=244)

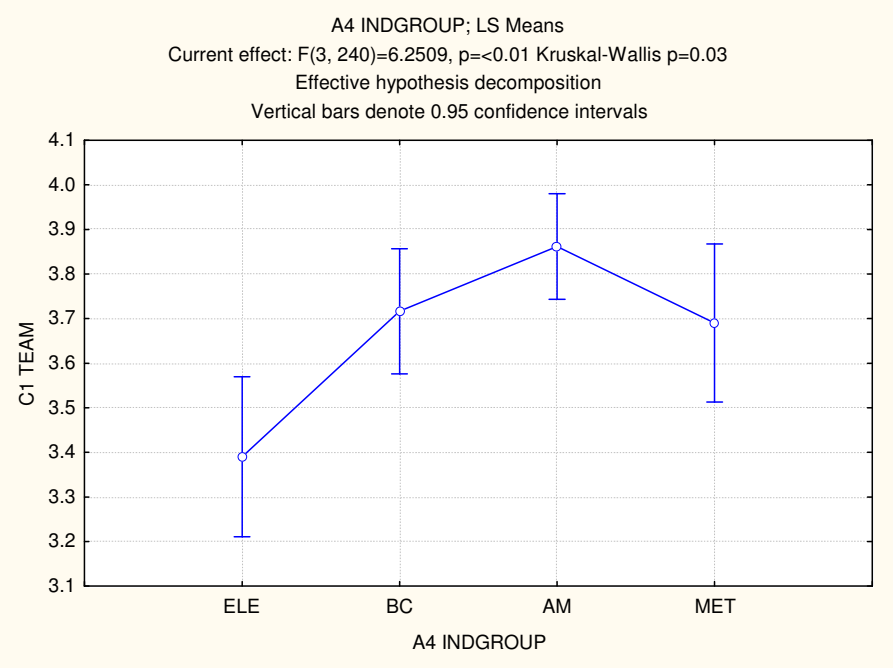
All four trade groups differed significantly on the importance of the employability skill of problem solving (C1PRO) as detected with the Kruskal-Wallis test (p= 0.05). The Bonferroni multiple comparison indicates that the auto-mechanical trades differed significantly (p=0.036) from metal trades on C1PRO. Figure 5.24 indicates the analysis for the skill of research skills (C1RES):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.24 Importance of research skills per trade group (n=244)

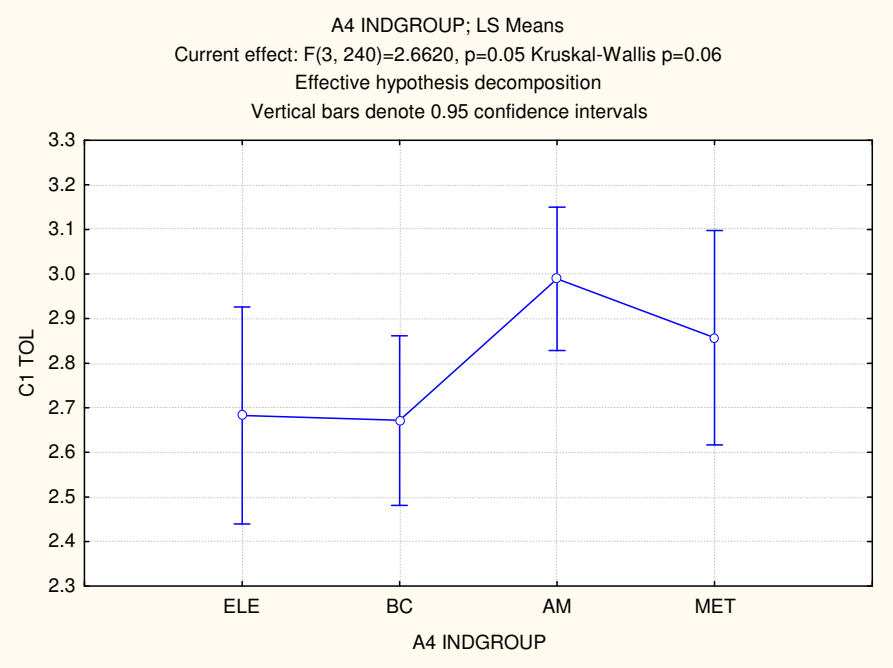
There is a significant difference among all trade groups on the importance of the employability skill of research (C1RES) as detected with the Kruskal-Wallis test (p= 0.01). The Bonferroni multiple comparison indicates that the auto-mechanical trades differed significantly (p=0.005) from metal trades on C1RES. Figure 5.25 presents the analysis for the skill of teamwork (C1TEAM):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.25 Importance of teamwork per trade group (n=244)

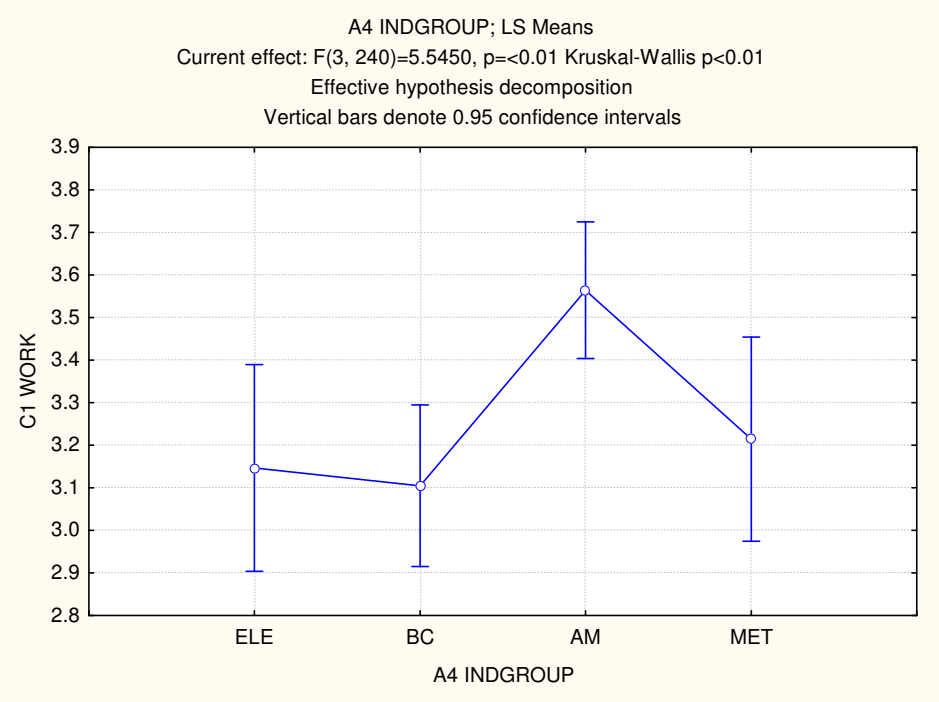
The mean scores on improving own performance and learning (C1TEAM) differed significantly over the trade groups as detected with the Kruskal-Wallis test (p= 0.03). According to the Bonferroni multiple comparisons the electrical trades differed significantly from the building construction trades (p=0.031) and the auto-mechanical trades (p=0.001) on C1TEAM. Analysis for the skill of tolerance (C1TOL) is reported in Figure 5.26:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.26 Importance of tolerance per trade group (n=244)

The four trade groups do not differ significantly on the employability skill of tolerance (C1TOL) as detected with the Kruskal-Wallis test (p= 0.06). According to the Bonferroni multiple comparisons, no significant differences could be detected among the trade groups on the importance of the employability skill of tolerance. Figure 5.27 presents an analysis on the importance on the skill of work ethics (C1Work).



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.27 Importance of work ethics per trade group (n=244)

Significant difference could be detected among the trade groups according to the Kruskal-Wallis test (p= 0.01) on the importance of the employability skill of work ethics (C1WORK). The Bonferroni multiple comparison shows that the electrical trades differed significantly from the building construction trades (p=0.002) and the auto-mechanical trades (p=0.002) on C1WORK.

The paragraph below reports on respondents perceptions regarding employability skills versus specialist knowledge in the workplace. It was necessary to determine the perception of respondents regarding employability skills versus specialist knowledge in the workplace. The results of this investigation are presented in Table 5.10:

TABLE 5.10 In the workplace employability skills are more important than specialist knowledge (n=243)

Statement	Frequency	Percentage
Strongly agree	63	25.9
Agree	104	42.8
Disagree	52	21.4
Strongly disagree	24	9.9
Total	**243**	**100.0**

It is evident from Table 5.10 that 68.7% of the respondents agreed that employability skills are more important at a workplace compared to specialist knowledge, while 31.3% of the respondents disagreed with the importance of employability skills compared to specialist knowledge. The results contradict the findings in Table 5.7 where respondents indicated that they use academic results and relevant work experience as selection criteria for recruiting graduates. The next section reports on analysis regarding respondents' satisfaction with graduates' employability skills they have employed.

5.5.2 Employers' satisfaction level with graduates employability skills

Concerning the employers' satisfaction level with graduates' employability skills in the workplace, respondents were provided with a list of 39 employability skills to indicate and rank the employability skills they were satisfied with. Respondents were required to indicate their satisfaction level by indicating whether they were very satisfied, satisfied or not satisfied regarding the graduates' employability skills demonstrated at the workplace. Results from respondents are illustrated in Table 5.11.

TABLE 5.11 Respondents' perceptions on their satisfaction levels with trainee's employability skills

Rank	Employability skills description	Valid N	Mean	% Very satisfied	%Satisfied	%Not satisfied
1.	Teamwork	244	2.20	36	49	15
2.	Positive attitude	244	2.07	23	61	16
3.	Communication	244	1.99	18	62	20
4.	Time management	244	1.98	25	47	28
5.	A democratic orientation to life	244	1.96	9	78	13
6.	Flexibility	244	1.92	15	62	23
7.	Social responsibility	244	1.91	9	73	18
8.	Work ethics	244	1.91	9	73	18
9.	Application of numbers	244	1.90	10	70	20
10.	Citizenship	244	1.90	9	71	20
11.	Improving own learning and performance	244	1.90	15	60	25
12.	Tolerate uncertainty	244	1.89	13	62	25
13.	Capacity for or commitment to Lifelong/independent learning	244	1.86	7	71	22
14.	Initiative	244	1.86	12	62	26
15.	Entrepreneurial skills	243	1.86	12	61	27
16.	Creativity	244	1.85	19	48	33
17.	Sceptical but open-minded	244	1.84	7	70	23
18.	Coping with multiple tasks	244	1.84	14	57	29
19.	Empathy	244	1.83	5	74	21
20.	Customer-focused	244	1.82	11	60	29
21.	Emotional balanced	244	1.82	5	72	23
22.	Self-management	244	1.82	11	59	30
23.	Decision-making	244	1.81	14	53	33
24.	Planning	244	1.80	14	52	34
25.	Leadership	244	1.80	13	53	34
26.	Problem solving	244	1.80	16	48	36

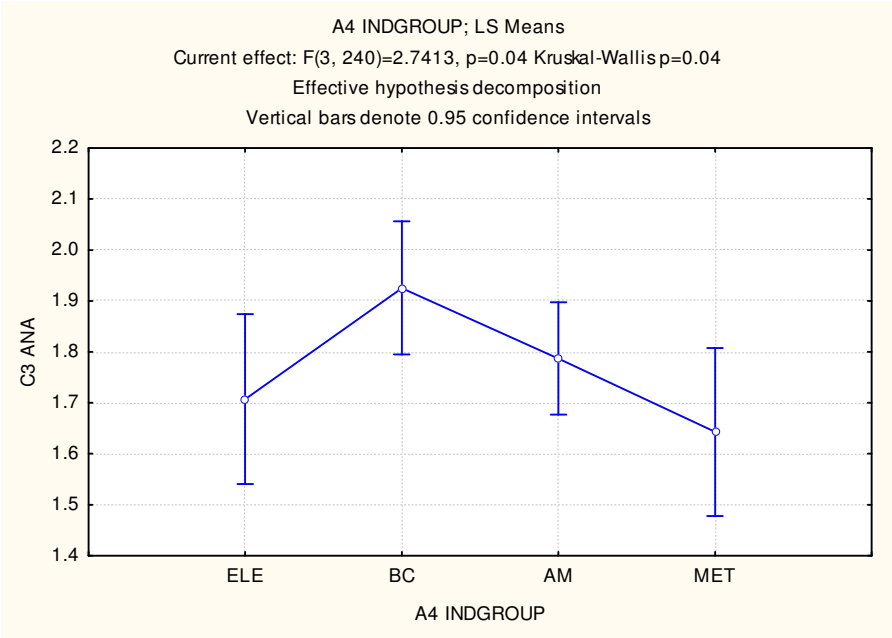
TABLE 5.11 continued

Rank	Employability skills description	Valid N	Mean	% Very satisfied	%Satisfied	%Not satisfied
27.	Presentation skills	244	1.80	11	57	32
28.	Analytical ability	244	1.79	6	66	28
29.	Interpersonal skills	244	1.78	9	59	32
30.	Persuasion	244	1.77	9	59	32
31.	Facilitation	244	1.77	5	68	27
32.	Career management	244	1.77	11	55	34
33.	Negotiation	244	1.77	9	59	32
34.	Managing information	244	1.76	8	60	32
35.	Information technology	242	1.72	15	43	42
36.	Logical reasoning	244	1.70	9	53	38
37.	Project management	244	1.70	9	53	38
38.	Critical thinking	244	1.70	9	51	40
39.	Research skills	244	1.55	6	44	50

Note. Scale: 3 = Very satisfied, 2 = Satisfied, 1 = Not satisfied

The findings in Table 5.11 show that the thirty-nine employability skills were ranked in order of satisfaction level based on their mean importance. The higher mean value indicates the higher satisfaction levels as reported by the respondents. From these findings it can be assumed that respondents were satisfied with the employability skills of VTC graduates they have employed in recent years. The employability skill of teamwork scored the highest mean importance, followed by positive attitude, communication, time management a democratic orientation to life and flexibility. There is an indication from the findings that respondents were satisfied with the employability skills of trainees they have employed in the past, although respondents were least satisfied with employability skills of research skills, critical thinking, project-management skills as well as logical reasoning.

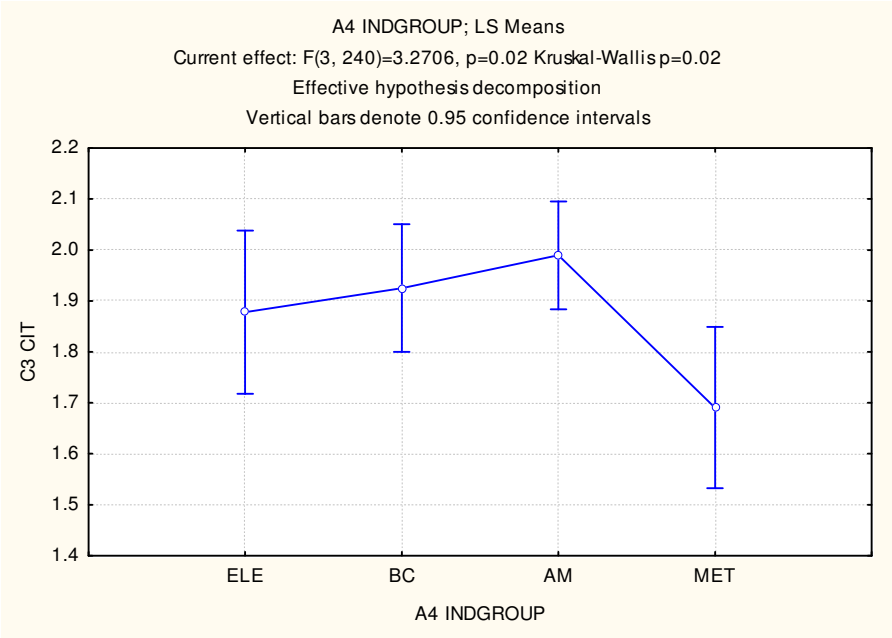
The Kruskal-Wallis test was used for comparing ordinal variables (employability skills) vs. categorical variables (like trade group) non-parametric analysis of variance. Significant differences were detected among trade groups on the employability skills respondents indicated they were satisfied with, such as analytical ability (C3ANA), citizenship/model citizen (C3CIT), coping with multiple tasks (C3COP), creativity (C3CREA), flexibility (C3FLEX), improving own performance and learning (C3IMP), initiative (C3INIT), leadership (C3LEAD), managing information (C3MAN), planning (C3PLAN), positive attitude (C3POS), project management (C3PRJ), teamwork (C3TEAM) and time management (C3TIME). Figures 5.28 to 5.41 show the analysis on the employability skills with significant differences which respondents indicated their satisfaction levels. Figure 5.28 shows analysis for the skill of analytical ability (C3ANA).



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.28 Satisfaction with analytical ability against trade groups (n=244)

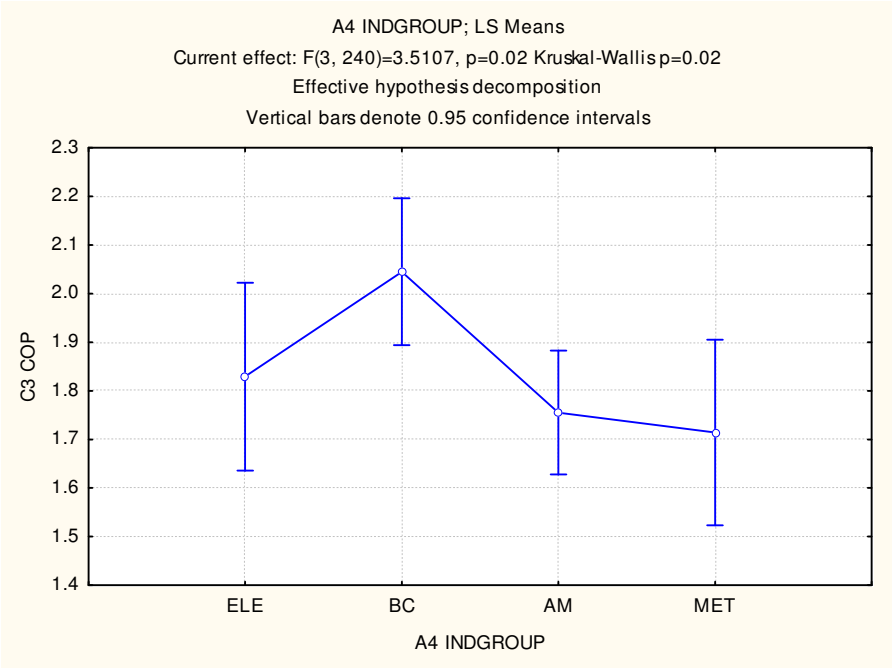
All industry groups differed significantly on the satisfaction with the employability skill of analytical ability (C3ANA) as detected with the Kruskal-Wallis test (p=0.04). A Bonferroni multiple comparison showed that the building construction trades differed mostly (p=0.05) from the metal trades on C3ANA. Figure 5.29 shows analysis for the skill of citizenship/model citizen (C3CIT):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.29 Satisfaction with citizenship/model citizen against trade groups (n=244)

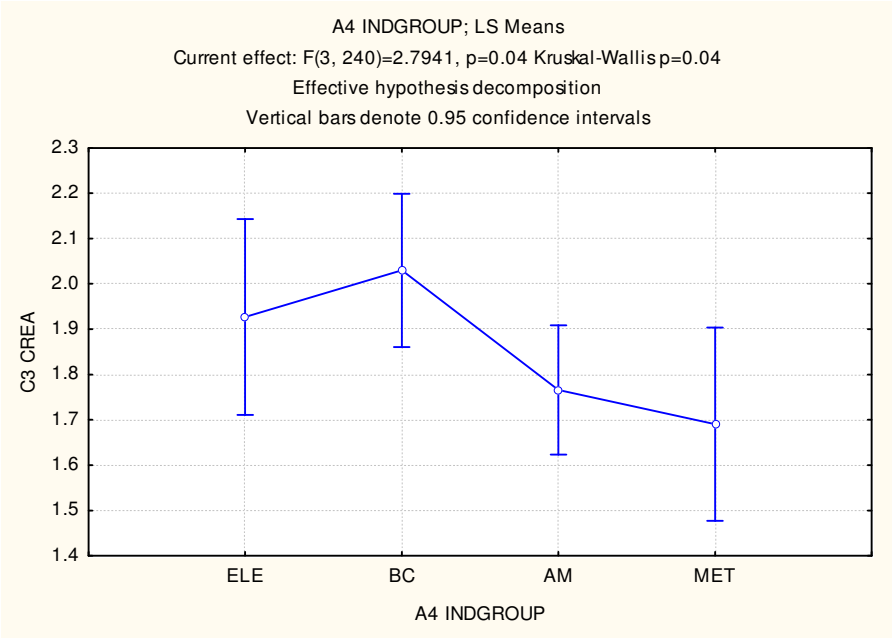
There is a significant different among the four trades on the satisfaction of the employability skill of citizenship/model citizen (C3CIT) as detected with the Kruskal-Wallis test (p=0.02). The Bonferroni multiple comparison shows that the auto-mechanical trades differed significantly (p=0.013) to the metal trades on C3CIT. Analysis for the skill of coping with multiple tasks (C3COP) is reported in Figure 5.30:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.30 Satisfaction with coping with multiple tasks against trade groups (n=244)

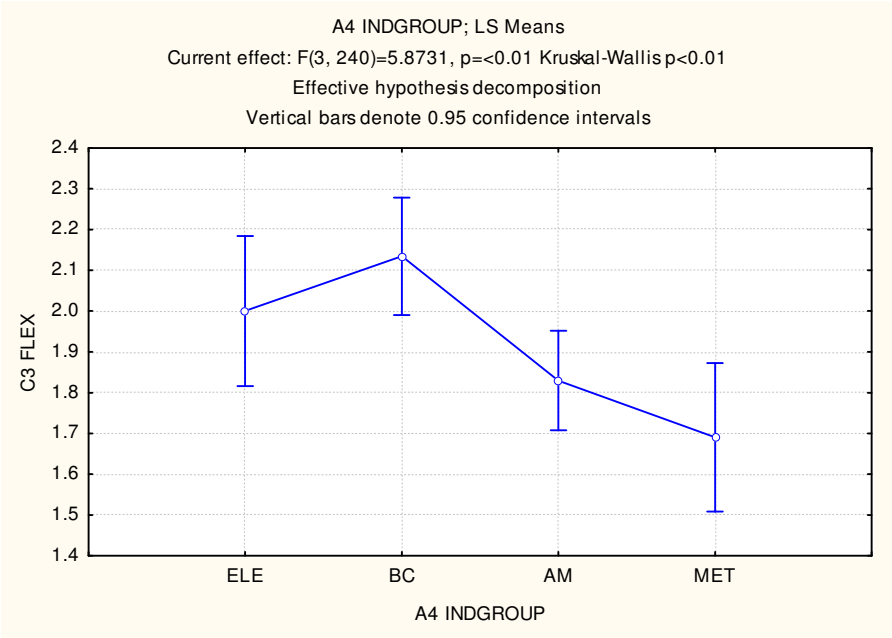
Significant differences among all trade groups can be observed with the Kruskal-Wallis test (p=0.02) regarding the satisfaction with the employability skill of coping with multiple tasks (C3COP). According to the Bonferroni multiple comparisons, the building construction trades differed from the auto-mechanical trades (p=0.026) and the metal trades (p=0.048) regarding C3COP. Figure 5.31 presents analysis for the skill of creativity (C3CREA):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.31 Satisfaction with creativity against trade groups (n=244)

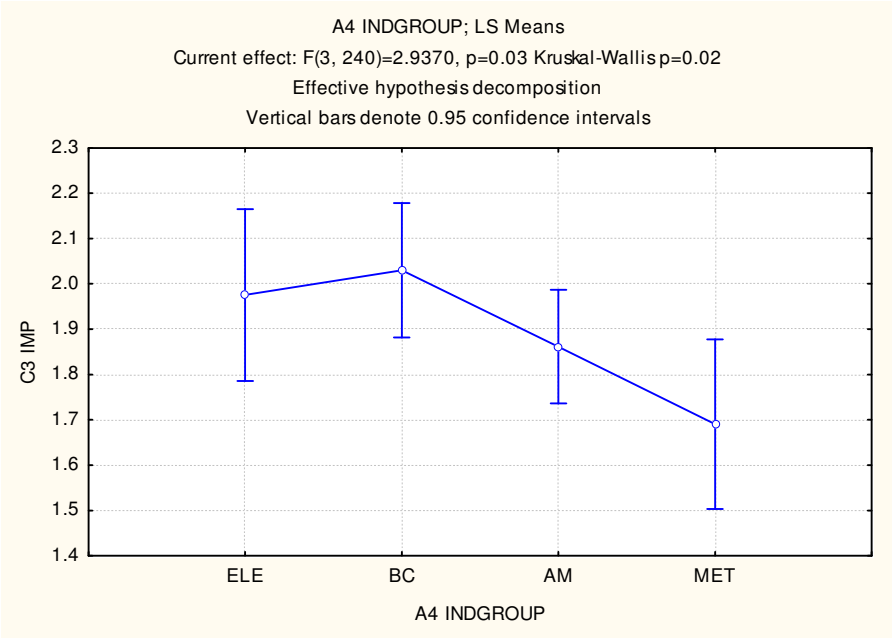
All trade groups differed significantly on the satisfaction with the employability skill of creativity (C3CREA) as detected with the Kruskal-Wallis test (p=0.04). The Bonferroni multiple comparisons show that building construction trades differed significantly (p=0.089) from the metal trades on C3CREA. Figure 5.32 shows analysis for the skill of flexibility (C3FLEX):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.32 Satisfaction with flexibility against trade groups (n=244)

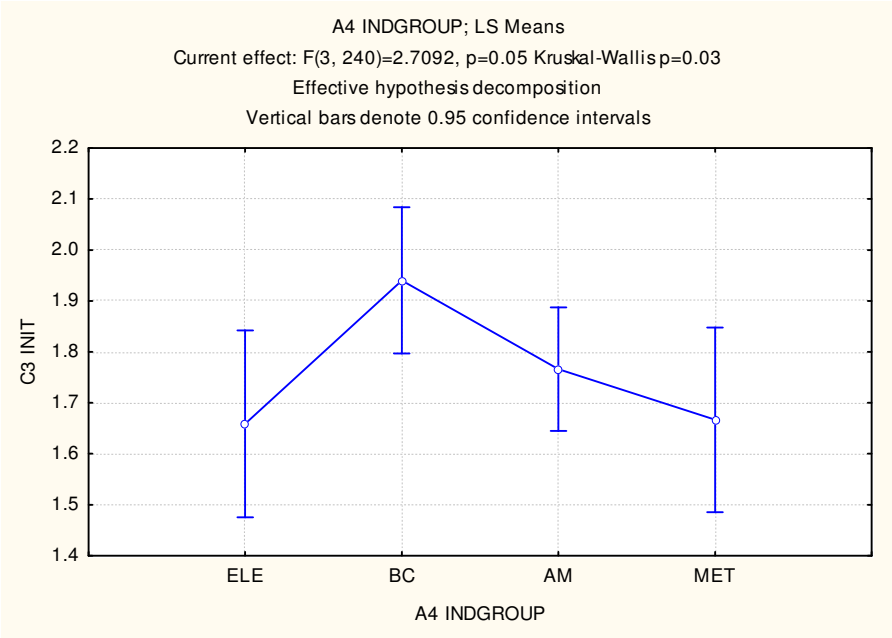
A significant difference can be observed among the trade groups regarding their satisfaction with the employability skill of flexibility (C3FLEX) as detected with the Kruskal-Wallis test ($p<0.01$). The Bonferroni multiple comparisons show that the building construction trades differed from the auto-mechanical trades ($p=0.01$) and metal trades ($p=0.01$) regarding C3FLEX. Figure 5.33 presents analysis for the skill of improving own performance and learning (C3IMP):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.33 Satisfaction with improving own performance and learning against trade groups (n=244)

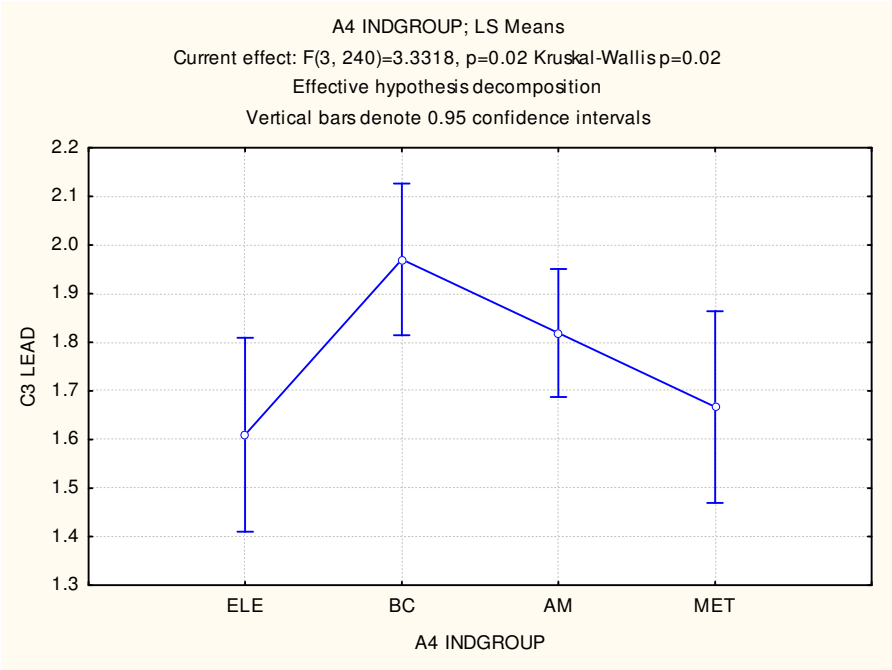
A significant difference can be observed among all trade groups relative to their satisfaction with the employability skill of improving own performance (C3IMP) as detected with the Kruskal-Wallis test (p=0.02). According to the Bonferroni multiple comparisons, the building construction trades differed significantly (p=0.033) compared to the metal trades on C3IMP. Analysis on the skill of initiative (C3INIT) is presented in Figure 5.34.



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.34 Satisfaction with initiative against trade groups (n=244)

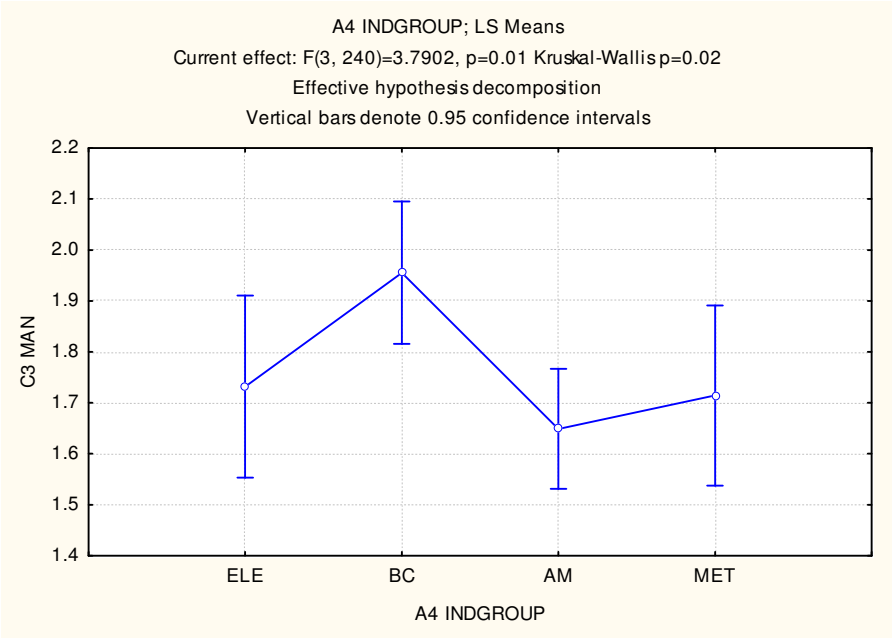
Significant differences among all trade groups can be observed with the Kruskal-Wallis test (p=0.03) on the satisfaction with the employability skill of initiative (C3INIT). The Bonferroni multiple comparisons reveal that the building construction trades differed mostly from the electrical (p=0.101) and metal trades (p=0.123) with regard to C3 INIT. Figure 5.35 reports on the analysis of the leadership skills (C3LEAD):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.35 Satisfaction with leadership against trade groups (n=244)

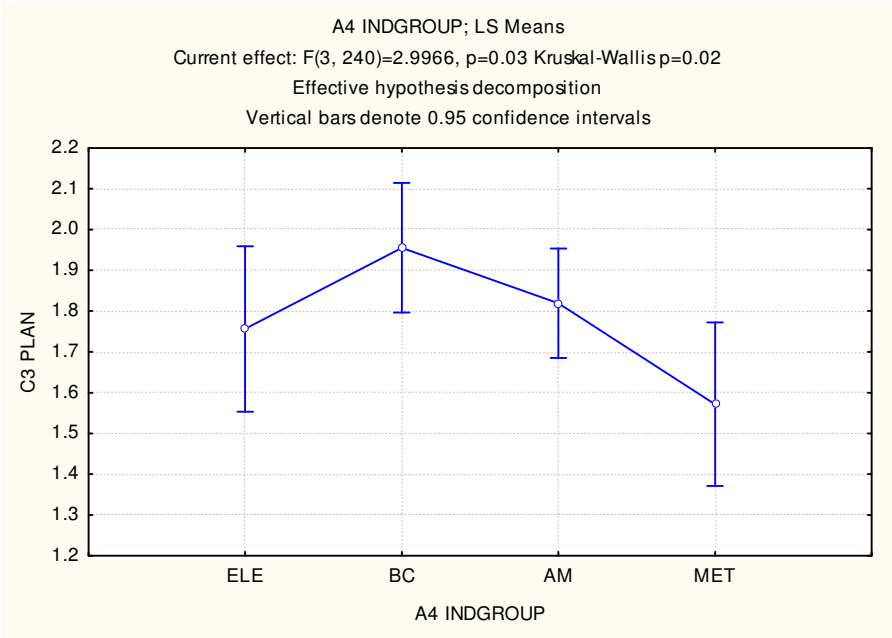
All trade groups differed significantly with respect to their satisfaction with the employability skill of leadership (C3LEAD) as detected with the Kruskal-Wallis test (p=0.02). As indicated by the Bonferroni multiple comparisons, the electrical trades differed significantly (p=0.033) from the building construction trades on C3LEAD. Figure 5.36 presents an analysis on the skills of managing information (C3MAN):



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.36 Satisfaction with managing information against trade groups (n=244)

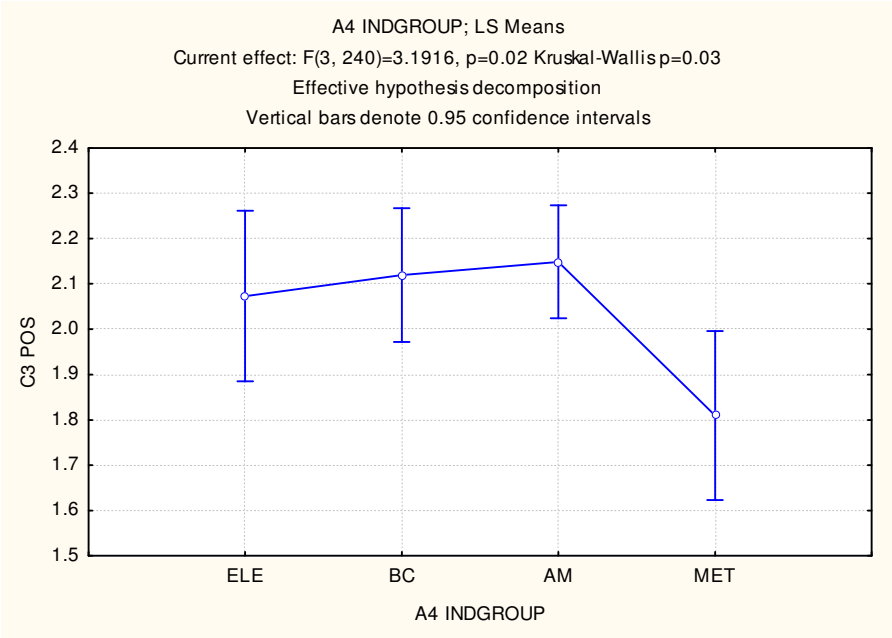
All four trades differed significantly with regard to their satisfaction with the employability skill of managing information (C3MAN) as detected with the Kruskal-Wallis test (p=0.02). The Bonferroni multiple comparisons show that the building construction trades differed significantly (p=0.007) from the electrical trades with respect to C3MAN. An analysis on the planning skills (C3PLAN) is presented in Figure 5.37:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.37 Satisfaction with planning against trade groups (n=244)

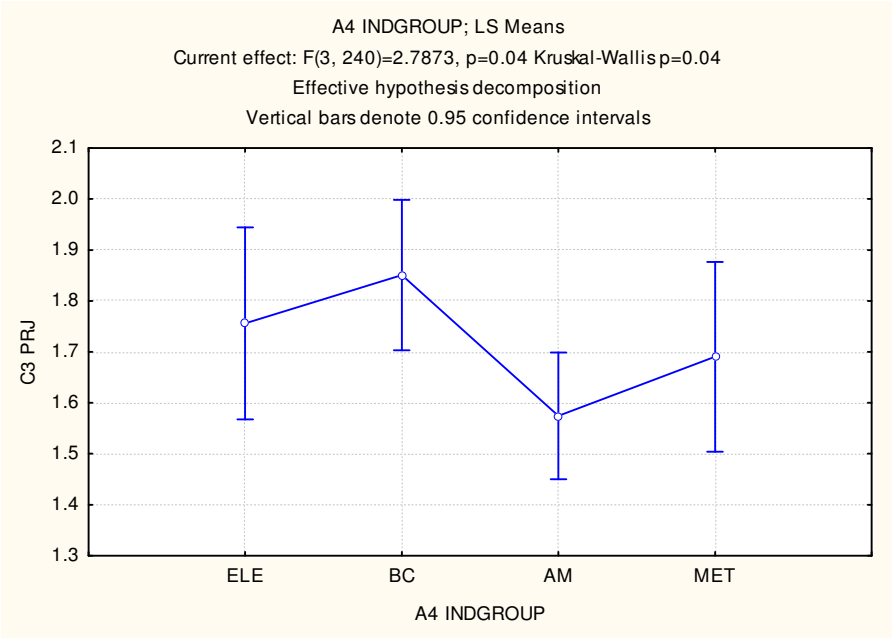
A significant difference can be observed among all trade groups relative to the satisfaction of the employability skill of C3PLAN as detected with the Kruskal-Wallis test (p=0.02). According to the Bonferroni multiple comparisons, the building construction trades differed significantly (p=0.021) from the metal trades on C3PLAN. Figure 5.38 shows analysis on the skill of positive attitude (C3POS).



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.38 Satisfaction with positive attitude against trade groups (n=244)

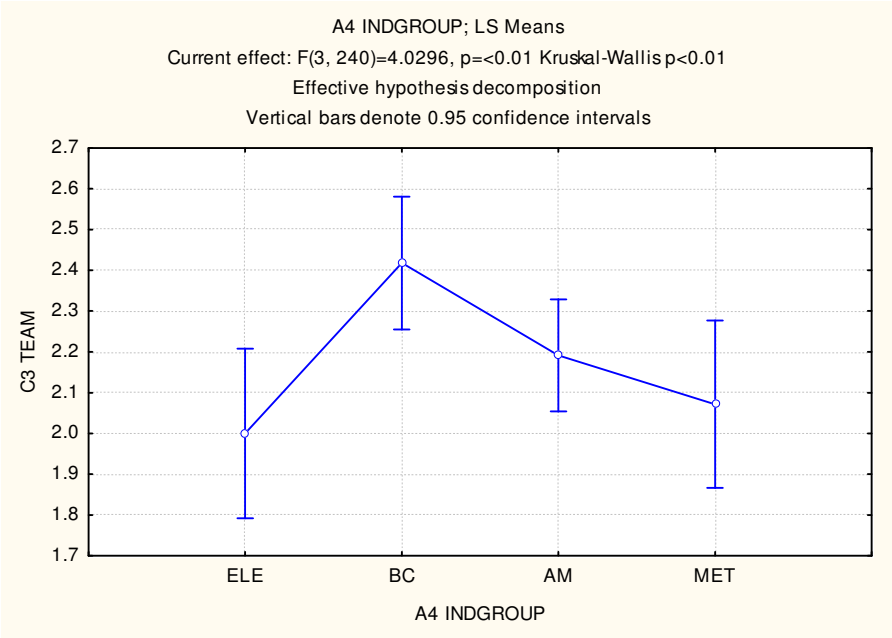
The four groups differed significantly relative to their satisfaction with the employability skill of positive attitude (C3POS) as detected with the Kruskal-Wallis test (p=0.03). The Bonferroni multiple comparisons show a significant difference between the auto-mechanical trades (p=0.019) and the metal trades on C3POS. The analysis on the project management skill (C3PRJ) is presented in Figure 5.39:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.39 Satisfaction with project management against trade groups (n=244)

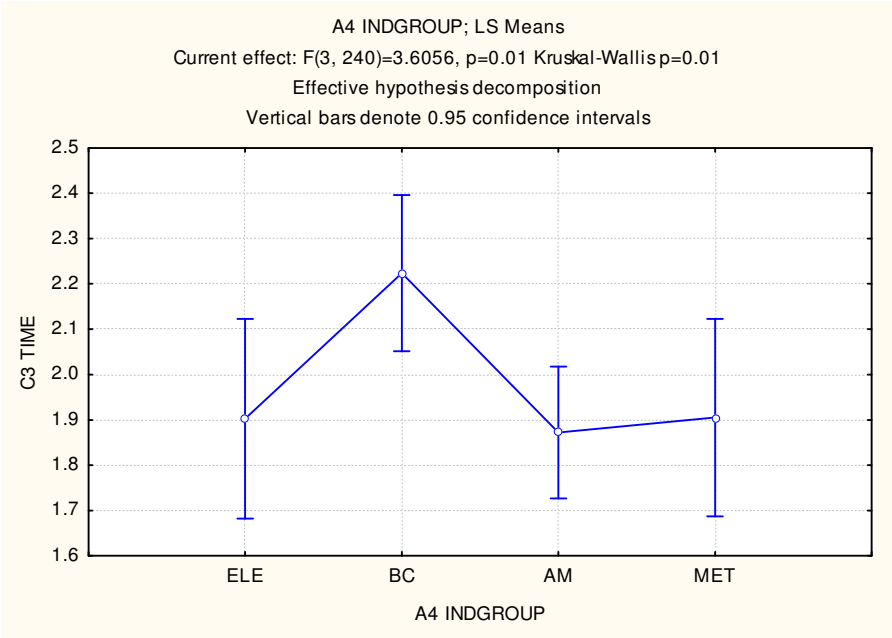
A significant difference can be observed among all trade groups relative to their satisfaction with the employability skill of project management (C3PRJ), as detected with the Kruskal-Wallis test (p=0.04). As indicated by the Bonferroni multiple comparisons, building construction trades differed significantly (p=0.031) from the auto-mechanical trades on C3PRJ. Figure 5.40 reports on the analysis for the teamwork skills (C3 TEAM).



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.40 Satisfaction with teamwork against trade groups (n=244)

A significant difference among all trade groups can be seen on the satisfaction with the employability skill of teamwork (C3TEAM) as detected with the Kruskal-Wallis test ($p<0.01$). The Bonferroni multiple comparisons shows that the electrical trades differed significantly ($p=0.012$) from the building construction trades on C3TEAM. The analysis on the time management skill (C3TIME) is presented in Figure 5.41:



Legend: **Trade group:** ELE = Electrical, BC = Building construction, AM = Auto-mechanical and MET = Metal

FIGURE 5.41 Satisfaction with time management against trade groups (n=244)

All trade groups differed significantly with respect to their satisfaction with the employability skill of time management (C3TIME) as detected with the Kruskal-Wallis test (p=0.01). According to the Bonferroni multiple comparisons, the building construction trades differed significantly (p=0.014) from the auto-mechanical trades on C3TIME. The next section reports on the results regarding the development of employability skills.

5.6 THE DEVELOPMENT OF EMPLOYABILITY SKILLS

This section sought to explore respondents' views on who should develop employability skills and to establish the educational level at which employability skills should be introduced if it should be the responsibility of VTCs. The section further explores respondents' views regarding the assessment of employability skills.

Respondents were requested to indicate from given choices who should be responsible for developing employability skills. Respondents were required to indicate their choices where employability skills development could take place on a four-point Likert Scale ranging from

very important, important, somewhat important as well as not important. It was necessary to find out the preferred choice of respondents so that responses could be compared with findings of the literature review, as well as the interview responses. Table 5.12 illustrates the views of the respondents on who should be responsible for developing employability skills.

TABLE 5.12 Responsibility for developing employability skills (n=244)

Rank	Responsibility for developing employability skills	Mean
	Development of employability skills in family/home	3.6
	Development of employability skills in school	3.5
	Development of employability skills at VTC	3.4
	Development of employability skills at workplace	3.2
	Development of employability skills in society/social context	3.0

Note. Scale: 4 = Very important, 3 = Important, 2 = Somewhat important, 1 = Not important

The findings in Table 5.12 show the most preferred choices from the respondents where employability skills could be developed. The result reveals that the family/home setting is the most preferred option to be responsible for developing employability skills, followed by the school system, VTCs and the workplace. The society or social context is the least favoured in respect of where employability skills should be developed.

The questionnaire contained three open-ended questions to solicit responses from respondents on the questions asked. Open-ended questions allowed respondents to provide answers without being influenced by the suggestions from the researcher (Foddy 1996:127). Responses to the open-ended questions were coded using phrases that were categorised into related themes that described the same content that was investigated. Results from the open-ended questions are reported below.

The second open-ended question was concerned with the responsibility for developing employability skills. Respondents were asked the following question: Who is responsible for developing employability skills?

An analysis of the responses revealed five categories concerning the responsibility for developing employability skills, namely: learners themselves, the workplace, vocational training centres, schools/teachers, parents/family, general/unsure and no responses.

Seventy-one respondents cited that the VTCs should be responsible for developing employability skills. The following is one of the responses provided:

> "VTC teachers should be responsible and also the supervisors at places where students do their practical attachment."

The responsibility for developing employability skills should be the learner's own responsibility, as reported by forty-two respondents. This is illustrated by the following response:

> "Individuals themselves should show interest in achieving employability skills and then the necessary training will follow."

Thirty-nine respondents claimed that parents/family settings should be responsible for developing employability skills, as suggested by the following response:

> "I consider a parent to be more responsible than teachers, because I believe this should first be done at home."

Fourteen respondents cited that the school system should be responsible for developing employability skills. This response was provided by one of the respondents:

> "The teachers and learners. Learners benefit the most while the teachers are responsible for the development."

Four respondents suggested that the workplace could be a better place to develop employability skills. This is reflected by the following response:

> "The organisations where students do their practical attachments should be responsible to provide employability skills to learners, because they are the ones who have the skill already."

Twenty-one respondents could not indicate who should be responsible for developing employability skills, while fifty-three respondents did not respond to this question.

Interviewees provided the following responses about their perceptions on who should be responsible for developing employability skills. Respondents provided mixed responses, citing the individuals themselves, parents, the education system as well as the employers.

Personal self-development and taking initiative was considered important for learning employability skills as argued by four respondents:

> "A person should be able to learn and learning actually starts within the person himself and he or she should initiate that learning process."

> "… ultimately the responsibility of development lies squarely with the individual."

Four respondents viewed the home environment as the ideal place for learning employability skills because parents should support the education system. The following comment was provided by one respondent:

> "It must come from the family and families are part of education. You know we tend to see education as being something that a school does. Parents are part of education. The parenthood is part of education."

Another view provided by three respondents was that employability skills could be learned at schools, because such institutions are responsible for teaching learners. The following comments were provided by two of the respondents:

> "... primary schools, secondary schools and all the institutions which are tasked to help people learn. They have a responsibility to instil this employability skill."

> "But I believe the educational system still has a role to play in sensitising individuals with a view for them to be able to understand the need why they should develop these skills."

In addition to the above-mentioned opinions, two respondents were of the view that the employers have a responsibility in developing employability skills by supporting the individual learners. An explanation given by one respondent was as follows:

> "The employer is also playing a supporting role but ultimately the responsibility of development lies squarely with the individual himself."

The next section reports on the level at which employability skills should be introduced at the VTCs.

5.7 EDUCATIONAL LEVEL FOR THE INTRODUCTION OF EMPLOYABILITY SKILLS

Assuming that it was important for VTCs to develop employability skills, respondents were asked to indicate the educational level at which employability skills should be introduced. Respondents were asked to indicate the educational level at which employability skills education should be introduced at VTC, level 1, 2 or 3. For an explanation of the various levels, refer to Section 5.4.1. Results from respondents are shown in Table 5.13:

TABLE 5.13 Educational levels to introduce employability skills (n=244)

Statement	Frequency	Percentage
Level 1	182	74
Level 2	32	13
Level 3	30	12
Total	**244**	**100.00**

Assuming that VTCs should develop employability skills of trainees, Table 5.13 reveals that the majority of the respondents (74%) indicated that employability skills should be introduced at Level 1.

When asked about the educational level at which employability skills should be introduced at VTCs interviewees cited the following responses:

Six respondents suggested that employability skills should be introduced at the beginning of the course and should go right through the duration of training because that will reinforce the development of employability skills. One respondent stated the following:

> "At the beginning of the course and go right through the course."

On the other hand, one respondent indicated that employability skills should be introduced as from Level 2 or 3 because after Level 1 training the candidate will have a better

understanding of the occupation they are pursuing and how to relate such skills to their occupational choice. The following comment was made by the respondent:

> "… from the second or third year. Now that the person has got a basic understanding of what the job entails and can better relate the soft skills and how to apply that. I believe that every job in its essence and nature will require a different emphasis on soft skills."

The result is consistent with findings in Table 5.13 where the majority of respondents were of the view that employability skills should be developed as from level 1. The assumption was that employability skills should be instilled into the trainees at a very early stage of their training because this will allow them to consolidate the employability skills acquired during the entire duration of their training. The next section reports on the findings regarding the assessment of employability skills.

5.8 EMPLOYABILITY SKILLS ASSESSMENT

The final open-ended question concerned the assessment of employability skills. Respondents were asked the following question: How should employability skills be assessed?

Replies from the respondents were divided into the following seven categories, namely: workplace/practical assessment, formal written assessment, behavioural assessment, performance assessment, general responses, unsure and no responses.

Sixty-nine respondents felt that practical assessment through project work in the workplace could be a better approach for assessing employability skills, as is suggested by this response:

> "Through practicals during job attachment."

Thirty-five respondents indicated that the assessment of trainees' behaviour on a day-to-day basis could be an alternative method for assessing employability skills. This is illustrated by the following response:

> "Through their behaviour and the way they handle themselves on a day to day basis."

Twenty-six respondents preferred formal written examination as an assessment option as indicated by this response:

> "It can be assessed through examination like other courses."

Nine respondents felt that employability skills could be assessed by allowing trainees to work on their own and to make judgements on how they perform and progress while carrying out tasks. This result implies that assessments conducted in a real-life situation could allow trainees to demonstrate the employability skills they possess. This is a response provided by one respondent:

> "Assessed through students' performance as well as their behaviours."

Forty-four respondents could not indicate or were unsure how employability skills could be assessed. Sixty-one respondents did not respond to this question.

Interviewees seemed to be of the opinion that there are several ways of assessing the development of employability skills.

The assessment of employability skills seems to be more credible and valid when undertaken in the workplace during on-the-job application, as stated by two interviewees. One interviewee provided the following explanation:

> "I think it's through the application on the job."

A second view from two interviewees seems to be that employability skills can be assessed by using theoretical tests at the end of each academic year.

> "If you give them a test at the end of the year with the other exams, why not. It couldn't do any harm. At least that would make them think about it."

Two interviewees suggested that assessment could perhaps be recorded by means of portfolio evidence, which could be the keeping of logbooks and the writing of reports while on experiential learning. The following example was given by of the respondents:

> "The person should be required to write a report on what he has done and one of such component should include the employability skill that he has been able to apply during job attachment."

The next section reports on how employability skills development can be promoted.

5.9 PROMOTION OF EMPLOYABILITY SKILLS

The first open-ended question concerned the acquisition and promotion of employability skills at VTCs. Respondents were asked the following question:. How could the acquisition of employability skills be promoted?

In analysing responses to this question, answers were grouped into the following seven categories: participatory and group work, lectures, learner-centred approach, practical exposure, general responses, unsure as well as no responses.

Overall, the preferred mode of promoting employability skills, as reflected by sixty-five respondents, was in the form of lecturing. This comment was provided by one of the respondents:

> "Teachers or lecturers must impose employability skills seriously to learners by teaching them from level 1 up to level 3."

Forty-one respondents indicated that providing practical exposure to trainees was an alternative method of promoting employability skills as stated by the following respondent:

> "Teach them how to cope in real-life situations through on-the-job training. Instructors must follow trainees to their job attachment and evaluate them."

Thirty-one respondents suggested the use of participatory methods and group work to promote employability skills. The following response was provided:

> "I think participatory mode of delivery will be more effective, because every learner will have a chance to take part."

Twenty-seven respondents provided comments not relevant to the question asked or were unsure about the best mode to promote employability skills to VTC trainees.

Twelve respondents indicated that the learner-centred approach could be used in promoting employability skills. This is reflected by the following comment:

> "Learners should be given utmost chances to show how capable they are, with time they learn better."

Sixty-eight respondents did not respond to the question.

Interviewees provided the following responses to the question on how employability skills could be promoted. Four respondents were of the view that employability skills could be acquired and promoted by means of project work during practical training while trainees are on experiential learning at a workplace. The following comment was provided by one of the respondents:

> "Give the student a project where he can go in the society at home or industrial training period and then maybe coming up with answers how he will deal with that specific question in the project itself or in the assignment itself."

Three respondents considered the completion of assignments as well as case studies as alternative methods for promoting employability skills. An example of one response given was:

> "I don't know how VTCs are currently approaching these subjects but one can look at case studies, attachments, assignments …"

On the question how to improve delivery of employability skills, all respondents were of the opinion that employability skills could be improved by inviting speakers from industry to share their experiences with the trainees at VTCs. Experts in the industries have considerable experience and expertise that they can share with trainees from the vocational training centres. One interviewee, for example, explained:

> "Invite business leaders. You know they can have a talk with the students, they can share their experience with the students and the students can learn from that."

To validate the research results of the study the research findings will be triangulated in the next chapter.

5.10 SUMMARY

This chapter presented a statistical as well as a descriptive account of data collected through a survey questionnaire and face-to-face interviews of respondents from 244 companies surveyed in the selected four regions in Namibia.

The findings revealed that employers had mixed feelings with regard to their satisfaction levels with the current VET system in Namibia because the system was not taking the needs of employers into consideration and it was not responsive to the skills demands of employers. The findings further highlighted the employability skills considered important in the workplace in the Namibian context and respondents provided views on how employability skills could be developed and assessed within the vocational education and training system of Namibia.

The next chapter provides an analytical account on the research findings.

CHAPTER SIX

AN ANALYTICAL ACCOUNT OF THE RESEARCH FINDINGS

6.1 INTRODUCTION

The need for this study came as a result of the necessity to empower employees to become better service providers and productive employees in this era of emerging technologies and globalisation.

It is evident from Chapter 1 that there was a perception among Namibian employers that VTC graduates lacked employability skills hence the importance to ensure that such skills become a component of the VET curriculum. The aim of this study was therefore to identify the employability skills considered important in the workplace and determine how such skills could be integrated in the Namibian VET curriculum.

The study focused on seeking responses to the main research questions as indicated in Section 4.4.3.1. Findings to the research questions were presented in the preceding chapter. This chapter provides an analytical account of the research findings and examines the implication of the results.

6.2 TRIANGULATION OF RESULTS

Data for this study was collected through various sources, namely a review of the literature, survey questionnaires and face-to-face interviews, as reflected in Chapters 2, 3 and 4 of this study. In presenting the analytical account of the research findings, the data are triangulated.

Triangulation is a method used in research to compare data from more than one source used in the data-collection process. Denzin (1990:511) sees triangulation as “the application and combination of several research methodologies in the study of the same phenomenon”. He points out that using multiple methods in an investigation “overcomes the weaknesses or

biases of a single method". According to Johnson (2002:43), triangulation is concerned with using "three indicators to strengthen your analysis".

The researcher therefore used data triangulation in the interpretation of the research findings to overcome possible weaknesses that a single method could entail. Data triangulation also validates the research findings by refuting or confirming what has been found in other sources researched in this study. Details of triangulation were provided in Section 4.4.3.4.

6.3 DISCUSSION OF THE FINDINGS

The government of Namibia implemented a VET system with the intention of addressing skills shortages in the country, particularly technical skills at artisan level. The VET system expects employers to contribute to skills development efforts in the country. As discussed in Section 3.4 earlier, the new VET Act in Namibia provides for the establishment of the Namibia Training Authority (NTA). In accordance with the provisions of the new VET Act, the NTA is mandated to "engage business, trade unions, training providers and other relevant stakeholders in building the VET system" (Republic of Namibia, 2008b:6). The Act is equally mandated to establish standing industry skills committees with representatives of employers to assist the NTA in meeting the requirements of key industry sectors (Republic of Namibia, 2008b:6 and 10). Therefore, responses to the research questions were obtained from employers who provide experiential learning opportunities to VTC trainees or employers employing graduates from VTCs.

Employability skills education, particularly in the VET sector, has become an important agenda among employers, scholars and policymakers. The demands placed on workers in the workplace require that workers be equipped with not only technical skills but also employability skills. The VET sector is therefore required to respond to these new skills demands of the workplace. The discussions are presented in terms of the main research questions of the study. The next section presents an analysis on the respondents' demographic information.

6.3.1 Demographic information

This section presents an analysis on the demographic profile of the respondents who participated in the survey.

The majority of participants were primarily private registered companies, constituting 91% of the respondents as reflected in Table 5.1. This result indicated that the private sector is putting more resources into the provision of on-the-job training to VTC trainees as well as employing VTC graduates, compared to government institutions and parastatals. These findings are in line with the findings in Table 5.4 where it is indicated that small businesses are the majority of participants in skills development initiatives in Namibia. Considering these findings, the private sector is the main driving force for the economy of any country. The private sector would thus require more technical skills and expertise to provide products and services that are needed by the economic sector, which the government sector cannot offer. The majority of private companies are involved in the skills development initiatives, as opposed to government, because technical skills offered by the VTCs are mostly needed by the private sector, as opposed to government, which mostly requires administrative skills.

Most of the respondents (81.6%) were male employees (see Section 5.3.2). When gender of respondents was compared to positions in the company significant differences could be detected with respect to ownership of companies (see Figure 5.1). The reason why male respondents are in the majority could be attributed to the fact that there are still very few females in these areas in many companies. In the past, the education system encouraged only boys to acquire technical skills while the girls were encouraged to do courses that boys traditionally did not consider, such as cooking, nursing or office administration. The findings suggest that the Namibian technical labour market is male dominated. During the academic year 2005/06 the number of trainees enrolled at various VTCs constituted 1 391 males compared to 677 female trainees (Republic of Namibia, 2009:1). The high enrolment figure of male trainees shows that men are still in the majority at VTCs. More men would thus graduate and take up employment in the labour market compared to females.

Respondents from the survey conducted consisted of 244 employer representatives in Namibia. The majority of these companies, representing 80.7% of the respondents, are in the Khomas region and mainly in Windhoek (Table 5.2), followed by Erongo region with 11.1% respondents. The capital city of Namibia, Windhoek, is situated in the Khomas region with an estimated population of about 224 000 residents (World Atlas, 2009). Another reason for a high concentration of companies in the Khomas region could be well-established infrastructure in Windhoek such as housing, roads, availability of telecommunication networks, schools, hospitals as well as more business opportunities due to the high concentration of inhabitants in the capital city. The researcher is of the opinion that most of the commercial businesses are situated in the Khomas region because of a high

number of inhabitants in the capital city where most commercial activities take place as opposed to other regions surveyed.

The auto-mechanic sector represented the majority of employer respondents (38.5%) who either employed VTC graduates or offered on-the-job training opportunities to VTC trainees, followed by the building construction trades with 27,5% respondents as indicated in Table 5.3. The findings suggest that the auto-mechanic industry is a sustainable industry because vehicles are produced on a permanent basis and are constantly in demand, and the production of vehicles is associated with new technologies that require innovation and constant learning. Consistent with the new skills required by workers in the auto-mechanic industry, workers in the auto-mechanic industry may also require constant upgrading of skills to meet the changing demands of new skills in the industry. The findings suggest that the auto-mechanic industry requires highly skilled artisans from VTCs, as opposed to the other industry sectors researched in this study, and hence they are in majority in co-operating with VTCs to ensure that industry skills demands are met by the VTCs.

Companies that employ less than 10 workers represented the majority of respondents (30.7%) co-operating with VTCs (see Table 5.4), while companies that employ 101 and more employees where in the minority, representing 14.7% of respondents. Badroodien (2003a:440) quoting Ntsika Enterprise Promotion Agengy/Department of Trade and Industry offers the following definitions for small, medium and large enterprises. Small enterprises employ 11–50 employees, medium enterprises employ 51–100 employees while large enterprises employ 100 and more employees. Using the South African Revenue Services dataset Paterson and Du Toit (2005:479) define small enterprises as those that employ 11–50 employees, medium enterprises employ 51–100 employees while large enterprises employ 100 or more employees. Definitions used in other countries for small businesses are not appropriate to Namibia, for example in the European Union context businesses employing less than 50 persons are considered to be small businesses (Republic of Namibia, 1997:3).

According to Mungunda (2009:2), the Ministry of Trade and Industry in Namibia reviewed the definition of small and medium enterprises and a submission was forwarded to Cabinet and Parliament in Namibia for approval. The new definition, based on full-time employment, is as follows:

- micro-enterprises are businesses employing 1–5 employees;
- small enterprises are businesses employing 6–30 employees;
- medium enterprises are businesses employing 31–100 employees; and

- large enterprises are businesses employing over 101 employees.

This finding is consistent with studies in other countries where it was found that more than 80% of the workforce are employed in small businesses or enterprises that employ 20 or less workers, on average (Ramsey, 1997:29). Given the experience of the researcher as a principal of one of the VTCs in the country, the researcher is aware of the difficulties trainees have in securing experiential learning opportunities in the labour market, which mostly consist of small businesses. Trainees therefore offer themselves to employers to gain experiential learning opportunities at no cost on the employer's side. The findings suggest that reasons for small businesses to co-operate with VTCs are that they provide on-the-job training to the majority of trainees from VTCs without any compensation, hence their involvement in this skills-development initiative.

The findings revealed that owners of businesses (38.1% of respondents) were the majority of participants who completed the questionnaires, followed by supervisors, representing 25.8% respondents and other employees classified as finance managers, secretaries or deputy directors of government ministries (Table 5.5). This result is supported by the finding in Section 5.3.5 where it can be deduced that micro, small and medium enterprises are mostly managed by one person – in most cases the owner – who takes care of all the management functions within the enterprise. Managing directors/chief executive officers are in the minority because they represent very few entities, such as parastatals in Namibia. Interestingly, the majority of respondents who are owners are men, representing 81.6%.with women representing 18.4% (Section 5.3.2). It is a clear indication that women are still not taking up the challenge of owning their own business in this trade. This would require more partnerships with the industry and the education system to collaborate to ensure the participation of girls in technical fields. The next section discusses the analysis on the performance of the vocational training centres in Namibia.

6.3.2 Findings regarding the performance of the vocational education centres in Namibia

This section presents an analysis of the employment trends of VTC graduates in the Namibian labour market, as well as perceptions of respondents on the performance of the VET sector. The findings show that the majority (65.2%) of respondents employ graduates from VTCs, while the minority (34.8%) do not employ VTC graduates (Section 5.4.1). This result is consistent with the findings, which indicated that companies were employing VTC graduates because of the fact that graduates were more able to learn, it took less training

cost and time to train graduates and there was an increase in productivity in the workplace (Figure 5.10). However, the minority who did not employ VTC graduates cited reasons such as irrelevant qualifications that did not meet industry needs, that companies were addressing their training requirements in-house, that respondents were not aware of training opportunities available and that respondents were not happy with the quality of VET qualifications (Figure 5.3). These findings suggest that there is a demand for employing VTC trainees in the Namibian labour market. The fact that employers were employing drop-outs could be attributed to shortage of technical skills in the Namibian labour market as well as the satisfaction level of employers with trainees' basic skills.

In the past vocational education and training, at least in Namibia, has always been dominated by male learners. However, more female employees are seen to be entering VTCs. Concerning the employment status of VTC graduates (Figure 5.2), results show that female trainees employed were in the minority, with an average ratio of 10:3 male to female trainees as determined with the Wilcoxon matched paired test. This finding is understandable because it is coherent with previous results in Section 5.3.2, where the minority of participants who participated in the survey were female employees. The results are consistent with the findings of the Directorate of Vocational Education and Training in the Ministry of Education, which found similar trends in the enrolment status between male and females at VTCs, where it is reported that very few female trainees enrol at VTCs (Republic of Namibia, 2009:1). This result could be related to the findings in Sections 5.3.2 and 5.3.6 where it was found that the majority distribution of respondents was male, and that owners of companies researched where mainly male (Figure 5.1).

The low attendance of women in technical courses appears to be a socio-cultural and technical issue. According to the OECD (1997:1), cultural, religious and social factors influence participation rates of girls in education and training programmes due to the non-recognised value of education for girls and women. Generally, emphasis is placed on traditional courses for girls and no encouragement is given to girls to take subjects such as mathematics, science and business training. While there is no discrimination towards girls accessing VET programmes, their enrolment figures in technical courses remains low, which has a corresponding effect on the number of females completing technical training (Republic of Namibia, 2009:1). The findings suggest efforts should be made to encourage more girls and women to take up technical courses that will allow them greater opportunities to participate in the socio-economic development of the country.

Although most respondents indicated that companies employ VTC graduates (Section 5.4.1), some 34.8% respondents indicated that they did not employ VTC graduates. Data from Figure 5.3 reveal that the majority of the respondents cited the following reasons for not employing VTC graduates: qualifications not meeting employers' needs, training requirements were provided in-house and respondents were not aware of available training opportunities that were relevant to their needs. Other reasons provided were that respondents were not happy with the quality of VET qualifications, there was no requirement for fully qualified personnel because employees were receiving training on modules relevant to the needs of the company operations, while others cited that companies employed staff pursuing training in similar qualifications. This finding is consistent with Johanson and Kukler (2003:18), Marope (2005a:49) and the Presidential Commission on Education and Training (2000:58), who have indicated the weakness of curricula uniformity and the absence of clear testing guidelines for trade testing in the Namibian VET system. The above findings are similar to findings of a study conducted in Australia by Keating et al. (2002:168) who report the views of employers that "VET providers have not been 'client' or industry-focused." The findings suggest that if the curriculum of the VTCs is not uniform and does not reflect the needs of industry, graduates from VTCs will not have the knowledge, skills and attitudes required by industry, which will result in employers doubting the quality of VTC graduates. Interesting enough, when reasons for not employing vocational training centre graduates were compared against trade groups, no significant differences could be detected on the reasons for not employing VTC graduates (Figure 5.4). Employers who are not satisfied with the VET system would obviously not be satisfied with the skills of VTC graduates, while employers not satisfied with the current VET system are not satisfied because the VET system does not take into consideration the needs of employers.

Concerning the education level at which trainees were employed, Figure 5.5 shows that participants on average employed four trainees who have graduated from VTCs. This result indicates a tendency by respondents towards employing more qualified trainees as opposed to semi-skilled trainees. There is a shortage of technically skilled people in Namibia, particularly, at artisan level, which prompts employers to employ trainees from VTCs who qualified as artisans.

The majority of the respondents who employed VTC graduates indicated that they used academic results as the most preferred selection criterion in recruiting graduates, followed by relevant work experience and ability to work in teams (Table 5.6). It is evident from the findings that the respondents' least favoured skills were written and oral communication as well as interpersonal skills as criteria in recruiting VTC graduates. Figures 5.6 and 5.7

reveal that no significant differences could be found when selection criteria for recruiting trainees were compared against trade groups. This result is consistent with findings in Australia by the National Board of Employment, Education and Training (1992:14) indicating that the majority of employers preferred academic results as a selection criterion to recruit new graduates. This finding suggests that employers expected graduates to have good academic results that would predict higher conceptual skills to address difficult tasks at a workplace. Academic results may also suggest that graduates have acquired the necessary qualifications required by employers that would make them better employees in the workplace.

Results in Table 5.7 showed the differentiating skills between successful and unsuccessful graduates in the final selection process. It is evident from the results that specific desired skills or qualifications tended to differentiate successful from unsuccessful candidates at the final selection stage, followed by academic results and flexibility/adaptability (Table 5.7). Consistent with the findings in Table 5.6, enthusiasm, written and oral communication were the least differentiating characteristics between successful and unsuccessful candidates at the final selection process. The National Board of Employment, Education and Training (1992:15) found that employers differentiated successful candidates from unsuccessful candidates on the basis of social skills such as interpersonal skills and presentation during the interview. A cross-tabulation of the factors differentiating successful and unsuccessful graduates in the final selection process by trade groups yielded no significant differences. The findings suggest that employers preferred to distinguish successful candidates from unsuccessful ones because of the specific desired skills and qualifications possessed. Having the desired skills and qualifications could be an indicator that candidates possess the qualifications and analytical abilities to perform in the workplace. While academic results are important at the initial screening of candidates, they are “less important in the final discrimination of unsuccessful candidates because candidates with unsatisfactory results have already been screened out” (National Board of Employment Education and Training, 1992:14).

Of the respondent, 65.2% confirmed that they employed VTC graduates (Section 5.4.1). Figure 5.10 supports this finding and reveals the benefits employers derived from employing VTC graduates. Employers cited benefits of employing VTC graduates such as being more able to learn, less training costs and time required for training graduates, increased productivity in the workplace, current knowledge in the field, graduates' professional qualifications, clear career orientation, more achievement orientation, more independent and better analytical abilities. A comparison of the benefits of employing vocational training

centre graduates against trade groups yielded significant differences. The electrical trades and auto-mechanical trades differed from the building construction and metal trades on the benefit of being more able to learn (Figure 5.11). Apparently, respondents find it appropriate to recruit trainees who have acquired basic skills competencies, as opposed to recruiting candidates who had never received any kind of formal or informal training. The perception is that candidates who had never attended some sort of training might find it difficult to learn in a changing workplace manifested with new demands in the workplace. The findings suggest that employers are keen to employ graduates because of their perceived ability to continue learning in an era of rapid technological changes taking place in the workplace. Because technology is changing so rapidly, it is expected from workers to continue to learn to remain up-to-date with the new skills demanded by these technologies in the workplace. The next section is a discussion on the analysis regarding in-house training and development initiatives of companies researched.

6.3.3 Findings regarding in-house training and development initiatives

With regard to whether respondents had structured development programmes at their workplace for training VTC graduates, the majority of respondents (75,8%) indicated that they did not have structured development programmes in place for VTC trainees (Section 5.4.2). A significant difference could be found between those that indicated that they employed and those that did not employ VTC graduates (Figure 5.12). A higher percentage of respondents who did not employ graduates indicated that they did not have in-house programmes. This finding is consistent with what Ramsey (1997:29) observed. He says that the "problems of providing training in small business and enterprises is a pertinent issue in both developed and developing countries." The majority of companies that participated in the survey are small businesses, as reported in Table 5.4, and to participate in training for small business is considered an expensive undertaking, particularly if such companies do not have adequate resources to spare for training and development. Similar findings were also found in South Africa where small enterprises do not train or spend as much on training as large enterprises (Paterson and Du Toit, 2005:494). The question that arises is therefore whether all training resources should be in the hands of training providers or whether some of these resources should go to the enterprises to pay for their contribution to training (Ramsey, 1997:28). It appears that employers of small businesses are very reluctant to participate in skills-development initiatives due to the cost attached in developing employee skills. As such, they will only contribute to skills development if they could derive some sort of incentives, such as training rebates, to contribute to national skills development efforts. In South Africa, for example, a skills development levy of 1% of the payroll was implemented

by the South Africa government to act as an incentive for employers to invest in training (Paterson and Du Toit, 2005:486). In most cases, small business employers do not see the benefits of having their own in-house structured development programmes, because they can 'poach' skills from other employers who are investing in training and development. In-house structured programmes could enable companies to train employees in skills that are specific to their company needs. Badroodien (2005:99) notes that small enterprises often do not have a wide range of specialisation or positions found in large enterprises and this reduces the demands for training as well as the range of training on offer to employees in such enterprises. Small business have varied training needs, such as training needed for specific products and services, while others train for multi-skilling and flexibility of workers so that they can carry out a wide range of tasks in the workplace (Ramsey, 1997:29).

Findings in Figure 5.13 indicate that respondents aimed to develop graduates during their first year of employment. Of the respondents, 37.3% indicated that they aimed to develop specific technical skills in trainees, followed by 25.0% respondents who aimed at developing graduates with knowledge regarding the organisation. Interestingly, respondents were not keen to develop employability skills such as communication, self-management and interpersonal skills. Data in Figure 5.14 show no significant differences among the trade groups on the aims of developing vocational training centre graduates. This finding is consistent with findings in Australia by the National Board of Employment, Education and Training (1992:15), which found that more than 75% of employers indicated knowledge of the organisation and specific technical skills as areas where new job entrants needed development. Employers' tend to focus on developing specialised technical skills because companies offer specialised technical products and services requiring specialised skills that cannot be offered by VTCs. Also, employers expect VTCs to develop trainees' soft skills before entering the workplace because they do not have the resources to assume such a responsibility (Poole & Zahn, 1993:59; Zinser, 2003:402).

Results in Section 5.4.3 show that respondents had split views on employers' satisfaction level with the current vocational education and training system, although slightly more than half of the respondents (51.6%) indicated that they are satisfied with the current VET system. Figure 5.15 presents a comparative analysis on the satisfaction level with the VET system against trade groups that indicated significant differences. The building construction and the auto-mechanical trades differed from the metal and electrical trades regarding the satisfaction level with the VET system. The building construction and auto-mechanical trades indicated a higher percentage satisfaction level as compared to the metal and electrical industries. This finding could be related to Section 5.4.3 where a split view was

obtained from respondents on whether the VET system takes the needs of employers into consideration, where 52% of respondents indicated that the VET system takes the needs of employers into consideration. This finding suggests that employers had mixed feelings with regard to their satisfaction levels with the current VET system. The current VET system did take employers' needs into consideration, although a number of studies has revealed some shortcomings with the current Namibian VET system regarding a lack of unified curricula at VTCs (Johanson & Kukler, 2003:22; Marope, 2005a:49; Sangari, 1999:18). Respondents were divided on whether they were satisfied with the current VET system and whether the VET system was taking employers' needs into consideration. It appears as if respondents were slightly in doubt on whether the current VET system does meet the needs of the Namibian industry, as reflected in Figure 5.3, where the majority respondents indicated that VET qualifications were not relevant to industry needs.

A split view was obtained from the respondents on whether the VET system produced graduates with skills relevant to their needs, although slightly more than half of the respondents (54.5%) strongly agreed that the VET produced graduates satisfying their skills needs (see Section 5.4.3). When the skills relevant to employers needs were compared against trade groups using contingency table analysis, the metal, electrical and auto-mechanical trades differed significantly as indicated in Figure 5.14. The metal, electrical and auto-mechanical trades indicated a higher percentage disagreement with the VET system producing graduates with skills relevant to employers' needs. This finding can be related to Section 5.5.2 where respondents suggested that they were satisfied with the employability skills of graduates they have employed, as reflected in Table 5.11. The finding is consistent with the Australian National Training Authority (2001:2) who found that over 67% of employers were satisfied that the VET system was providing graduates with skills appropriate to their needs. This result is supported by findings in Section 5.4.3 where respondents expressed their satisfaction levels with the current VET system. The researcher is of the view that employers' satisfaction with the current VET system can be demonstrated by the fact that they were employing VTC trainees as reported in Figure 5.5, and the VET system was producing graduates who possessed the basic skill competences required by employers.

The majority of respondents (52%) strongly agreed that the VET system was not taking into consideration the needs of employers (Section 5.4.3). This finding is consistent with the results in Figure 5.3, where it was indicated by the 23.5% of respondents that VET qualifications were not relevant to the needs of the industry and that they were not happy with the quality of VET qualifications. This finding is also in line with the review of the

literature, for example, Smith and Comyn (2003:20) found that the problem of job entrants entering the workplace without relevant generic or employability skills is created by the schools or vocational institutes. Studies conducted in Australia between 1995 and 2001 revealed similar indicators on employers' views that the VET system does not take into consideration employers' needs (Australian National Training Authority, 2001:2).

In Sections 5.4.3, respondents expressed mixed views although slightly satisfied with the VET system, which is different from other studies. The concerns of employers on whether the VET system was taking employers' needs into consideration, was revealed in findings of Johanson and Kukler (2003:18), Marope (2005a:49) and the Presidential Commission on Education and Training (2000:58) who indicated that training at VTCs was not uniform and that syllabi for certain subjects were absent. The finding suggest that the VET sector should be developed in such a manner so as to take into consideration the needs of employers if VTCs graduates are to be trained to secure employment prospects in the labour market. The implication of not taking employers' needs into consideration could result in a serious inability to address employers' skill requirements, as reported earlier in Figure 5.3.

Regarding the return on investment in skills development, there was consensus among the majority of respondents (77%) that training of VTC graduates pays off and leads to increased productivity at the workplace (Section 5.4.3). The above finding shows similar trends with previous research conducted by the Australian National Training Authority (2001:3) where the majority of employers (74% and 76%) during the years 1997 and 1999 respectively also reported that training pays off through increased productivity.

The finding further corresponds with the debate on human capital theory, which argues that investment in "knowledge, skills and know-how" of the workforce can significantly contribute to higher productivity (see Section 1.6). This finding suggests that investing in skills development could result in higher productivity of workers and economic growth. Trained workers are more productive in the workplace, which could result in higher earnings to employees, more income to the employer through increased profits and increased economic competitiveness of a country. The next section is a discussion on the findings regarding employability skills considered important in the workplace by respondents.

6.3.4 Findings on employability skills considered important in the workplace

As indicated in Chapter 2, the debate on employability skills education was spearheaded by employers' groups in many other countries. These groups argued that employability skills

made it easier for an individual to be flexible and adaptive to transformation due to rapid technological changes and globalisation in the workplace. In support of the literature reviewed, the findings (Table 5.8) revealed that teamwork, time management, positive attitude, problem solving, coping with multiple tasks and planning were employability skills considered critical in the workplace.

In the comparison of variables such as employability skills versus categorical variables like trade group non-parametric analysis of variance was used. The Kruskal-Wallis test was ideal for this purpose. When there were significant differences among the means/medians of the categorical variable (e.g. between the trade groups) the Bonferroni multiple comparisons method was used to investigate where these differences occurred.

Following the latter approach on the scores of the employability skills of communication, flexibility, improving own performance and learning, negotiation, positive attitude, presentation skills, problem-solving, research skills, teamwork, tolerate uncertainty and work ethics, significant differences among the trade groups were detected. Figures 5.17 to 5.27 show the various employability skills considered important at the workplace where significant differences among the trade groups were detected.

With respect to communication skills, the four trade groups differed significantly relative to their view of the importance on the employability skill of communication. According to Table 5.9 the Bonferroni multiple comparisons show that the electrical and auto-mechanical trades differed significantly on the importance of communication skills. The electrical trades differed significantly from the auto-mechanical trades on flexibility skills. The auto-mechanical trades differed significantly from the building construction trades on improving own performance and learning. The electrical trades differed significantly from the building construction, auto-mechanical and metal trade on the employability skill of negotiation. The auto-mechanical trades differed significantly from metal trades on the skill of positive attitude. The auto-mechanical trades rated higher the importance of problem solving compared to the other trades. Interpreting the Bonferroni multiple comparisons revealed that the auto-mechanical differed significantly from the metal trades on presentation skills. The auto-mechanical trades differed significantly from metal trades on problem solving skills. The auto-mechanical trades differed significantly from the metal trades regarding research skills. The electrical trades differed significantly from the building construction trades and the auto-mechanical trades on the skill of teamwork. The four trade groups do not differ significantly on the employability skill of tolerance as well as work ethics.

Respondents interviewed shared the same opinion that working in teams, planning, communication and marketing were important skills in the workplace. In line with the literature reviewed (Section 2.4), planning, communication, teamwork, and marketing were identified as equally important in countries such as Australia and the UK. In the UK, for example, these skills are perceived as important to support an individual through his/her development process, be it in education, training or the world of work in general. Employers stress the importance of not only possessing employability skills, but also the importance of an individual having positive values and attitudes to succeed in the workplace (Section 2.4). The findings justify the point that although workers can be expected to work independently to contribute to the success of an organisation, teamwork is very important and should be considered a positive culture in any organisation.

Managing time is also a very important skill. In competitive market environments, time management is cost effective and workers are expected to manage their time effectively and to complete tasks in an effective and efficient manner. Having a positive attitude at work is very important because an employee with a positive attitude would be better motivated to undertake his/her duties. Such motivation and a positive attitude would certainly result in higher productivity and enhanced professional growth, not only for the individual employee but also for the company at large.

Employers expect workers to possess problem-solving skills, which are essential to solve challenges and tasks encountered in the workplace. Challenges such as addressing disputes may arise during a normal working day. If employees do not possess problem-solving skills, productivity will be hampered because employers have to wait for the services of an expert, possibly from outside, to assist with solving such a dispute.

Most of the respondents (68.7%) indicated that employability skills were important in the workplace when compared to specialist knowledge (Table 5.10). This finding is supported by the Department of Labour (1991:22), Kelly (2001:227), Levy and Murnane (2001:153) and Riordan and Rosas (2003:91), underscoring the importance of employability skills in a workplace as opposed to specialist knowledge. They said that although vocational skills remain important, employability skills have become crucial for the individual's employability.

It is very surprising that respondents indicated that academic results are applied as selection criteria for recruiting graduates. While respondents considered employability skills above specialist knowledge, written communication, oral communication and interpersonal skills were rated least in the selection process of recruiting VTC graduates.

Regarding the satisfaction with respect to employability skills demonstrated by trainees in the workplace respondents rated 39 employability skills that VTC graduates demonstrated in the workplace (Table 5.11). Respondents were mostly satisfied with teamwork, followed by positive attitude, communication, time management, a democratic orientation to life and flexibility. Research skills, critical thinking, project management as well as logical thinking were the skills with which respondents were least satisfied. It is interesting to observe that employers were satisfied with employability skills considered important at the workplace such as teamwork, time management, positive attitude as well as planning skills that graduates demonstrated in the workplace, while the VET sector in Namibia does not make provision to developing employability skills in the VET curriculum.

The College for Out of School Training (1991:2) was the only institution that made such an attempt but could not offer such skills. While there are no provisions in the Namibian VET curriculum to develop employability skills at VTCs, the researcher can only assume that trainees who have demonstrated employability skills in the workplace could have developed such skills themselves in informal settings such as at home or in the social context, as reported by Virgona et al. (2003:33). The next section is a discussion on the responsibility for developing employability skills.

6.3.5 Findings regarding the responsibility for developing employability skills

Skills development can occur in any context such as school, home or in the workplace. The environment for developing skills is very important, as it can contribute to the enhancement of various skills. Employers were asked to indicate where employability skills are better learnt. The findings revealed that the family/home setting was the preferred environment for developing employability skills, followed by school, the workplace and with the minority citing that learning should take place in social contexts (Table 5.12). While some researchers believe that employability skills should be learned in the workplace, some argue about the importance of education providing these before a person graduates from formal education. For example, Butterwick and Benjamin (2006:81) and Spille (1994:17) argue that employability skills development should start at schools taking into consideration the fact that many students leave the education and training sector without the relevant skills to succeed in the workplace. The findings are consistent with Virgona et al. (2003:33) who ranked the most important sources of developing employability skills in the following order: home/family/community, school, formal courses (post-school), workplace and experience/self-taught. The results are consistent with findings from the interview responses (Section 5.6) where interviewees believed that the family, learners themselves, school and

VTCs were responsible for developing employability skills. The finding suggests that employers expect the family or home setting and the school environment to develop employability skills. The reason could be that employers may not have the resources, time and expertise to develop the employability skills of graduates entering the workplace. This was clearly observed by the majority of the respondents who did not have structured development programmes at their workplace (Section 5.4.2). Employers who had development programmes in place aimed at developing specific technical skills as opposed to employability skills such as communication and interpersonal skills (Figure 5.13). The next sections present a discussion on which level employability skills should be introduced.

6.3.6 Findings regarding the level at which employability skills should be developed

Assuming that skills should be developed by VTCs, the findings revealed that the majority of the respondents were of the view that employability skills should be introduced at Level 1 (Table 5.13). This finding is consistent with that of Callan (2003:19), who conducted a study on teachers' and students' attitudes on generic skills development and found that teachers generally agreed that generic skills need to be built "more explicitly into Certificate 1 and 2 courses for most industries". This finding is consistent with the majority of interviewees (Section 5.7) who believed that employability skills should be developed from Level 1.

The finding suggests that employability skills should be introduced at the beginning of the course and should continue right through the duration of the programme to reinforce the development of such employability skills. Employability skills should be instilled in trainees at a very early stage of their education to allow them to consolidate the skills earlier in their training so that when they complete their training, they have gained employability skills that they could transfer to the workplace immediately after appointment. The next section is a discussion on employability skills assessment.

6.3.7 Findings regarding employability skills assessment approaches

The study found that employability skills assessment could be done following various approaches such as workplace/practical assessment, formal written assessment, behavioural assessment, performance assessment and portfolio evidence (Section 5.8). These findings are in line with the literature reviewed, which indicated that employability skills assessment should be conducted in the workplace, classroom or through flexible approaches, such as the development of portfolios, utilisation of logbooks, case studies, role

plays, simulation, working in groups and using information technology (Australian Government, 2006b:48; De la Harpe et al., 2000:234; Paulson et al., 1991:60; Virgona et al., 2003:56). Similarly, Virgona et al. (2003:56) found that results of written assessment and submission of portfolios could provide an indication of a person's employability skills profile.

This finding is consistent with interviewee responses, citing that employability skills could be assessed by the submission of portfolios, direct observation of trainees in the industry or the administration of theoretical tests (Section 5.8). The result suggests that various approaches can be used in assessing employability skills. It is ideal for such skills assessments to be conducted in real-life situations to allow trainees to demonstrate the skills they possess. For example, in assessing how an individual relates to problem solving, teamwork, positive attitude, time management and coping with multiple tasks, a group of trainees could be taken to a workplace and given a project to implement. While trainees are working on this project, the trainer or supervisor could observe in real life how the trainees are executing the project and whether the trainees are displaying such skills and thereafter indicate the trainees' competency levels and where they would need support. The next section is a discussion regarding the promotion of employability skills.

6.3.8 Findings regarding the promotion of employability skills

In an educational context, various teaching strategies or methods could be deployed in teaching learners in a classroom situation. Educators therefore should be conversant with the various teaching methodologies that can be applied in a classroom situation and should be able to determine which methodology is most effective in teaching a particular subject.

The study found that skills could be better promoted through lecturing, practical exercises, participatory group work and learner-centred approaches (Section 5.9). The findings are in agreement with De la Harpe et al. (2000:234) arguing that teaching that involves strategies that will encourage students to plan and monitor their own learning promotes the development of employability skills. The majority of respondents indicated that giving project work to trainees is the preferred option of promoting employability skills. Interviewees were also of the view that employability skills could be better promoted using teaching strategies such as practical demonstrations, project work, case studies or external visits to companies. Interviewees believed that inviting motivational speakers or experts from industries to talk to trainees about their experience in the industry could be a good strategy to improve the development of employability skills at the VTCs (Section 5.9). The finding suggests that trainees learn better in a situation where they are involved, and where they participate and

assume responsibilities for their own learning. Teachers or instructors should create environments where the trainees take full responsibility for their own learning in order to contribute to effective development of employability skills.

6.3.9 Findings regarding curriculum integration

An empirical study was conducted to determine how employability skills could be integrated in the vocational education and training curriculum of Namibia. This was done to provide responses to one of the main research questions.

In Section 2.6, it was stated that the education and training system was responsible to impart skills, knowledge and attitudes to learners to enable them to meaningfully contribute to the socio-economic development of a nation. However, it was found that students in a learning environment experienced difficulties in dealing with real-world problems because of their narrow understanding and appreciation of the business world, which requires a multi-disciplinary view, and due to a lack of integration. The literature review provided insight that integrated curriculum units provide a meaningful context for knowledge and skills with a balance of content and process. It was argued that an integrated curriculum approach was a method used to transfer knowledge, skills and attitudes using a combination of subjects to attain educational goals. It was further argued that the integrated curriculum approach should endeavour to relate the learning process to a real-life situation, particularly in the context of developing the employability skills of learners. The failure of non-integrated approaches was observed by Oates et al. (2002:81) who argue that “learners fail to make the link between key skills such as communication and the specific settings in which they communicate within work.”

The empirical study suggested that an integrated curriculum is viewed as an effective method of teaching because it added more relevance to the subject being taught. It was found that students engaged in an integrated curriculum are more involved in the learning process and are better motivated to learn than students learning in a discipline-based curriculum. It was further found that an integrated curriculum teaching approach teaches students to work in teams and students become more involved and excited, while demonstrating less competition. Work-based learning was considered an effective approach of embedding employability skills development across the learner’s main programme of learning and a call was made to encourage education and training providers to reform their curricula and pedagogy to respond to the call for employability skills development. Section 3.5 highlighted how countries researched in this study, with the exception of Namibia,

adopted policy frameworks for the development of employability skills in the respective country's VET systems. The study also identified a number of integrated teaching approaches that can be adopted in the development of employability skills at VTCs (See Section 2.6.2). The next section is an analysis of the triangulated findings.

6.3.10 Summary analysis of triangulated findings

This section presents a comparative analysis of the results of the various data-collection sources in relation to the main questions of the study. Table 6.1 reveals that the results from the survey and face-to-face interview responses are consistent with the literature review. It is therefore concluded that the findings of the study are valid. Table 6.1 below provides a summary of the triangulated results.

TABLE 6.1 Summary analysis of triangulated findings

Description of key research questions	Reviewed literature results	Questionnaire response results	Face-to-face interview response results
Important employability skills in the workplace	Problem solving, working in teams, managing information, numeracy, communication and using technology	Teamwork, time management, positive attitude, problem solving and coping with multiple tasks	Teamwork, business communication, marketing skills, planning skills
Learning environment for employability skills	Family/home, social context, school, VTC and workplace	Teacher and the learners, VTCs, schools and family	Family, learners themselves, teachers, school and VTCs
Educational level at which employability skills should be introduced	Basic, intermediary and advanced educational level	Level 1	Level 1 and continuing throughout the training programme
Responsibility to develop employability skills	School and refined on-the-job, home, teachers	Teachers and learners, teachers, learners themselves, workplace, vocational training centres, schools, parents/family	Individual, Home/parents, school, workplace
Employability skills promotion	Modelling, group work, discussion strategies, practical and work-related experience	Participatory and group work, lectures, learner-centred approach, practical exposure, general responses, unsure and no responses	Using of motivational speakers or experts from industries
Employability skills assessment	Application on the job, portfolio evidence, theoretical tests, direct observation	Workplace/practical assessment, formal written assessment, behavioural assessment, performance assessment	On the job application, portfolio evidence, theoretical tests, direct observation.

6.4 SUMMARY

This chapter provided an analytical account on the research conducted on Namibian employers regarding employability skills development in the country.

The findings revealed the employability skills considered important in the workplace by employers in the Namibian context. Consistent with the literature review, surveys and interviews conducted, Namibian employers found the employability skills of teamwork, time management, positive attitude, problem solving, coping with multiple tasks and planning ranked in this order were most important in the workplace.

Namibian employers expect workers to demonstrate skills that will make workers more flexible and adaptable to changing conditions in the workplace. The findings have also revealed how employability skills could be better assessed in the Namibian VET system. The implications for employability skills development in Namibia is that policymakers should enact policies that will promote the development of such skills by the education and training sector, and particularly the VET sector, which is the focus of this study. For this to be successful, there should be a good relationship between industry and the VTCs to foster the development of employability skills.

The next chapter provides the synthesis, conclusions and recommendations of the research.

CHAPTER SEVEN

SYNTHESIS, CONCLUSIONS AND RECOMMENDATIONS

7.1 INTRODUCTION

The Government of Namibia has set itself a vision to achieve industrial status by the year 2030 and to improve the social status of its citizens (Republic of Namibia, 2004:15). This noble vision will only be achieved if the citizens of the country are adequately trained to contribute to the socio-economic development of the country. Research has shown that significant investment in education and training contributes to workers' performance in the workplace as well as a country's economic competitiveness. Tamkin (2005:4) points out that training that leads to qualifications offered by current or previous employers contributes to "wage benefits and improved promotability and reduces the likelihood of redundancy for the individual". Tamkin further argues that in the USA, the investment in human and physical capital accounted for 83% of the county's productivity growth between 1948 and 1986. If Namibia is to achieve industrial status, it is imperative for policy makers to invest in developing the skills base of the country to achieve global competitiveness.

It was reported in the study (see Section 2.3) that the effects of globalisation coupled with the introduction of new technologies in the workplace have serious implications for employers, and as such employers are now confronted with the challenge of identifying the types of skills needed in the modern workplace as a result of these global phenomena.

In Section 1.3 of this study it was reported that employers expressed their concerns about the quality of VTC graduates regarding their lack of employability skills and it was suggested that such skills be introduced in the VET curriculum of Namibia. The aim of this study was therefore to fill this gap of employability skills in the Namibian VET system by identifying the type of employability skills considered important in the workplace that VTC graduates should possess when entering the job market.

The scope of this study therefore sought responses to the main research questions as reported in Section 4.4.3.1. The next section presents a synthesis of the research conducted to respond to the main research questions of the study.

7.2 SYNTHESIS OF THE RESEARCH ORIENTATION AND PROBLEM STATEMENT

The study found that globalisation and the emergence of new technologies in the workplace contributed to the creation of serious challenges to employers in responding to new skills demands in the workplace. The emergence of new technologies in the workplace has altered production processes and customer services, which has implications for the way in which the VET sector should respond to the new skills demanded. The study revealed that employability skills education, particularly in the VET sector, has become an important agenda among employers, scholars and policymakers and countries are looking at which employability skills are important in the workplace. The demands placed on workers as a result of emerging technologies require that workers be equipped not only with technical skills, but also with non-technical skills, referred to as employability skills in this study.

The study indicated that employers currently require not only technical skills, but also non-technical skills, referred to as core skills, key skills, essential skills, employability skills, basic skills and workplace know-how (see Section 1.2). Although these concepts are used in different contexts, they all refer to the employability skills that are the non-technical skills demanded from workers in the 21st century.

The problem that necessitated this research was the outcry from Namibian employers who reported that VTC graduates do not possess the appropriate skills required in the workplace (see Section 1.3). Considering the information gap in terms of employability skills in Namibia, it was therefore the objective of this study to fill the information gap and to make recommendations to Namibian policymakers to consider the findings of this study and implement an employability skills curriculum in the Namibian VET system (see Section 1.4).

The theoretical framework of the study was based on the human capital theory, which argues on the premise that investing in the knowledge and skills of workers can contribute to the

productivity and socio-economic development of a country. Human capital theorists argue that employees with the right skills, such as specialised technical skills complemented with employability skills, social capital and emotional intelligence, can enhance productivity at the workplace. While focusing on the importance of employability skills as a crucial ingredient for improving overall workplace performance and productivity, major critics of human capital theory argue that the return to education and the level of wages are not only to the result of skills or knowledge imparted by education, as it might also be the result of social factors or superior ability. It is argued that to invest in human-capital development, the education and training sector has an important role to play in order to meet the changing workplace demands and the socio-economic demands that are associated with globalisation.

7.3 SYNTHESIS OF THE LITERATURE REVIEW CONDUCTED

The literature review conducted for the purpose of this study covered research on employability skills in the UK, the USA, Australia, Botswana and Namibia. In this process, reports, journal articles, books, magazines and newspaper articles were consulted.

A literature review in any study fulfils specific functions. It enables the researcher to determine the present state of the literature in the field, to identify research gaps in the field and to identify appropriate methodologies to potentially fill those gaps. One of the purposes of doing a literature review is to contribute to a better understanding of the key concepts used in the research. Various concepts for employability skills used in countries studied could be found in the literature, although all of them referred to those non-technical competencies required by individuals to perform tasks across a wide range of occupations. Some of the concepts identified from the literature included key competencies (Australia), workplace know-how (the USA), key skills (UK), mandatory key skills (Botswana) and employability skills (Canada). After careful consideration of all these concepts, it was decided to use the concept ‘employability skills’ in this study.

The debate on employability skills education was spearheaded by employer groups who identified those employability skills considered important in the workplace and the role that education and training should play in fostering employability skills education. As such, it was

argued that training providers should establish partnerships with industry in promoting employability skills development.

It was found that “employability skills” was a concept used to describe a wide range of competencies that are neglected by most educational systems worldwide. The concept of employability skills have recently gained popularity among scholars and governments both in developed and developing countries because its importance at a workplace can no longer be taken for granted. It was argued that employability skills make it easier for an individual to be flexible and adaptive to transformation in the workplace, that they make the transition from school to work easier and that they increase employment opportunities for high school graduates.

A comparative study was carried out in five different countries representing developed and developing countries, namely the UK, the USA, Australia, Botswana and Namibia, to identify which employability skills were considered important in the workplace. A variety of skills considered important in the workplace, such as teamwork, problem solving, information technology, communication, planning as well as the application of numbers, were all common to the countries studied, with the exception of Namibia, were no curriculum on employability skills could be found.

The study found that although employability skills are mutually exclusive from values and attitudes, these issues are interrelated because positive values and attitudes lead to better outcomes at work, hence values and attitudes are both required in the workplace. Values and attitudes were described in the context of this study and were found to be those universally accepted norms and behaviours required to be displayed by individuals in any social context.

The literature review informed this study regarding the factors that contribute to the demand for employability skills. The impact of globalisation associated with emerging new technologies as well as the information explosion due to the introduction of advanced information communication technologies were identified as the most significant contributing factors that are transforming the workplace and now demand new forms of skills from workers.

Given the demands in the workplace for new skills, the role that the education and training sector should play in fostering skills was emphasised and lifelong learning was recognised as

contributing significantly to upgrading and updating the skills of workers. It was argued that the education and training sector should be responsible for developing employability skills, because graduates leave the school system without the requisite skills to succeed in the workplace. In assessing employability skills, the study reported various approaches that could be used in assessing employability skills and emphasis was placed on assessing employability skills in real-life contexts.

It was argued that the objectives of education and training systems are well articulated in school curricula, but that teachers are still confronted with the challenge of creating stimulating learning environments for learners. It was reported that to achieve educational goals, the education and training system should consider adopting and implementing curriculum-integration approaches in order to enhance the learning process of students. The relevance of adopting an integrated curriculum in an education and training system could lead to higher student achievement and students performing better in an integrated approach when compared to students enrolled in single-subject programmes of study.

A comparative study on selected countries, looking at the education system, the provisioning of employability skills by the VET sector and assessment of employability skills in particular, was done in this study. It was highlighted that in the UK there were policy frameworks in place that fostered employability skills development in that country's education and training system. It was also indicated that the apprenticeship frameworks in the UK contained qualification levels as well as the key skills required to be transferred to the apprentices. Students who participated in apprenticeship programmes were required to produce a portfolio of evidence that demonstrated their mastery of the key skills acquired.

The implementation of employability skills in the USA was also analysed in this study. It was reported that the SCANS Report made provision for the development of know-how skills by the education and training sector. It was indicated that know-how skills were addressed by the education system through various training providers, and that assessment of employability skills takes the form of criterion-referenced assessment such as performance tasks, open-ended response questions, journals, portfolios and videos.

An analysis of the Australian education and training system, looking particularly at the VET system, the development of employability skills as well as the assessment of employability

skills, was done. It was reported that the Mayer Committee Report of 1992 fostered the development of employability skills in Australia. Following the recommendations of the Mayer Committee, employability skills were integrated into the VET curriculum and as a result they were included in training packages across the VET sector. It was further reported that various providers such as registered training organisations, including public Technical and Further Education (TAFE) colleges, private providers and community providers, offer employability skills development. In Australia, four approaches are used to assess employability skills development in the Australian VET system, namely holistic judgement, portfolio assessment, workplace assessment and standardised instrumental assessment.

In Botswana, the VET system was reformed to ensure that the system was responding to the needs of employers and producing quality graduates. The reform process resulted in the implementation of the BTEP, which is geared towards equipping trainees with various skills, knowledge and understanding of the occupation as well as vital skills, which are mandatory key skills that one needs to succeed at work and in life. In Botswana, the assessment of mandatory key skills takes the form of case studies, an investigation or a practical assignment at the appropriate level.

Namibia adopted the National Vocational Training Act 18 of 1994, which regulated the provisioning of VET in the country. It was revealed that vocational training standards were developed for the VET system and implemented, which outlined the theoretical as well as the practical aspects of an occupation to be learned by trainees. The latter standards did not provide any indication of employability skills to be offered by VTCs and no evidence could be found in Namibia of employability skills development in the VET sector. The absence of any evidence of employability skills development contributed to the assumption by the researcher that the Namibian VET system does not teach employability skills to trainees. The above comparative analysis provided good lessons to Namibia on how to address employability skills provided by the VET system. An important lesson offered by the various countries studied is the need to adopt and implement an employability skills development policy framework.

The following section provides a synthesis of the research design and methodology of the study.

7.4 SYNTHESIS OF THE RESEARCH DESIGN AND METHODOLOGY

The study was conducted within the interpretive research paradigm, since the aim of the study was to investigate the perception of employers on the important employability skills employers expected from VTC graduates entering the workplace. Through the interpretive research paradigm, the researcher was interested in the subjective world of the respondents' views on the employability skills they considered important in the workplace and that VTC graduates should possess when entering the workplace. The researcher used both qualitative and quantitative methods in collecting and analysing data for the study, and data for the study were collected by means of a questionnaire and face-to-face interviews conducted by the researcher. Triangulation, as a method used in combining different data sources in a singular study, was used to strengthen the findings of the study and to rule out possible bias.

7.5 SYNTHESIS OF THE RESEARCH FINDINGS

This study attempted to find answers to the main research questions as outlined in Section 4.4.3.1 of this study. This section provides a triangulated data synthesis of the findings of the main research questions to address possible bias in the research findings.

7.5.1 Synthesis of important employability skills in the workplace

The literature review (see Section 2.4) highlighted the employability skills considered important in the workplace, while the study (see Section 5.5) found the employability skills of teamwork, time management, a positive attitude, problem solving, planning and coping with multiple tasks as important employability skills in the workplace. It was established (see Section 5.5) that interviewees were of the opinion that employability skills such as teamwork, business communication, marketing skills, planning skills and communication were important in the workplace, and interpersonal skills such as being truthful, fair and upright were also deemed important.

When employability skills where compared to trade groups using non-parametric analysis of variance, significant differences could be detected amongtrade groups with employability skills of communication, flexibility, improving own performance and learning, negotiation, positive

attitude, presentation, problem solving, research, teamwork, tolerating uncertainty and work ethics. The employability skills identified in the research correspond to a large extent to the employability skills as identified in the literature review. Most of the important employability skills found in this study are related to work processes, which is not surprising, as all production processes have a high degree of labour specialisation.

7.5.2 Synthesis of the responsibility for developing employability skills

In the literature review (see Section 2.5.5), the most important sources of developing employability skills were found and ranked in the following order: home/family/community, school and the workplace. The study (see Section 5.6) came to similar findings and ranked the sources for developing employability skills in the following order: family/home, schools, VTCs, workplace and social context. The results showed that respondents agreed that the family, learners themselves, teachers, school and VTCs were responsible for developing employability skills. It was further found that interviewees believed that the family, learners themselves, teachers, school and VTCs were responsible for developing employability skills (Section 5.6). The above findings suggest that employability skills development should start at home as a result of effective parenting and should continue in the school system because many learners leave education without the requisite skills to succeed in the world of work.

7.5.3 Synthesis of the educational level at which employability skills should be introduced at vocational training centres

The study found that the education and training system should play an important role in developing employability skills. To reinforce the development of employability skills at VTCs, it should commence at an early stage of the schooling system (see Sections 3.5). The study found that employability skills development should commence at Level 1 at the VTCs (see Section 5.7). Interviewees were of the notion that employability skills development should start from Level 1 right through to the end of the programme (see Section 5.7). The study suggested that employability skills should be introduced at an early stage at the VTCs to enable trainees to reinforce such skills so that by the time trainees leave the VTCs they possess the employability skills needed in the workplace.

7.5.4 Synthesis of employability skills assessment

The literature review in Section 2.5.6 highlighted a number of assessment approaches, such as written assessments, development of portfolios, utilisation of logbooks, case studies, role plays, simulation, working in groups and using technology. The study found that it was more appropriate to assess the employability skills by means of practical assessment, formal examination and tests as well as assessing personal behaviours and performance of trainees (see Section 5.8). Interviewees expressed the view that the assessment of employability skills could take the form of practical assessment in the workplace, theoretical assessment, keeping log-books and report writing. The study suggests that it is ideal for employability skills assessment to be conducted in a real-life context to enable trainees to demonstrate their competence in employability skills.

7.5.5 Synthesis of the promotion of employability skills

In promoting employability skills, the study suggested a number of approaches, such as practical demonstrations, project work, case studies or external visits to companies (see Section 5.9). Interviewees were also of the view that employability skills could be better promoted using teaching strategies such as practical demonstrations, project work, case studies or visits to companies (see Section 5.9). Interviewees further believed that inviting motivational speakers or experts from industries to talk to trainees about their experience in the industry could be a good strategy to improve the development of employability skills at the VTCs (see Section 5.9). The study suggested that trainees should be involved and should take responsibility for developing their own employability skills.

7.5.6 Synthesis of curriculum integration

The literature review (see Section 2.6) pointed out the difficulties students experience in dealing with real-world problems because of their narrow understanding and appreciation of the business world, which requires a multidisciplinary view. It was argued that a lack of integration resulted in courses and instructors concentrating on their specialised knowledge. In addressing the barrier of integration, the education and training sector adopted the curriculum-integration approach. The curriculum-integration approach seeks to relate the learning process of students to real-life situations and thereby to enable students to meet their intended learning objectives.

7.6 A PROPOSED INTEGRATED CURRICULUM MODEL/FRAMEWORK FOR DEVELOPMENT OF EMPLOYABILITY SKILLS AND ITS IMPLICATION FOR THE PROVIDERS OF VOCATIONAL EDUCATION AND TRAINING IN NAMIBIA

In Chapter Two of this study it was argued that the education and training system is confronted with challenges of globalisation, rapid changes in technologies as well as structural adjustment in the workplace, and as such, educational policymakers are looking at strategies to reform the education and training system to become responsive to the changing demands of new skills at the workplace. Based on the insights presented in chapters Two and Three of this study as well as the survey findings, the researcher deemed it necessary to develop and to propose an integrated curriculum model/framework for the Namibian VET system. Its justification is closely linked to the discussion of the importance of human capital for workplace productivity and performance. On the one hand, the model/framework addressed a major weakness of human capital theory, namely the fact that employability skills are not fully taken into account when looking at the effects that education and training have on the returns on investment to education and training. On the other hand, it also addressed the issue of where the development and investment of employability skills should take place.

As was discussed in Chapter One, in which the theoretical framework was presented, employability skills are of a general nature. Therefore, although firms deem employability skills as important, they are less inclined to develop them at the workplace (as Table 5.12 in Chapter Five demonstrates, developing skills at the workplace is considered the second-least important choice). This might indicate firms' concern that the development of employability skills is costly, while they are transferable to other sectors as well. In this context, most firms might be more concerned with getting the proper basic skills such as sufficient reading and writing skills as well as mathematical skills right. Another reason for the reluctance of firms to engage in the development of employability skills might be the fact that most employability skills are difficult to grasp, which makes it more difficult to address directly through concrete interventions. There is therefore a need and justification to develop employability skills as early as at school level, at VTCs and at home. The proposed integrated curriculum model/framework, as presented in Figure 7.1, was developed based on the literature review conducted as well as the survey findings.

In adopting an integrated curriculum, educational policymakers must be aware of the factors impacting the education and training system. The key features that make up the proposed integrated curriculum model/framework can be distinguished as follows: the macro environment influenced by external forces, situational forces impacting the education and training system, programmes and courses, identified employability skills, integrated approaches, teaching and learning strategies as well as assessment approaches. These features must be integrated in such a manner as to provide learners/trainees with a multidisciplinary view of the business world, as pointed out by Hahs (1999:197) and O'Reilly (1994:38). As demonstrated by the model/framework, all the features making up this model/framework are interrelated and depend on each other in shaping the holistic development of the learner/trainee, who is expected to be flexible and adaptable to the forces affecting the workplace.

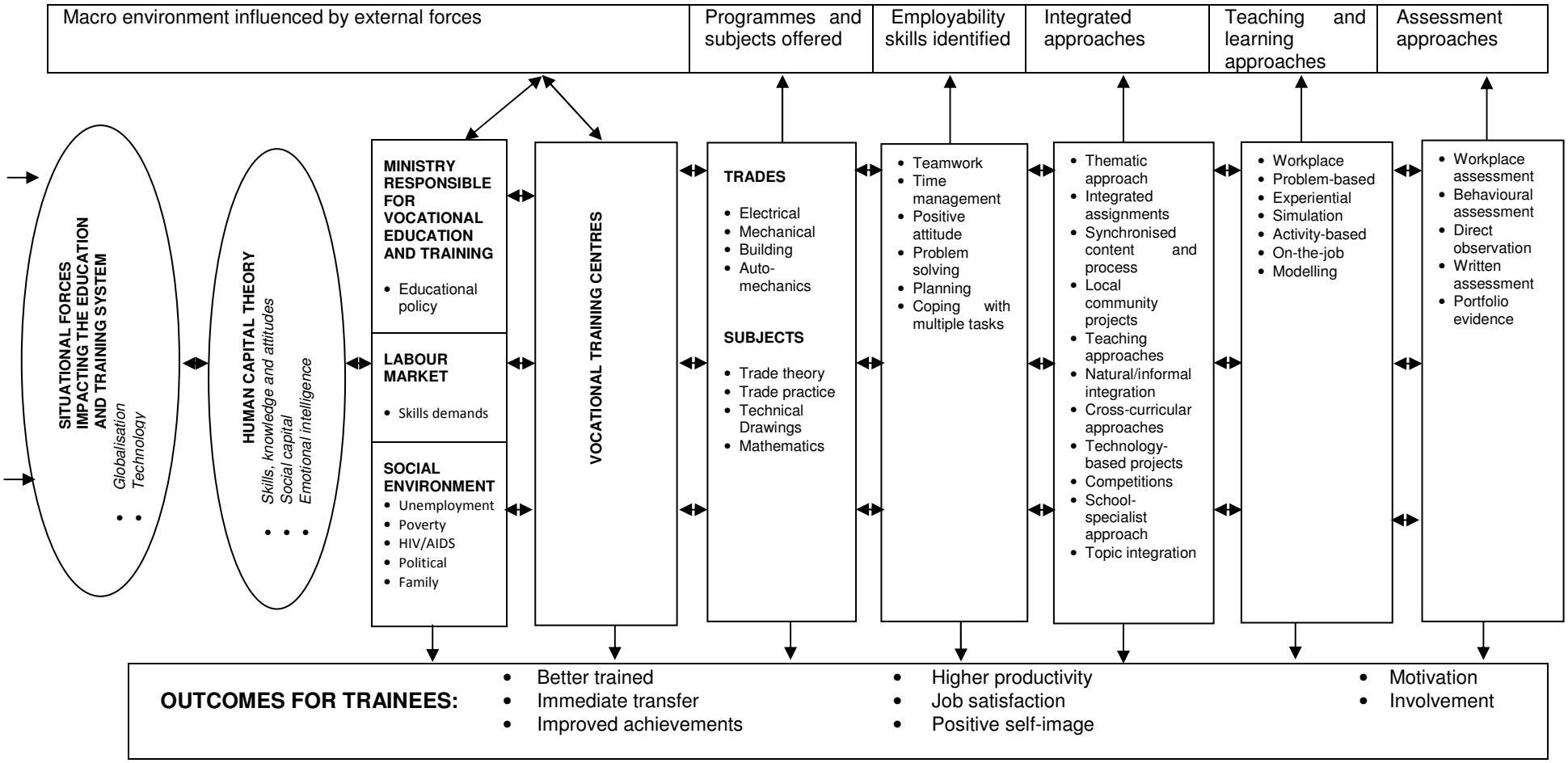


FIGURE 7.1 A proposed integrated curriculum model/framework for the vocational education and training system of Namibia

The key aspect of the integrated curriculum is the activity system. According to Garraway (2009:240), the activity systems theory understands "human activity as being object-oriented" because there is a goal towards which the activity is directed. One place where learning can be organised in a more activity-oriented fashion is at school or at the VET centre. For example, teachers/trainers have learners/trainees as their teaching and learning objects and their anticipated outcome is the learning that takes place. It can be argued that within the activity system, various activities take place between the learner/trainee and the teacher/trainer during the teaching and learning process. This human activity is directed towards the aim of achieving the learning goals of the learner/trainee (Garraway, 2009:240). In order to achieve the learning goals, employability skills as part of the learning content should be transmitted to the learner/trainee by the teacher/trainer, who is regarded as the expert in the development of employability skills.

During the learning and teaching process, the teacher/trainer should be aware of various integrated teaching approaches (see Section 2.6.2) to adopt in transmitting the learning content in a stimulating manner for learners/trainees to relate their learning experience in real-life context. In order to successfully implement an integrated curriculum model/framework, the VET system should ensure that teachers/trainers at VTCs are properly trained and have expertise in integrative techniques (Beaver & Moore, 2004:45).

It might be useful to demonstrate how such an activity-centred learning activity as part of an integrated training curriculum could be supported in a training centre. One important employability skill is teamwork, which requires employees to effectively work in groups by co-ordinating their activities and dividing labour. In this sense, the curriculum could be adapted to allow for explicit team tasks. Such an exercise could start with the formation of the team by the trainees and the division of labour according to the individual strengths and weaknesses of team members (e.g. according to specific areas of specialisation) and end with a conscious reflection on the choices and performance of individual team members. The role of the teacher/trainer would be to guide this process and assist with a structured reflection on the teamwork experience. These experiences could subsequently be repeated in different settings in order to help trainees to internalise important employability skills.

Such an approach is feasible for a number of employability skills. However, it is also important to note that the school or VTC can only play one part in improving the employability skills of

future employees. It is equally important that these skills are acquired in different settings, such as the workplace or at home. This is discussed in more detail below. Moreover, some of the employability skills such as motivational aspects or social responsibility are the result of a broader 'life-education' that is shaped to a large extent by society via an individual's peers and family.

Once learners/trainees have acquired the learning content, it is imperative for the teacher/trainer to assess their competence. This assessment can take various forms, as discussed in Section 2.5.6. It should be noted that the locality or environment for conducting assessments is not restricted, but that they can be conducted at places such as the workplace or the classroom or through flexible approaches. It is therefore imperative for the teacher/trainer to be aware of the various assessment approaches that can be adopted during the learning and teaching process to ensure that learners/trainees can demonstrate the competence of the employability skills they have acquired during the employability skills transfer process.

For employability skills to be developed and assessed it is required that a partnership exists between the education and training system, employers and society in general (e.g. through community projects that might assist trainees in developing additional employability skills). Companies should be able to provide learners/trainees with opportunities to practice such employability skills in the workplace, while teachers/trainers should be able to visit learners/trainees in the workplace to observe and assess whether they are practicing the employability skills they have learnt at the VTC.

Similarly, the general education system plays an important role in providing the prerequisites for the development of effective employability skills. Humanistic and civic values are an important part of basic education. The successful development of employability skills for the workplace has to start at this level (e.g. through strengthening or developing a civil education curriculum for basic and secondary education) and can only be successful if all levels of life-long learning support each other. General and secondary education in particular play an important role in the development of employability skills. In other words, employability skills should not only be developed and imparted at the workplace or within the VET system, but also as part of general education. For this purpose, there is a need to adapt the curricula to also include, for example, issues on civic education (e.g. What does "democratic rights" mean? How should one behave towards people from other ethnic groups? How can one develop a sense of belonging together?

etc.). VET cannot do all this on its own but needs the help of general education. Rychen (2001:5) put its that "although schools will continue to play a crucial role, the workplace, mass media, family, voluntary organizations, political, religious, and neighbourhood organizations and other cultural and recreational activities constitute other relevant settings where competencies are needed, enacted and assessed, and where formal and informal learning takes place."

By implementing this integrated curriculum model/framework successfully, the researcher is of the opinion that the education and training system could be improved in its intended task of imparting the relevant skills to trainees required in a modern world of work.

In the next section, conclusions based on the findings of this study are presented.

7.7 CONCLUSIONS

Conclusions are formulated in relation to the main research questions of this study.

7.7.1 Conclusion on important employability skills

The respondents highlighted the employability skills considered important in the Namibian context and that VTC trainees should possess when entering the job market. Employability skills considered important in the workplace are teamwork, time management, a positive attitude, problem solving and coping with multiple tasks. These employability skills are consistent with most employability skills of the countries researched in this study, as indicated in the literature review in Section 2.4.

7.7.2 Conclusion on the learning environment for employability skills

It was a common view of the respondents that the family/home setting, school, VTCs and the workplace are all relevant in developing the employability skills of trainees. This finding is consistent with the findings of the questionnaire, interview responses and the findings of the literature review conducted (see Section 5.6). Respondents expect the family, home setting and the school environment to contribute to developing the employability skills of trainees, because employers seemingly do not have the resources to develop such skills. This was clearly demonstrated by the majority of the respondents who indicated that they do not have structured

development programmes in place at their workplace (see Section 5.4.2). Those employers who had structured development programmes in place aimed at developing trainees' specific technical skills as opposed to developing employability skills.

7.7.3 Conclusion on the level at which employability skills should be introduced at vocational training centres

The findings from the questionnaire responses, face-to-face interviews and the literature review indicated that it is best to introduce employability skills at an early stage of the VTC programme and that it should be introduced at Level 1 (see Sections 5.7). Developing employability skills at an early stage of the training programme at VTCs will allow trainees to consolidate employability skills so that when they complete their training they have developed the necessary employability skills that they could bring along to the workplace immediately after graduating from the VTCs.

7.7.4 Conclusion on employability skills assessment

The findings from the questionnaire, interview responses and the literature review concurred on the assessment of employability skills (see Section 5.8). The study found that assessment of employability skills could be done through the submission of portfolios, direct observation of trainees in the industry or the administration of theoretical tests. The result suggests that such skills assessments be conducted in real-life situations to allow trainees to demonstrate the mastery of employability skills.

7.7.5 Conclusion on the promotion of employability skills

The general consensus among the respondents was that employability skills could be promoted through practical training, project work, self-study group work, case studies and by visits to companies. It was also felt by respondents that inviting motivational speakers or experts from industries to talk to trainees about their experiences in the industry were alternative options to improve the delivery of employability skills at VTCs (see Section 5.9). Trainees learn better in a situation in which they are involved, participate and assume responsibility for their own learning. Teachers or instructors should create environments in which the trainees take full responsibility for their own learning in order to contribute to the effective development of such skills.

7.7.6 Conclusion on curriculum integration

The literature review informed the study regarding the fact that teachers are confronted with the challenges of creating stimulating learning environments for learners to relate their learning experiences to real-life experiences. The study found that applying curriculum-integration approaches in a teaching and learning environment will enable instructors at VTCs and trainees to realise their educational objectives, particularly when developing employability skills. Based on the literature review, it was found that the integration of employability skills development in the VET curriculum could enhance the development of employability skills of VTC trainees, as required by employers. The literature review provided insights that education and training providers at all levels are expected to respond to the employability imperative and as such, educational institutions are encouraged to transform their curricula and pedagogical approaches.

7.8 RECOMMENDATIONS

Taking into consideration the findings and conclusions of this study, a number of recommendations can be made:

The study has revealed that countries that have developed and implemented employability skills programmes in their respective countries have successfully implemented such programmes through the enactment of employability skills policy frameworks. It is therefore recommended that a policy framework for employability skills development in the Namibian VET system be developed and implemented. The introduction of an employability skills policy framework in the Namibian VET curriculum will ensure that employers' future skill needs are met by the VET system.

The study found that VTCs have an objective to prepare young adults for work. In pursuing this goal, it is recommended that VTCs play a significant role in the development of employability skills and that VTCs be supported by industry to foster the development of such skills.

The workplace is an important environment for experiential learning for VTC trainees. On-the-job training provides practical exposure to trainees to apply what they have learned in terms of

the theoretical content. Providing industrial exposure to VTC trainees could complement their efforts in developing employability skills. It is therefore recommended that partnerships be established between industry and the VTCs to consolidate the development of employability skills.

The study has found that applying a curriculum-integration approach in a teaching and learning environment stimulates the learning process of learners. It is therefore recommended that an integrated curriculum model/framework for employability skills as presented be implemented in the Namibian VET system. A curriculum-integration approach will ensure that trainees' educational goals are achieved and will also make the learning situation stimulating and more relevant to trainees' educational needs.

To effectively integrate the learning content it would be expected that teachers know how to integrate content effectively across disciplines in a meaningful manner and that they should have expertise in integrative techniques. It is therefore recommended that instructors at VTCs be trained in integrative techniques to acquire the skills, knowledge and techniques to integrate content meaningfully.

No studies could be found in Namibia on employability skills in the VET system, and it would be in the interest of the VET sector to further undertake research to establish why the Namibian employers have chosen the employability skills considered important in this study.

7.9 LIMITATIONS OF THE STUDY

The researcher experienced some limitations in carrying out this study. The following limitations had an impact on the study:

- Firstly, no comprehensive database exists at the VTCs or the Directorate of Vocational Education and Training in the Ministry of Education in Namibia containing lists of employers who co-operate with VTCs. Lists obtained from the VTCs were in some cases incomplete because they did not contain employers' complete data, such as physical addresses, postal addresses, telephone/fax numbers, towns from where they operate or

the regions in which the firms are situated. The absence of such information made it very difficult for the data-collection team to locate some of the companies.

- Secondly, some employers selected to participate in this study were reluctant to complete the questionnaire, while others did not show interest in completing the questionnaire although the importance of the research was explained to them.

Despite the above limitations, the results obtained in this study answered the main research questions of this study and filled the information gap on employability skills needed in the workplace in the Namibian context.

7.10 CONCLUSION

The literature consulted for this study has revealed that the workplace is going through a transformation process because of globalisation and emerging technologies as well as changing workplace demands that require workers to be competent in a variety of skills, and not only technical skills.

The theoretical framework of this study was based on the human capital theory, which argues that investing in the skills and knowledge development of the nation could significantly contribute to productivity and economic growth of a country. To meet Namibia's economic competitiveness, as set out in Vision 2030, the introduction and implementation of employability skills development in the Namibian VET sector is vital. This will enable the workforce to meet the changing workplace demands as well as socio-economic demands that are associated with globalisation and changing demands at the workplace. It could be assumed that the introduction of employability skills in the VET curriculum will make graduates more productive at the workplace, which will translate in economic benefits not only to the workforce but also to the country to a large extent.

The study was able to address the main research questions of the study and provide insights for future research on employability skills development in Namibia. Based on the conclusions presented in this study, as highlighted in this chapter, the researcher is confident that the objectives of this study were achieved. The adoption of the proposed integrated curriculum

model/framework could assist the Namibian VET sector with the implementation of employability skills at VTCs. It could therefore be assumed that the study has contributed to the international discourse on employability skills development.

No similar research on employability skills could be found in Namibia, and this study has therefore contributed to knowledge that can further be pursued in the improvement of employability skills education in Namibia, particularly in the VET sector.

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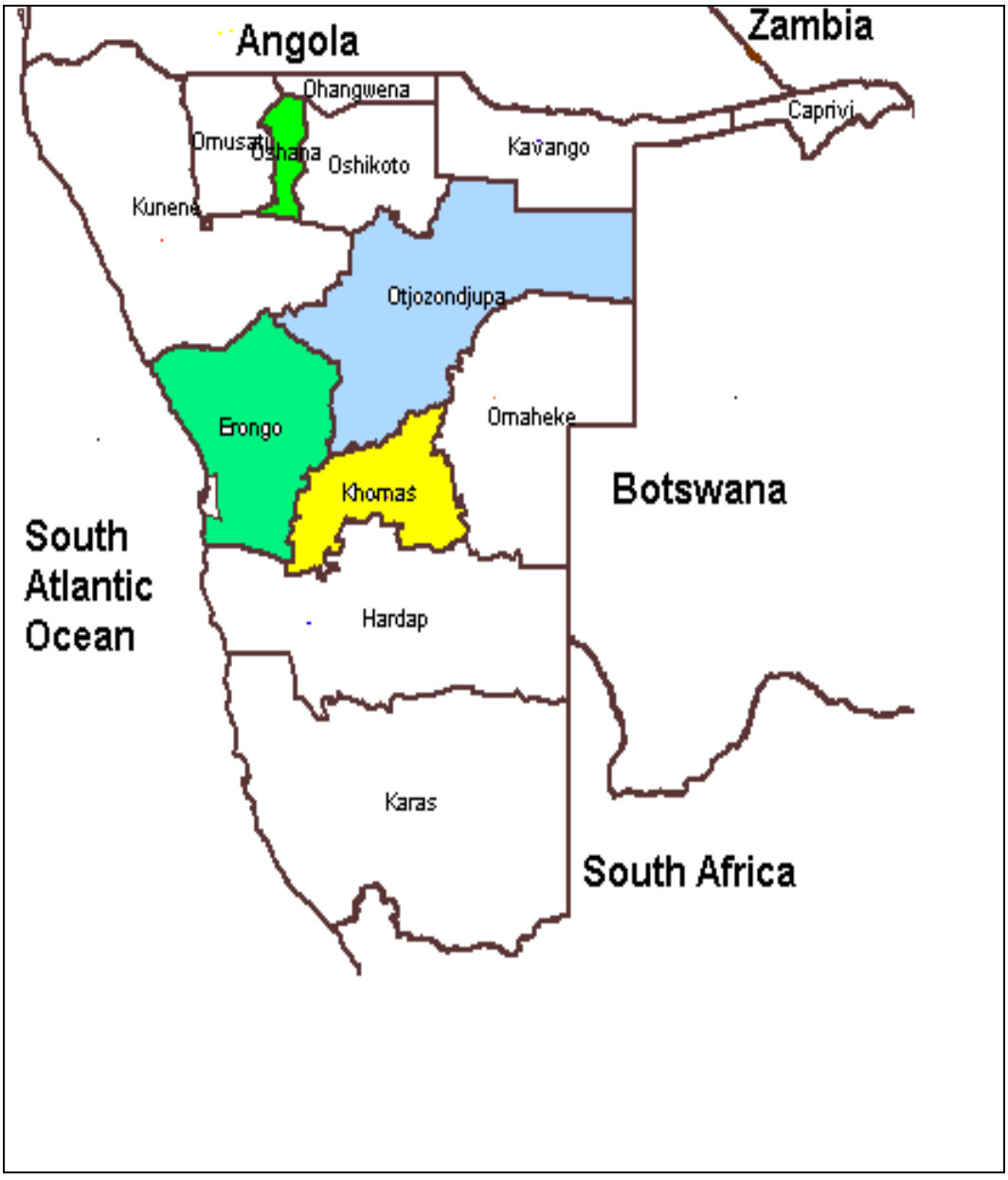
APPENDIX A

MAP OF NAMIBIA



APPENDIX B

LIST OF COMPANIES EMPLOYING OR PROVIDING ON-THE-JOB TRAINING TO VTC TRAINEES

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
1	Cross Roads Service Station		P O Box 1506	064-461587	064-463544	Auto-mechanics	Swakopmund	Erongo
2	AR Enterprizes		P O Box 1790	064-207482	064-207482	Auto-mechanics	Walvis Bay	Erongo
3	M & Z Commercial		P O Box 207	063-203965	063-203967	Auto-mechanics	Luderitz	Karas
4	Gabus Garage		P O Box 185	066-255641	066-255294	Auto-mechanics	Rundu	Kavango
5	Titus Mech					Auto-mechanics		Khomas
6	Northern Auto Repairs		P O Box 3391	065-221802	065-224195	Auto-mechanics	Oshakati	Oshana
7	BZ Truck Repairs		P O Box 796	065-241026	065-241027	Auto-mechanics	Ondangwa	Oshana
8	Erongo Com. Vehicles		P O Box 3554	065-225660	065-225682	Auto-mechanics	Ongwediva	Oshana
9	Marina Toyota CC		P O Box 59	067-303867	067-302385	Auto-mechanics	Otjiwarongo	Otjozondjupa
10	Pikkies Bodies	Dr Michael de Cock Str, Windhoek	P O Box 3099	061-215415	061-215322	Auto-mechanics, spray painting	Windhoek	Khomas
11	Diesel Eletric Coast (Pty) Ltd.	Brucken Street	P O Box 280	064-402766	064-404730	Auto-mechanics	Swakopmund	Erongo
12	Hans Kriess Motors CC	Kaiser Wilhelm Street Swakopmund	P O Box 155	064-402011	064-402013	Auto-mechanics	Swakopmund	Erongo
13	Jurgens Auto Electric	17 Feld Street Swakopmund	P O Box 3329	064-463100	064-463101	Auto-mechanics	Swakopmund	Erongo
14	Marc's Auto	Main Road	P O Box 71	064-550272/550266	064-550277	Auto-mechanics	Karibib	Erongo
15	Namib Auto Electric	63 Brucken Street	P O Box 808	064-462693		Auto-mechanics	Swakopmund	Erongo
16	Namib Diesel CC	210 2nd Street east	P O Box 2449	064-203971	064-203255	Auto-mechanics	Walvis Bay	Erongo
17	Steenbras Service station	65 Lazarett Street	P O Box 245	064-402131	064-402758	Auto-mechanics	Swakopmund	Erongo
18	Swakop Car & Truck Service		P O Box 1059	064-161679	064-162797	Auto-mechanics	Swakopmund	Erongo
19	Autohaus Windhoek	69 Lazarett Street Southern Industrial Area	P O Box 2110	061-240289/240280	240276/223473	Auto-mechanics	Windhoek	Khomas
20	Auto Garage	167 Jan Jonker Road	P O Box 5166	226681/224718	224718	Auto-mechanics	Windhoek	Khomas
21	Auas Delta	25 Voigts Street	P O Box 1708	233090	228552	Auto-mechanics	Windhoek	Khomas
22	Autowerkstatt	4A Einstein Street Southern Industria	P O Box 23044	221858/230462	230579	Auto-mechanics	Windhoek	Khomas

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23	Bosch Diesel Electric	7 Mandume Ndemufayo Avenue Windhoek Central	P O Box 2197	061-234001	061-224056	Auto-mechanics	Windhoek	Khomas
24	City Motors	Joule Street Southern Industria	P O Box 1021	061-237815	061-248133	Auto-mechanics	Windhoek	Khomas
25	Club Motors	Van Der Bijl Street Nothern Industria	P O Box 23000	061-280 4700	061-258249	Auto-mechanics	Windhoek	Khomas
26	Design & Merchandising Services	22 Krupp Street Southern Industria	P O Box 5522	061-224786	061-230707	Auto-mechanics	Windhoek	Khomas
27	DM Motors	4237 Sterling Street Khomasdal	P O Box 20239	061-212347	061-124227	Auto-mechanics	Windhoek	Khomas
28	Fix-n-Fit	56 Marconi Street Southern Industria	P O Box 30930	061-229154		Auto-mechanics	Windhoek	Khomas
29	Geiger FJ Electrical & Mechanical	13 Walter Street Southern Industria	P O Box 6751	061-224238/227071	061-233254	Auto-mechanics	Windhoek	Khomas
30	Lohnro Motors: NISSAN (PHOENIX)	38 Independence Avenue	P O Box 31	061-237330	061-225784	Auto-mechanics	Windhoek	Khomas
31	Lions Motors (T/A SSANG YONG & DAEWOO)	27 Joule Street Southern Industria	P O Box 192	061-272531	061-272535	Auto-mechanics	Windhoek	Khomas
32	Namtrac	166 Mandume Ndemufayo Avenue	P O Box 216	061-2804600	061-223416	Auto-mechanics	Windhoek	Khomas
33	Orion motors	Parsons and Wright Street Southern Industrial	P O Box 6602	061-232759/224905	061-232810	Auto-mechanics	Windhoek	Khomas
34	Otis elevator company	4 Nasmyth Street, Southern Industria	P O Box 2151	061-228864	061-225397	Auto-mechanics	Windhoek	Khomas
35	Pampe PW	Kalie Roodt Street Northern Industria	P O Box 1904	061-261246	061-263372	Auto-mechanics	Windhoek	Khomas
36	Pupkewitz Toyota	440 Independence Ave	P O Box 11243	061-236640	061-228345	Auto-mechanics	Windhoek	Khomas
37	Spares centre Ltd	1 Diesel Street Southern Industria	P O Box 23047	061-226347	061-223146	Auto-mechanics	Windhoek	Khomas
38	SW Auto Electric	16 Faraday Street Southern Industria	P O Box 719	061-237986/231509	061-249577	Auto-mechanics	Windhoek	Khomas
39	Truck Namibia	14 Ruhr Street Northern Industria	P O Box 1489	061-262101/217036	061-216610	Auto-mechanics	Windhoek	Khomas
40	V K Auto Electric Ltd	22 Hosea Kutako Drive, Ausspannplatz	P O Box 6331	061-225973/225974	061-223772	Auto-mechanics	Windhoek	Khomas
41	Zimbo Maschinenbau Engineering	7 Faraday Street Southern Industria	P O Box 11640	061-228480/254027	061-224181	Auto-mechanics	Windhoek	Khomas
42	Zimmermann Garage	5 Wright Street	P O Box 2672, Southern Industria	061-237146/237792	061-237207	Auto-mechanics	Windhoek	Khomas
43	M & Z Motors	60 Tal Street, Windhoek Central	P O Box 192	061-225401/272530	061-235624/252652/272353	Auto-mechanics	Windhoek	Khomas
44	Auto Werkstatt		P O Box 23044		061-230579	Auto-mechanics	Windhoek	Khomas
45	Auto Repairs		P O Box 9152	061-32707	061-231592	Auto-mechanics	Windhoek	Khomas

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46	Croesers Garage		P O Box 5384		061-231653	Auto-mechanics	Windhoek	Khomas
47	Eros Service Station		P O Box 1711			Auto-mechanics	Windhoek	Khomas
48	Government Garage		Private Bag 13235	061-237066	061-236139/236163	Auto-mechanics	Windhoek	Khomas
49	Khomasdal Service Station		P O Box 6383	061-213610	061-213068	Auto-mechanics	Windhoek	Khomas
50	Klinenberg Motors		P O Box 30500		061-235328	Auto-mechanics	Windhoek	Khomas
51	NEC Engineering		P O Box 5052	061-236720	061-232673	Auto-mechanics	Windhoek	Khomas
52	Phoenix Nissan		P O Box 31			Auto-mechanics	Windhoek	Khomas
53	Ritters Toyota	65 Rehoboth Str	P O Box 5513	061-237130/234479	061-227748	Auto-mechanics	Windhoek	Khomas
54	Toyota Pupkewitz		P O Box 140			Auto-mechanics	Windhoek	Khomas
55	Crank Rod	Jan Marais Street Northern Industria	P O Box 5027	061-215451/2	061-263296	Auto-mechanics	Windhoek	Khomas
56	Pro Power Diesel	7 Nasmyth Str	P O Box 363	061-237693	061-225871	Auto-mechanics	Windhoek	Khomas
57	Mindeco Equipment	37 Lazarett Str	P O Box 12018	061-226021	061-235782	Auto-mechanics	Windhoek	Khomas
58	Reflex Field Services	11 Wright Str	P O Box 11424	061-231408	061-221417	Auto-mechanics	Windhoek	Khomas
59	D & S Engineering	41 Parson Rd	P O Box 22334	061-232956/0	061-228208	Auto-mechanics	Windhoek	Khomas
60	Delta Auas	Voights Str. 25, Windhoek	P O Box 1708	061-233090	061-228552	Auto-mechanics	Windhoek	Khomas
61	Rhino Motors	Ernst Stumpfe, Windhoek	P O Box 364	061-210522	061-2230	Auto-mechanics	Windhoek	Khomas
62	Kustner's Garage		P O Box 26	061-281723		Auto-mechanics	Windhoek	Khomas
63	Cohen-BMW		P O Box 3109	061-220501	061-231554	Auto-mechanics	Windhoek	Khomas
64	Del Monte Motors	Edison Str	P O Box 5526	061-237756	061-237757	Auto-mechanics	Windhoek	Khomas
65	Explaration Service		P O Box 5365	061-215991	061-215992	Auto-mechanics	Windhoek	Khomas
66	Diesel Electric		P O Box 2197	061-234001	061-224056	Auto-mechanics	Windhoek	Khomas
67	Namibia Construction		P O Box 5092	061-212347	061-214227	Auto-mechanics	Windhoek	Khomas
68	Klingenberg Motors		P O Box 30500	061-222604	061-235328	Auto-mechanics	Windhoek	Khomas
69	Khomasdal Service Station					Auto-mechanics	Windhoek	Khomas
70	Black Square Auto Garage			067-5120307	067-5121177	Auto-mechanics	Windhoek	Khomas
71	Olympia Trek		P O Box 21066	061-251660	061-251680	Auto-mechanics	Windhoek	Khomas
72	Gobabis Delta	54 Church Street Gobabis	P O Box 724	061-563002/563003	061-562657	Auto-mechanics	Gobabis	Omaheke

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73	Gobabis Auto & Tractors	54 Church Street Gobabis	P O Box 777	061-563006/563007	061-562800	Auto-mechanics	Gobabis	Omaheke
74	Motorama		P O Box 777	068-13008/9	068-12800	Auto-mechanics	Gobabis	Omaheke
75	Aru-Plant		P O Box 143	068-13810	068-13813	Auto-mechanics	Gobabis	Omaheke
76	Auto Electric					Auto-mechanics	Gobabis	Omaheke
77	Aro 4x4					Auto-mechanics	Gobabis	Omaheke
78	Ministry of Works Transport and Communication, Government Garage	Ondangwa	P O Box 735	065-240689	065-240164	Auto-mechanics	Ondangua	Oshana
79	Diesel Electric-Tsumeb			067-120942	067-121482	Auto-mechanics	Tsumeb	Otjikoto
80	Von Baum Garage			067-121006		Auto-mechanics	Tsumeb	Otjikoto
81	Diesel Electric Bosch	6 Van Riebeeck Street Otjiwarongo	P O Box 647	067-302838	067-303190	Auto-mechanics	Otjiwarongo	Otjozondjupa
82	Hansen Motors	Maroela Street Grootfontein		067-242194		Auto-mechanics	Grootfontein	Otjozondjupa
83	Hoffmans Plass Implemente	Hage Geingob Street	P O Box 60	067-302738	067-302498	Auto-mechanics	Otjiwarongo	Otjozondjupa
84	Kluges Drilling Exploration/water drilling	Omaruru	P O Box 83	064-570083	064-570593	Auto-mechanics	Omaruru	Otjozondjupa
85	Von Baums Motors	19 Dr. Libertine Amathila Avenue	P O Box 306	067-304288/302041	067-302703	Auto-mechanics	Otjiwarongo	Otjozondjupa
86	Ritters Autohaus			062 - 501722	227748	Auto-mechanics	Okahandja	Otjozondjupa
87	Oluno Toyota			066-5640204		Auto-mechanics	Ondangwa	Oshana
88	Hans Kriess Motors CC					Auto-mechanics		
89	Government Garage		Private Bag 13235	065-240689		Auto-mechanics	Ondangwa	Oshana
90	Rosh Pina (Imcor)		Private Bag 2002	063-274252	063-274253	Auto-mechanics		
91	Chamber of Mines	Independence Avenue 17 Continental Blg.	P O Box 2895	061-237925	061-222638	Auto-mechanics & metal	Windhoek	Khomas
92	Foerster Repairs	7 Faraday Street Southern Industria	P O Box 5719	061-224286	061-221177	Auto-mechanics & metal	Windhoek	Khomas
93	Rossing Uranium Limited	Arandis	Private Bag 5005	064-5209111	064-5202035	Auto-mechanics, metal & electrical	Swakopmund	Erongo
1	D.G. Fritz Tischlerei	6 Mc Hugh Street	P O Box 673	064-461143	064-461974	Construction	Swakopmund	Erongo
2	Anton Huber Construct		P O Box 1870			Construction	Walvis Bay	Erongo
3	HH Joiners	12 Phillips Str, Swakopmund		064-162741		Construction	Swakopmund	Erongo

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4	Tischlerei A. Kintscher		P O Box 805	064-14022		Construction	Swakopmund	Erongo
5	C. Rau Nachf. H. Lorenz	5 Feld Str, Swakopmund		064-12295		Construction	Swakopmund	Erongo
6	DG Fritze Joinery		P O Box 309	064-4161314	064-161760	Construction	Swakopmund	Erongo
7	Rieck Joinery "KRAATZ"	8th Str, Wlavis Bay	P O Box 355	064-202319/10	064-205134	Construction	Walvis Bay	Erongo
8	Woodmatrix					Construction	Swakopmund	Erongo
9	Fritze D.J. Joinery	6 Mc Hugh Str, Swakopmund	P O Box 309	064-461143		Construction	Swakopmund	Erongo
10	Kitchens & Cupboards	54 Feld Str, Swakopmund	P O Box 4430	064-463970/491917		Construction	Swakopmund	Erongo
11	Schanz Joinery	40 Feld Str, Swakopmund		064-403668	064-403668	Construction	Swakopmund	Erongo
12	Swakop Joinery	8 Feld Str, Swakopmund	P O Box 1580	064-402245	064-400339	Construction	Swakopmund	Erongo
13	Swakop Kitchens & Joinery	27 Feld Str, Swakopmund	P O Box 4401	064-463542	064-463562	Construction	Swakopmund	Erongo
14	The Woodwork Shop	12 Phillips Str, Swakopmund	P O Box 933	064-404668		Construction	Swakopmund	Erongo
15	Tischlerei Bauer	23 Suedring Str, Swakopmund	P O Box 1843	064-405130/0811285130	064-405130	Construction	Swakopmund	Erongo
16	Tischlerei Goethe	42 Schwester Frieda Str Vineta, Swakopmund		064-462129		Construction	Swakopmund	Erongo
17	Tischlerei Kramer	Feld Str, Swakopmund	P O Box 693	064-462420		Construction	Swakopmund	Erongo
18	Van Zyl's Woodworking	15 Feld Str, Swakopmund	P O Box 3967	064-400751/0811279991		Construction	Swakopmund	Erongo
19	Atlas Joinery			064-202672		Construction	Walvis Bay	Erongo
20	Dias D.G. Cabinet Makers	273, 11th Str, Walvis Bay	P O Box 478	064-204919/204475	064-209213	Construction	Walvis Bay	Erongo
21	Final Touch	93, 12th Street, Walvis Bay		064-207732		Construction	Walvis Bay	Erongo
22	H.P. Joinery	277, 12th Street, Industrial Area, Walvis Bay		064-206102		Construction	Walvis Bay	Erongo
23	Hebrite Wood Enterprises	132, 9th Street, Walvis Bay		064-203211		Construction	Walvis Bay	Erongo
24	Home Improvements	11th Street, 3 Kudu Building Shop, Walvis Bay		064-204089		Construction	Walvis Bay	Erongo
25	Jeimans Joiners	1st Street Narraville, Walvis Bay		064-203389		Construction	Walvis Bay	Erongo
26	Madeira Cabinets	4th Street East		064-207509		Construction	Walvis Bay	Erongo
27	Nam-Bay Woodcrafts	Cnr. 10th Road/11th Street		064-207790		Construction	Walvis Bay	Erongo
28	Namib Joiners CC	8th Str, Wlavis Bay	P O Box 355	064-209294		Construction	Walvis Bay	Erongo

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29	Rock Shipwrights and Joiners		P O Box 1361	064-202987/0811-1272987	064-207399	Construction	Walvis Bay	Erongo
30	S.P. Bouers	149, 10th Street, Wlavis Bay		064-205525		Construction	Walvis Bay	Erongo
31	Strelitzia Woodcrafts	18th Weg, Industrial Area		064-209626		Construction	Walvis Bay	Erongo
32	Telemachus Joinery	149, 10th Street, Wlavis Bay		064-206984		Construction	Walvis Bay	Erongo
33	Bevcon Construction		P O Box 439	064-22641	064-26662	Construction	Walvis Bay	Erongo
34	Fritze & Quelle		P O Box 309	064-161314	064-161760	Construction	Swakopmund	Erongo
35	W O Groenewald Building Constr.		P O Box 1433	064-162276	064-162787	Construction	Swakopmund	Erongo
36	S & R Horn Bros		P O Box 531	064-161521	064-162933	Construction	Swakopmund	Erongo
37	Jogonias Gaseb		P O Box 3515	064-14726	064-14726	Construction	Swakopmund	Erongo
38	K D Molthahn Constractors		P O Box 160	064-162709	064-14010	Construction	Swakopmund	Erongo
39	J Young		P O Box 2716	064-23374	064-23374	Construction	Walvis Bay	Erongo
40	Salz Gossow		P O Box 1167	064-402694	064-404374	Construction	Swakopmund	Erongo
41	Beuck Tischlerei					Construction		Erongo
42	EMG Engineering Constr.			064-204270	064-207496	Construction		Erongo
43	Frank's Joinery	Insel Str.	P O Box 410	063-202039		Construction	Luderitz	Karas
44	D & P Skrynwerke	Park Str		063-223715		Construction	Keetmanshoop	Karas
45	Ekko Vietor		Private Bag 2117	066-524431		Construction	Mariental	Karas
46	Kavavango Construction		P O Box 126	067-372165		Construction	Rundu	Kavango
47	Welodomu Construction		P O Box 339	067-155859		Construction	Rundu	Kavango
48	International Construction Ltd	7 Joule Street Southern Industria	P O Box 33	061-238500	061-238803	Construction	Windhoek	Khomas
49	Jensen HK Building/Furniture	8 Nasmyth Street Southern Industria	P O Box 5289	061-233623	061-221512	Construction	Windhoek	Khomas
50	Afro Pumps		P O Box 80051		061-264767	Construction	Windhoek	Khomas
51	Baumann and Meier Workshop		P O Box 1992		061-253974	Construction	Windhoek	Khomas
52	Cooper Plumbing Ser		P O Box 9215		061-238820	Construction	Windhoek	Khomas
53	Executive Joinery		P O Box 6314		061-238152	Construction	Windhoek	Khomas
54	Expo Construction		P O Box 495		061-264762	Construction	Windhoek	Khomas
55	Grupo Sofonias		P O Box 30854	061-247997		Construction	Windhoek	Khomas

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56	H.W. Constructions		P O Box 80015	061-251522	061-253170	Construction	Windhoek	Khomas
57	JP Renovations		P O Box 50022			Construction	Windhoek	Khomas
58	Master Joiners	Bell Street Southern Industria	P O Box 10695	061-234685		Construction	Windhoek	Khomas
59	Namib Wood		P O Box 5536		061-215796	Construction	Windhoek	Khomas
60	Namibia Kitchens		P O Box 2772		061-264758	Construction	Windhoek	Khomas
61	Nedwood Kitchens		P O Box 23996			Construction	Windhoek	Khomas
62	O.B. Davids		P O Box 31915	061-224289		Construction	Windhoek	Khomas
63	Van Wyngaarden Builders		P O Box 2775		061-227462	Construction	Windhoek	Khomas
64	Wispeco Namibia		P O Box 2131		061-261839	Construction	Windhoek	Khomas
65	Wood Connection		P O Box 11158			Construction	Windhoek	Khomas
66	Guild				061-244051	Construction	Windhoek	Khomas
67	WP Renovations		P O Box 70571	061-212818	061-210848	Construction	Windhoek	Khomas
68	Eagle Building Material		P O Box 2661	065-530305		Construction	Windhoek	Khomas
69	Ray-Mal O'Malley		P O Box 1702	081-11222009	061-233365	Construction	Windhoek	Khomas
70	Valco Behr			061-261199		Construction	Windhoek	Khomas
71	D M S Möbeltischlerei	Krupp Str, Windhoek	P O Box 5522	061-224786	061-230707	Construction	Windhoek	Khomas
72	Kohl Möbeltischlerei	Kallic Rd, Windhoek	P O Box 11680	061-262896	061-262896	Construction	Windhoek	Khomas
73	Namib Wood Industry	Danziger Str, Windhoek	P O Box 5536	061 263231	061-222585	Construction	Windhoek	Khomas
74	Scandia Kitchens		P O Box 5319	061-225026	33970	Construction	Windhoek	Khomas
75	Feracor Joinery	4 Nasmith Street, Windhoek	P O Box 2026	061-233141	061-233142	Construction	Windhoek	Khomas
76	WEYLAND			062-212031		Construction	WIndhoek	Khomas
77	Tischlerei V. Francois	4 Kudu Str, Windhoek		061-252771		Construction	Windhoek	Khomas
78	The Wood Connection		P O Box 11158	061-246103	061-246100	Construction	Windhoek	Khomas
79	Wener Manufacturers	68 Farm Elisenheim, Windhoek	P O Box 11106	061-215159	061-217130	Construction	Windhoek	Khomas
80	A & D Joiners	3 Hostel Str NDC Stall, Windhoek		061-264174		Construction	Windhoek	Khomas
81	Bernard Gallery		P O Box 3143	061-221446/0811541500	061-221546	Construction	Windhoek	Khomas

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82	City Kitchens	Kallie Roodt Str, Oshapaka Stalls, Windhoek	P O Box 6630	061-263085		Construction	Windhoek	Khomas
83	Döeseb Joinery	N. Menarovandu Str, Windhoek		061-263445	061-216049	Construction	Windhoek	Khomas
84	Easy Fit Cupboards	2 Bohr Str, Windhoek		061-250286/7	061-250295	Construction	Windhoek	Khomas
85	Ferdinant & Sons Joinery		P O Box 61871	061-217399	061-217399	Construction	Windhoek	Khomas
86	GMC Joiners		P O Box 5045	061-264782	061-249367	Construction	Windhoek	Khomas
87	Groote Bau and Möbeltischlerei	Hibiskus Str, Windhoek		061-211188	061-211188	Construction	Windhoek	Khomas
88	Kitchen Center Windhoek	8 Schinz Str, Windhoek	P O Box 6008	061-226861 or 081-1272268	061-227614	Construction	Windhoek	Khomas
89	Modular Cupboards		P O Box 5160	061-232337	061-232337	Construction	Windhoek	Khomas
90	Modular Kitchen	14 Erf Str, Windhoek	P O Box 11322	061-242984/259647	061-242985	Construction	Windhoek	Khomas
91	Mr. Wood Joinery	Kallie Roodt Str, Oshapaka Stalls, Windhoek	P O Box 22662	061-216304/236311/081-1242566	061-216310	Construction	Windhoek	Khomas
92	N.H Woodworks			061-234636	061-234363	Construction	Windhoek	Khomas
93	Netwood Kitchen	Newcastle Str, Windhoek	P O Box 23976	061-217814	061-263436	Construction	Windhoek	Khomas
94	S.B. Building Contractors and Joinery	Enok Flats Khomasdal, Windhoek	P O Box 10594	061-211607/070		Construction	Windhoek	Khomas
95	Swartbooi Joinery	3 NDC Stalls, Attie Potgieter Str, Windhoek	P O Box 61127	061-254350		Construction	Windhoek	Khomas
96	The Guild	Cullinan Str, Windhoek	P O Box 43483	061-224370		Construction	Windhoek	Khomas
97	Tischlerei Eichsfeld Holz		P O Box 96420	081-1297721/061-255893	061-244051	Construction	Windhoek	Khomas
98	Werner Manufacturers		P O Box 11106	061-252505	061-217130	Construction	Windhoek	Khomas
99	Izaak Swart Builders and Renovations		P O Box 60999	061-218449		Construction	Windhoek	Khomas
100	Bavaria (Pty) Ltd		P O Box 23014	061-261264	061-215008	Construction	Windhoek	Khomas
101	Building Management Services		P O Box 11223	061-240689	061-240689	Construction	Windhoek	Khomas
102	C. Calitz Construction		P O Box 31238	061-41928	061-42102	Construction	Windhoek	Khomas
103	China State Construction		P O Box 23139	061-234435	061-235544	Construction	Windhoek	Khomas
104	Design Structures		P O Box 8249	061-215169	061-216769	Construction	Windhoek	Khomas
105	F H Construction		P O Box 23152	061-263053	061-262703	Construction	Windhoek	Khomas
106	G I PROCON (PTY) LTD		P O Box 23792	061-214141	061-214143	Construction	Windhoek	Khomas

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107	Grinaker Namibia		P O Box 5801	061-220600	061-228411	Construction	Windhoek	Khomas
108	Groubler Bouers		P O Box 1617	061-222915	061-222915	Construction	Windhoek	Khomas
109	Gudo Construction		P O Box 5779	061-261330	061-217855	Construction	Windhoek	Khomas
110	Harturbon		P O Box 6177	061-227075	061-227075	Construction	Windhoek	Khomas
111	Herma Bros		P O Box 668	061-237090	061-237093	Construction	Windhoek	Khomas
112	Hoch & Tief		P O Box 5120	061-217825	061-217826	Construction	Windhoek	Khomas
113	Holm's Premix		P O Box 1160	061-261187	061-217358	Construction	Windhoek	Khomas
114	H W Construction		P O Box 80015	061-251522	061-251294	Construction	Windhoek	Khomas
115	K C C		P O Box 21444	061-233803	061-233803	Construction	Windhoek	Khomas
116	K L Construction		P O Box 5340	061-231643	061-221951	Construction	Windhoek	Khomas
117	Mahe Construction		P O Box 166	061-251276	061-251798	Construction	Windhoek	Khomas
118	E Marks Building Constr.		P O Box 1820	061-225537	061-225537	Construction	Windhoek	Khomas
119	N.C.I.		P O Box 31330	061-225127	061-41187	Construction	Windhoek	Khomas
120	Nordland Construction		P O Box 9441	061-235475	061-227559	Construction	Windhoek	Khomas
121	FOELKERS (PTY) LTD		P O Box 5008	061-237768	061-225955	Construction	Windhoek	Khomas
122	Prime Properties		P O Box 24134	061-226626	061-221695	Construction	Windhoek	Khomas
123	R F Construction		P O Box 5815	061-236263	061-221025	Construction	Windhoek	Khomas
124	R L Civil & Building		P O Box 5068	061-239974	061-239974	Construction	Windhoek	Khomas
125	H H Schulz		P O Box 5092	061-237187	061-233784	Construction	Windhoek	Khomas
126	Stejen Construction		P O Box 1174	061-263065	061-263576	Construction	Windhoek	Khomas
127	Super Construction		P O Box 6610	061-264504	061-264439	Construction	Windhoek	Khomas
128	Unibuild (Pty) Ltd		P O Box 11689	061-220626	061-220833	Construction	Windhoek	Khomas
129	Vermeydu Construction		P O Box 80072	061-252715	061-252431	Construction	Windhoek	Khomas
130	Erdbau (Pty) Ltd		P O Box 2645	061-234642	061-232251	Construction	Windhoek	Khomas
131	Slam Ent.		P O Box 11398	061-222092	061-222092	Construction	Windhoek	Khomas
132	K T Construction		P O Box 60423	061-214377		Construction	Windhoek	Khomas
133	Residence Aden.			061-235927		Construction	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
134	King Builders			0811271797/08112 89334		Construction	Windhoek	Khomas
135	W.H. Constr.		P O Box 80015	061-251522/0811248503	061-251294	Construction	Windhoek	Khomas
136	Namib Housing			061-239453	061-239453	Construction	Windhoek	Khomas
137	NHE		P O Box 24530	062-523156		Construction	Windhoek	Khomas
138	Dien Building & Renovations		P O Box 31915	081-1270996		Construction	Windhoek	Khomas
139	Retief Sales Promotion		P O Box 1693		061-215560	Construction	Windhoek	Khomas
140	H J Haraeb Bou		Private Bag 2010	0020-64		Construction	Khorixas	Kunene
141	J A Murorua Action Building		P O Box 96	0020-303		Construction	Khorixas	Kunene
142	Super Building Constructor		P O Box 164	0020-60		Construction	Khorixas	Kunene
143	BJ Builder		P O Box 36		062-562711	Construction	Gobabis	Omaheke
144	B Gariseb		P O Box 759			Construction	Gobabis	Omaheke
145	Home Sweet Home Builders		P O Box 195	068-13325		Construction	Gobabis	Omaheke
146	Omaheke Construction			067-155310		Construction	Gobabis	Omaheke
147	Dept. Water Affairs		Private Bag 5540		065-221449	Construction	Oshakati	Oshana
148	Oshakati-Municipality		P O Box 5530	065-220805	065-220435	Construction	Oshakati	Oshana
149	Engineering Consultant Kandongo-coordinator		P O Box 1620	065-22239	065-222339	Construction	Oshakati	Oshana
150	H.L. Furniture		P O Box 2559	065-230716		Construction	Oshakati	Oshana
151	Nembiya Furniture		P O Box 14237			Construction	Oshakati	Oshana
152	Group Five Namibia		Private Bag 5565	067-5120498	067-5120490	Construction	Oshakati	Oshana
153	Tulipamwe Project			065-221080		Construction	Oshakati	Oshana
154	Ahrens KWH	Extension 5	P O Box 782	067-221361/221364		Construction	Tsumeb	Otjikoto
155	Clayhouse		P O Box 1496	067-303587	067-302944	Construction	Otjiwarongo	Otjozondjupa
156	MKU			062-212038/9	062-2212059	Construction	Okahandja	Otjozondjupa
157	Paetow M	6 Maranata Park, Water berg Str	P O Box 694	067-302376	067-302375	Construction	Otjiwarongo	Otjozondjupa
158	Timber Den	F. Door Sheds, Hatting St		067-304451		Construction	Otjiwarongo	Otjozondjupa
159	Grootfontein Puik Skrynwerke	276 Olienhout St. Ind. Area	P O Box 840	067-242633	067-242828	Construction	Grootfontein	Otjozondjupa

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
160	Vibre Manufacturing					Construction		
161	Bernard Gallery					Construction		
162	NKC Construction		P O Box 241	065-220491	065-251173	Construction	Ombalantu	Omusat
163	Mouton Enterprises		P O Box 25916	061-234760		Construction	Windhoek	Khomas
164	H.P. Plumbing			061-081129969		Construction	Windhoek	Khomas
165	Adam Building Constr.		P O Box 513	061-0811282221		Construction	Windhoek	Khomas
166	Ministry of Works, Trans. & Com		Private Bag 12005	061-2089111	061-224918	Construction	Windhoek	Khomas
167	Ministry of Works	Bell Street Southern Industria	Private Bag 13341	061-2084257	061-228560	Construction	Oshakati	OmUnited States of Americati
168	Von Bach-Dam Training Centre		P O Box 291	061-2557/501553/501543		Construction, auto-mechanics & electrical	Windhoek	Khomas
169	Namibia Water Corporation Ltd	Von Bach-Dam Training Centre	P O Box 291	062-5092101	062-503472	Construction, auto-mechanics & electrical	Okahandja	Otjozondjupa
170	Karibib Mining & Construction	Navachab Mine Karibib	P O Box 68	064-550192	064-550252	Construction, auto-mechanics & metal	Karibib	Erongo
171	Tsumeb Corporation	Main Str, Windhoek	P O Box 40	061-21115	061-21710	Construction, auto-mechanics, electrical & metal	Windhoek	Khomas
1	Northern Fishing		P O Box 19		064-205472	Electrical	Walvis Bay	Erongo
2	Atlatek Refrigeration	19 Schlosser Str, Swakopmund	P O Box 270	064-402291	064-405302	Electrical	Swakopmund	Erongo
3	De Beers Marine Namibia (Pty)Ltd	141 7th Street Walvis Bay	P O Box 3130	064-207820	064-207830	Electrical	Walvis Bay	Erongo
4	Namib Auto Electric	63 Brucken Street	P O Box 80	064-462693	064-462693	Electrical	Swakopmund	Erongo
5	Bengula		P O Box 272		064-205339	Electrical	Walvis Bay	Erongo
6	G+S Electrical		P O Box 1335		064-400251	Electrical	Swakopmund	Erongo
7	Hangana Seafood		P O Box 26			Electrical	Walvis Bay	Erongo
8	Kuiseb Fishing		P O Box 26	064-22251	064-24690	Electrical	Walvis Bay	Erongo
9	United Fishing Products	2nd Street East		064-202376	064-205273	Electrical		Erongo
10	Kadilo Fishing			064-203567		Electrical		Erongo
11	Pro-Electric		P O Box 934	081-2423606	064-204154	Electrical	Walvis Bay	Erongo
12	Marina Electrical		P O Box 1775	064-204477	062-204476	Electrical	Walvis Bay	Erongo

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
13	Viljoen Elect. Contr.		P O Box 2718	064-462502		Electrical	Swakopmund	Erongo
14	Barloworld Walvis Bay		P O Box 201	064-203454	064-206529	Electrical	Walvis Bay	Erongo
15	SCATS		P O Box 1059	064-461679	064-462797	Electrical	Swakopmund	Erongo
16	Anglogold Ashanti		P O Box 150	064-552000	064-550083	Electrical	Karibib	Erongo
17	Swakop Municipality		P O Box 53	064-4104111	064-4104289	Electrical	Swakopmund	Erongo
18	Cadillu Fishing		P O Box 3672	064-218300	064-206440	Electrical	Walvis Bay	Erongo
19	Wesco Group		P O Box 157	064-218600	064-218601	Electrical	Walvis Bay	Erongo
20	Atlalek		P O Box 270	064-402291	064-405302	Electrical	Swakopmund	Erongo
21	Electrofreeze		P O Box 2384	084-20274	064-200097	Electrical	Walvis Bay	Erongo
22	Atlantic Ref		P O Box 2895	081-2095700	084-200838	Electrical	Walvis Bay	Erongo
23	General Electrical Services	18 Fenchel Street Keetmanshoop	P O Box 868	063-223270	063-223867	Electrical	Keetmanshoop	Karas
24	Swalek Electrical contractors	357 Rivierwal Street	P O Box 591	063-242009/ 240574	063-242494	Electrical	Mariental	Karas
25	Seaflower+White Fish		P O Box 15		063-203999	Electrical	Luderitz	Karas
26	Keetmanshoop Municipality		Private Bag 2125	063-221211	063-223818	Electrical	Keetmanshoop	Karas
27	Rosh Pina Mine			063-34246	063-342145	Electrical		Karas
28	Universal Refr		P O Box 1786	063-234362	063-234362	Electrical	Oranjemund	Karas
29	AGA Technical Services		P O Box 11197			electrical	Windhoek	Khomas
30	Telecom		P O Box 297	061-2019211	061-226971	Electrical	Windhoek	Khomas
31	ABB Whk Electrical	59 Rensburger Street Lafrenz Industria	P O Box 3163	263780	263779	Electrical	Windhoek	Khomas
32	Elektro Hinsch Contracting	Hosea Kutako Drive Southern Industria	P O Box 23023	061-238350	061-223490	Electrical	Windhoek	Khomas
33	Electro Farm Service	122 Sam Nujoma Drive	P O Box 11952	061-223026		Electrical	Windhoek	Khomas
34	Imag Agents/Imag Agencies (PTY) Ltd	6 Planck Street Southern Industria	P O Box 9821	061-257544		Electrical	Windhoek	Khomas
35	Jac Mat Super Centre	183 ja Jonker Road Ausspannplatz	P O Box 21511	061-225565	061-238794	Electrical	Windhoek	Khomas
36	Logtron	13 Lazarett Street Southern Industria		061-225041/234739	061-229682	Electrical	Windhoek	Khomas
37	Marting Refrigeration	4 Reger Street	P O Box 9221	061-228341	061-228952	Electrical	Windhoek	Khomas
38	Melra Electrical Contractor	165 Diaz Street Suiderhof	P O Box 6221	061-251306		Electrical	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
39	Namibian Broadcasting Corporation	Cullinan Street, Southern Industria	P O Box 321	061-2913111	061-215276	Electrical	Windhoek	Khomas
40	Ref-Aire Namibia CC	12 Joule Street, Southern Industria	P O box 21668	064-249717/257311	064-253868	Electrical	Windhoek	Khomas
41	Solar Age Namibia	7 Jeppe Street Northern Industria	P O Box 9987	061-215809	061-215793	Electrical	Windhoek	Khomas
42	Farm Freezer		P O Box 1435	061-227255	061-232326	Electrical	Windhoek	Khomas
43	Freezer Tech		P O Box 7647			Electrical	Windhoek	Khomas
44	Hyflo		P O Box 8113		061-218293	Electrical	Windhoek	Khomas
45	Namibian Beverages		P O Box 1435			Electrical	Windhoek	Khomas
46	NCS		P O Box 70411		061-251761	Electrical	Windhoek	Khomas
47	Plastic Packaging		P O Box 98		061-228984	Electrical	Windhoek	Khomas
48	Radiotron		P O Box 1870			Electrical	Windhoek	Khomas
49	Recor		P O Box 3431		061-239339	Electrical	Windhoek	Khomas
50	Rhino Radio		P O Box 1347		061-237617	Electrical	Windhoek	Khomas
51	Siemens		P O Box 23125			Electrical	Windhoek	Khomas
52	Stocks+Stocks		P O Box 80121		061-231546	Electrical	Windhoek	Khomas
53	Tareni Electronics		P O Box 11673			Electrical	Windhoek	Khomas
54	Telstar TV and Video		P O Box 86245			Electrical	Windhoek	Khomas
55	WP Electrical		P O Box 8023			Electrical	Windhoek	Khomas
56	Ackermann Electr.				061-258164	Electrical	Windhoek	Khomas
57	RI Electrical		P O Box 98194	061-242539	061-242539	Electrical	Windhoek	Khomas
58	Windhoek Schlachterei		P O Box 8519	061-261311	061-262559	Electrical	Windhoek	Khomas
59	Namibia Dairies			061-237763	061-238689	Electrical	Windhoek	Khomas
60	Kaelte Schnoor	Iscor Street, Northern Industria	P O Box 2815	061-261636	061-263502	Electrical	Windhoek	Khomas
61	FROTSWA	6 Planck Street	P O Box 11054	061-237900	061-228208	Electrical	Windhoek	Khomas
62	Windhoek Electrical Works		P O Box 3163	061-263780	061-263779	Electrical	Windhoek	Khomas
63	Namib Beton		P O Box 321	061-2913111	061-217760	Electrical	Windhoek	Khomas
64	Himmel H.O. Electrical Service	Mostert Str, Windhoek		061-241788		Electrical	Windhoek	Khomas
65	Baufeldt Mechanical Workshop	Hattingh Rd, Windhoek	P O Box 1487	061-2071	061-3531	Electrical	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
66	Aranos Electrical Contractors		P O Box 129	061-245/31		Electrical	Windhoek	Khomas
67	Elitson Trucks					Electrical	Windhoek	Khomas
68	Huster Machine Tools					Electrical	Windhoek	Khomas
69	Electro-Tech					Electrical	Windhoek	Khomas
70	Escon Electrical Co.		P O Box 80083	061-261612	061-261612	Electrical	Windhoek	Khomas
71	G Mohr			061-238867	061-238867	Electrical	Windhoek	Khomas
72	Season Aire			061-238796		Electrical	Windhoek	Khomas
73	Aircon Repair			081-1248851		Electrical	Windhoek	Khomas
74	IMAC		P O Box 70411	061-254394	061-251761	Electrical	Windhoek	Khomas
75	Northern Electrical			065-1304279		Electrical	Windhoek	Khomas
76	AGA Cooling		P O Box 1435	061-247872		Electrical	Windhoek	Khomas
77	Khomas Refrigeration			061-2982617		Electrical	Windhoek	Khomas
78	Barloworld Windhoek		P O Box 216	061-2804600	061-240950	Electrical	Windhoek	Khomas
79	Bytes Technology Group		P O Box 11543	061-274400	061-274415	Electrical	Windhoek	Khomas
80	NASHUA		P O Box 22185	081-3206202	061-3206234	Electrical	Windhoek	Khomas
81	Windhoek Kalte Technik		P O Box 6845	081-238856	061-235383	Electrical	Windhoek	Khomas
82	Meatco-Oshakati		Private Bag 550	065-220241	065-221596	Electrical	Oshakati	Oshana
83	Otjiwanda Elec.			067-242676		Electrical		Oshana
84	Northern Namibia Ref.			065-24005		Electrical	Oshakati	Oshana
85	Advance Ref. & El. Serv.		P O Box 1239	065-221643	065-220749	Electrical	Oshakati	Oshana
86	Oshana Refrig		P O Box 2442	065-231493	085-231492	Electrical	Oshakati	Oshana
87	Rieftek		P O Box 398			Electrical	Okahandja	Otjozondjupa
88	Grootfontein Municipality					Electrical	Grootfontein	Otjozondjupa
89	Bima Electrical		P O Box 0217			Electrical	Bachtbrecht	Oshana
90	Country Measure Electrical		P O Box 2500			Electrical	Ondangwa	Oshana
91	True Cool					Electrical		
92	Ministry of Works Transport and Communication	Bell Street Southern Industria	Private Bag 13348	061-2088622/ 2088621	061-2088634	Electrical & auto-mechanics	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
93	Namport	17 13th Road	P O Box 361	064-2082215	064-2082330	Electrical & metal	Walvis Bay	Erongo
94	Namibia Breweries Limited	Iscor Street, Northern Industria	P O Box 206	061-262915	061-263327	Electrical & metal	Windhoek	Khomas
95	Meatco Abbattoir	Sheffield Street Northern Industria	P O Box 2166	061-261361	061-263320	Electrical & metal	Windhoek	Khomas
96	Nampower	147 Robert Mugabe Avenue	P O Box 2864	061-2054111	061-232805	Electrical & metal	Windhoek	Khomas
97	Municipality Windhoek	Town House Independence Avenue	P O Box 59	061-2902911	061-2902006	Electrical, metal, auto-mechanics and construction	Windhoek	Khomas
1	Salomon Goldschmied	30 Kaiser Wilhelm Street	P O Box 283	064-464041	064-464041	Metal	Swakopmund	Erongo
2	Hydroweld (Pty) Ltd	10th Street Industrial Area	P O Box 414	064-202326/2-3119	064-206672	Metal	Walvis Bay	Erongo
3	Globe Engineering		P O Box 2923			Metal	Walvis Bay	Erongo
4	Tunacor		P O Box 70		064-206523	Metal	Walvis Bay	Erongo
5	Premier Contruction		P O Box 887	064-462433	064-462434	Metal	Swakopmund	Erongo
6	Kelnic		P O Box 724	064-204510	064-204514	Metal	Walvis Bay	Erongo
7	Hansa Breweries		P O Box 11	064-405021	064-402328	Metal	Swakopmund	Erongo
8	Etosha Fisheries		P O Box 3	064-202331	064-204482	Metal	Walvis Bay	Erongo
9	Consortium		P O Box 751	064-205821	064-204095	Metal	Walvis Bay	Erongo
10	Walvis Bay Salt Refiners			064-202304	064-205026	Metal	Walvis Bay	Erongo
11	Oasis Water			064-570555		Metal		Erongo
12	Protech Welding		P O Box 2406	064-206697	064-206697	Metal	Walvis Bay	Erongo
13	NAMDOC		P O Box 157	064-218600	064-218601	Metal	Walvis Bay	Erongo
14	NAMZINC		P O Box 188	061-2712336	061-2712521	Metal	Rosh Pinah	Erongo
15	Kumba Resources			063-274200	063-274200	Metal	Rosh Pinah	Erongo
16	WELLCO		P O Box 3672	064-220274	064-220275	Metal	Walvis Bay	Erongo
17	Brumar Turning Service		P O Box 2271	064-220044	064-202804	Metal	Walvis Bay	Erongo
18	Erongo Contracting Services			064-5202511		Metal	Walvis Bay	Erongo
19	R.U.L		Private Bag 5005	064-5202363	064-5202318	Metal	Swakopmund	Erongo
20	Municipality Mariental		P O Box 110	063-240347	063-242039	Metal	Mariental	Karas

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21	Keetmanshoop Engine Rebuilders	5de Laan 9	P O Box 219	063-223466	063-223677	Metal	Keetmanshoop	Karas
22	Lalandi-Luderitz			063-202064	063-202508	Metal	Luderitz	Karas
23	Sea Harvest-Luderitz			063-202064		Metal	Luderitz	Karas
24	Namport of Luderitz	Hafen Street	P O Box 836	063-200 200		Metal	Luderitz	Karas
25	R.E.V. Engineering		P O Box 1152	063-224099	063-224099	Metal	Keetmanshoop	Karas
26	Borries Marking System		P O Box 90507			Metal	Windhoek	Khomas
27	F H B Scales (Pty) Ltd	Fttienne Rosseau Street	P O Box 9283	061-263021/263022	061-217372	Metal	Windhoek	Khomas
28	Hydroweld (Namibia) (Pty) Ltd	8 Planck Street Southern Industria	P O Box 6262	061-225545	061-223167	Metal	Windhoek	Khomas
29	Golin K Engineering	11 Kallie Roodt Street Northern Industria	P O Box 2034	061-261114	061-261189	Metal	Windhoek	Khomas
30	Kraatz Welding & Enginering Works	Florence Nightingale Street		061-250627/230980	061-230976	Metal	Windhoek	Khomas
31	Namib Mills	Iscor Street, Northern Industria	P O Box 20276	061-217001	061-262678	Metal	Windhoek	Khomas
32	Paco engineering	Jan Marais Street Northern Industria	P O Box 1904	061-261679/261689	061-263595	Metal	Windhoek	Khomas
33	Windhoeker Machinen Fabrik			061-235071		Metal	Windhoek	Khomas
34	Paco engineering			061-261679		Metal	Windhoek	Khomas
35	City of Windhoek			061-2902428		Metal	Windhoek	Khomas
36	NEC Stahl	Okahandja		062-501044		Metal	Windhoek	Khomas
37	Erundu Steel Welding			061-269488/ 0811247147		Metal	Windhoek	Khomas
38	Welding World					Metal	Windhoek	Khomas
39	TransWorld Cargo					Metal	Windhoek	Khomas
40	RCC			061-2979003		Metal	Windhoek	Khomas
41	Otjihase Mine			062-541055		Metal	Windhoek	Khomas
42	Henco Eng.			062-562965		Metal	Windhoek	Khomas
43	Berzer's Trailer & Body repair			061-216282		Metal	Windhoek	Khomas
44	Propshaft			061-237348		Metal	Windhoek	Khomas
45	Mechiv Engineering			062-563311		Metal	Windhoek	Khomas
46	AC and V		P O Box 9274			Metal	Windhoek	Khomas

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47	Ernst Lerch + Co.		P O Box 436			Metal	Windhoek	Khomas
48	Geiger Electrical + Mec		P O Box 6751		061-233254	Metal	Windhoek	Khomas
49	HB Engineering		P O Box 50381			Metal	Windhoek	Khomas
50	Sat Com		P O Box 550			Metal	Windhoek	Khomas
51	Starke Manufacturing		P O Box 1301	061-261647	061-216201	Metal	Windhoek	Khomas
52	Trail Quip		P O Box 9705			Metal	Windhoek	Khomas
53	DMS				061-230707	Metal	Windhoek	Khomas
54	Nirosta		P O Box 5845	061-261640	061-264704	Metal	Windhoek	Khomas
55	Afrox		P O Box 261	061-225681	061-238877	Metal	Windhoek	Khomas
56	Allers Aluminium		P O Box 20757	061-261455	061-263592	Metal	Windhoek	Khomas
57	Bezer Trailer		P O Box 10211	061-216287	061-217819	Metal	Windhoek	Khomas
58	AD-More Welding	Hostel St, Katutura		061-261457		Metal	Windhoek	Khomas
59	Central Welding Works	Bohr St, Southern Industrial Area		061-229136		Metal	Windhoek	Khomas
60	Commercial Maintenance	Joule Street Southern Industria		061-228496		Metal	Windhoek	Khomas
61	DV Welding	Newcastle St		061-264747		Metal	Windhoek	Khomas
62	FJS Welding & Light Eng.	Kalie Roodt Street Northern Industria		061-262780		Metal	Windhoek	Khomas
63	MAC Welding	20 Krupp St, Southern Ind. Area		061-235047		Metal	Windhoek	Khomas
64	Namib Welding	94 Rensburg St, Lafrenz Ind. Area		061-215500		Metal	Windhoek	Khomas
65	Namibia Sweiswerke	Bus 8627		061-263440		Metal	Windhoek	Khomas
66	Sheet Metal & Welding Ser.	Hostel St, Katutura		061-262768		Metal	Windhoek	Khomas
67	Sweiskor	10 Jan Marais St, Northern Ind. Area		061-261640		Metal	Windhoek	Khomas
68	Tierene Promotions	17 Aquina St, Academia		061-241514		Metal	Windhoek	Khomas
69	Top Welding	2 Oshapaka Stalls, Northern Ind. Area		061-263747		Metal	Windhoek	Khomas
70	Windhoek Welding	26 Berg St, Klein Whk		061-222137		Metal	Windhoek	Khomas
71	Godinho Auto Body Repairs	Northern Industrial Area		061-262947/8		Metal	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
72	Invo Staalbou	Kallie Roodt Street Northern Industrial Area		061-261641		Metal	Windhoek	Khomas
73	Iron & Steel Namibia	Holstein St, Lafrenz Ind. Area		061-261475		Metal	Windhoek	Khomas
74	Steel Force CC	4 Reger Street		061-249697		Metal	Windhoek	Khomas
75	Sack HH Metal Work		P O Box 3864	061-238648		Metal	Windhoek	Khomas
76	Spark Steel Works	Hosea Kutako Drive Southern Industria		061-238868		Metal	Windhoek	Khomas
77	Titan Body Works	Ernest Kandel St				Metal	Windhoek	Khomas
78	Golden Rivet		P O Box 9291	061-223627		Metal	Windhoek	Khomas
79	Lerch Ernst & Co	Bessemer St		061-226167		Metal	Windhoek	Khomas
80	Balaton Steel Buildings	186 Jan Jonker Rd		061-249806		Metal	Windhoek	Khomas
81	Botma Sweiswerk	Garten St		061-249806		Metal	Windhoek	Khomas
82	Schnelle Hag Welding Const.	12 Wright St		061-222587		Metal	Windhoek	Khomas
83	Silko Engineering		P O Box 70293	061-264751	061-264751	Metal	Windhoek	Khomas
84	SW Body Works	8 Krupp Str	P O Box 5136	061-237593	061-227704	Metal	Windhoek	Khomas
85	Thiels Auto Body Repairs	4 Joule Str	P O Box 5660	061-235040/1	061-222720	Metal	Windhoek	Khomas
86	Exploration Rentals	Nordland Str, Windhoek	P O Box 5365	061-263765		Metal	Windhoek	Khomas
87	Universal Workshop	Groethe Str, Windhoek	P O Box 448	061-2344	061-2341	Metal	Windhoek	Khomas
88	Add More Welding			061-261457	061-261457	Metal	Windhoek	Khomas
89	Brencon			061-219324	061-214932	Metal	Windhoek	Khomas
90	Beton & Sandsteen		P O Box 1226	061-215218	061-263256	Metal	Windhoek	Khomas
91	St. Andrews		P O Box 171	067-5130282	067-5130281	Metal	Ongwediva	Khomas
92	Hartlief		P O Box 428	061-261211	061-216561	Metal	Windhoek	Khomas
93	J. Geiger		P O Box 6751	061-224238	061-233254	Metal	Windhoek	Khomas
94	H.T. Building		P O Box 2353	061-239398	061-239397	Metal	Windhoek	Khomas
95	Namibia Appliance & Airconditioning			061-220291		Metal	Windhoek	Khomas
96	BeUnited Kingdomus Welding Company					Metal	Windhoek	Khomas
97	NBC			061-244474		Metal	Windhoek	Khomas
98	Jac-Mat			061-210016/225565		Metal	Windhoek	Khomas

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
99	Akkerman Elec.			061-244474		Metal	Windhoek	Khomas
100	Oruwe Sanitary			061-217541		Metal	Windhoek	Khomas
101	Prestige Building Prod.		P O Box 163	061-225421	061-236174	Metal	Windhoek	Khomas
102	Alutech Namibia	20 Krupp Str, Windhoek		061-212007	061-212007	Metal	Windhoek	Khomas
103	Basserweld			061-264751		Metal	Windhoek	Khomas
104	NEC Engineering					Metal	Windhoek	Khomas
105	Beitels Steel Work		P O Box 6645	061-231369	061-231360	Metal	Windhoek	Khomas
106	LEHRCO		P O Box 436	061-226167	061-232257	Metal	Windhoek	Khomas
107	BSW		P O Box 6645	061-231369	061-231360	Metal	Windhoek	Khomas
108	Exacto Engineering		P O Box 6821	061-222950	061-222950	Metal	Windhoek	Khomas
109	Roesners Machinen Fabrik		P O Box 4		062-562326	Metal	Gobabis	Omaheke
110	NEC Oshakati		P O Box 156	067-5120125	067-5120125	Metal	Oshakati	Oshana
111	Bens Building			067-5120718	067-5120326	Metal	Oshakati	Oshana
112	Coca Cola			067-5120519	067-5120871	Metal	Oshakati	Oshana
113	Tony Tronics			065-222042		Metal	Oshakati	Oshana
114	O-Four Fitting				065-240125	Metal		Oshana
115	Ongopolo Proc.					Metal		Oshikoto
116	Goltz Mschinenbau		P O Box 299		062-502159	Metal	Okahandja	Otjozondjupa
117	Osbahr Plumbing		P O Box 1886		067-304100	Metal	Otjiwarongo	Otjozondjupa
118	NEC-Stahl Okahandja		P O Box 133	062-501044	062-503149	Metal	Okahandja	Otjozondjupa
119	Meatco-Okahandja		P O Box 144	062-501061	062-501061	Metal	Okhandja	Otjozondjupa
120	Okoruso Fluor Spar		P O Box 1236	067--305404	067-305403	Metal	Otjiwarongo	Otjozondjupa
121	Bennet's Engineering		P O Box 991	067-303636	067-303636	Metal	Otjiwarongo	Otjozondjupa
122	Salt Refiner			064-202304	064-205026	Metal		
123	Schlosserei T. Brockmann			067-302821	067-303746	Metal		
124	S. Kadhikwa Co.		P O Box 1205			Metal	Ondangwa	
125	Namwater			061-302010		Metal		

No.	Name of Company	Physical Address	Postal Address	Telephone No.	Fax No.	Sector	Town	Region
126	Edelstahlbau (Pty)Ltd	3 Jeppe Street Northern Industria	P O Box 9806	061-218606	061-218608	Metal & automechanics	Windhoek	Khomas
127	Namib Fisheries	Oceana Street	P O Box 70	064-203351	064-206523	Metal & electrical	Walvis Bay	Erongo
128	Namibian Ports Authority	13th Rd, NAMPORT 17	P O Box 361	061-208343	061-208390	Metal & electrical	Windhoek	Khomas
129	Elwiwa (Pty)Ltd	3 Jeppe Str Northern Industria	P O Box 1232	061-218600	061-218608	Metal & eletrical	Windhoek	Khomas
130	Transnamib Transport	Bahnhof Street	Private bag 13204	061-2982119/2200/2213	061-2982288/2982653/226226	Metal, electrical & auto-mechanics	Windhoek	Khomas
131	Namdeb (Diamond Company)	Oranjemund	P O Box 35	063-239111	063-232102	Metal, electrical and automechanics	Oranjemund	Hardap
132	Star Body Repairs	16 Kroodt Str	P O Box 580	061-262121	061-262122	Spray painting	Windhoek	Khomas

APPENDIX C (I)
LETTER OF REQUEST TO PARTICIPATE IN A SURVEY

21 June 2006

Dear Sir/Madam

LETTER OF REQUEST TO PARTICIPATE IN A SURVEY

I am currently a PhD research student with the University of Stellenbosch in South Africa, and I am doing research on core, key, generic or employability skills. The effects of globalization and emerging technologies have altered production processes and now demand new forms of skills to improve productivity and capitalize on technological innovation. These market adjustments require that workers possess varied skills such communication, teamwork, working with numbers, problem solving and information technology which make individuals effective, flexible, adaptable and mobile within the labour market.

The purpose of the survey is to identify the employability skills required by employers from vocational training centre graduates entering the labour market, and how such skills should be integrated in the vocational education and training curriculum. The outcome of this study will inform policymakers about the importance of employability skills and will recommend to policymakers how to integrate employability skills in the vocational education and training curriculum of Namibia.

I am therefore inviting your company to participate in a survey by completing the attached questionnaire, which will not take longer than 25 minutes. Kindly complete the questionnaire and return to the student collecting data on behalf of the researcher. This is an opportunity for you to participate in this valuable study. The outcome of this study will certainly benefit your organization.

The information you will be providing will be treated strictly confidential and will not be shared with any other third party and will only be used for the purpose of this study.

Your cooperation will highly be appreciated.

Faithfully yours,

……..
Raimo N. Naanda
PhD. Candidate
Student number 14144476

APPENDIX C (II)

LETTER FROM THE UNIVERSITY OF STELLENBOSCH

UNIVERSITEIT·STELLENBOSCH·UNIVERSITY
jou kennisvennoot • your knowledge partner

15 June 2006

To whom it may concern

Participation in a research project.

Mr. Raimo Naanda is a registered PhD candidate at the University of Stellenbosch (student number: 141444476). He is currently doing research on the topic *The identification and integration of life skills into the Vocational Education and Training Curriculum of Namibia.*

As part of his data generation and data collection process he has prepared a questionnaire to be completed by a selected sample of the target population. You have been scientifically selected to be part of the sample for his research.

We kindly request your assistance and support for this research project. We hope that your organisation and your country will ultimately benefit from the outcome of this research.

Thank you for your co-operation and support.

Yours sincerely

Prof C.A. Kapp
Director: Centre for Higher and Adult Education
Faculty of Education
University of Stellenbosch

CENTRE FOR HIGHER & ADULT EDUCATION
SENTRUM VIR HOËR & VOLWASSENE ONDERWYS

Prof C.A. Kapp
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Matieland, 7602

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Fax: +27 21 808 2270
Email: kapp@sun.ac.za
www.sun.ac.za/chae

APPENDIX D
SURVEY QUESTIONNAIRE

SURVEY QUESTIONNAIRE FOR EMPLOYERS EMPLOYING OR TRAINING TRAINEES FROM VOCATIONAL TRAINING CENTRES

BACKGROUND

What employability skills should vocational education and training (VET) graduates develop before entering the job market?

Employability skills are also known as “soft”, “generic”, “non-technical”, “core skills”, “key skills” or life skills. If you are unfamiliar with any of these terms then answering Question 1 PART C would give you a clear idea of what it means.

The purpose of this questionnaire is to collect data for a PhD research study. The researcher attempts to identify the employability skills required by Namibian employers from Vocational Training Centre (VTC) graduates entering the job market, and how such skills could be integrated in the vocational education and training (VET) curriculum of Namibia.

This is an opportunity for you to contribute to a valuable study. Information provided through this questionnaire will be treated **strictly confidential** and will not be shared with any third party. Results of this study will only be used for educational purposes.

INSTRUCTIONS TO COMPLETE THE QUESTIONNAIRE

i) Please complete the questionnaire to the best of your ability,
ii) Indicate your choice with an **(√)** in the appropriate box, where applicable. In some cases you may mark more than one response,
iii) There is no right or wrong in providing your response,
iv) It will take you approximately **25 minutes** to complete this questionnaire,
v) This is an excellent opportunity for you to participate and contribute to this valuable study. The outcome of this study will certainly benefit your organization,
vi) All questionnaires must be completed and returned by the **14th July 2006**. This will enable the researcher to adhere to the timeframe of this study.

PART A: DEMOGRAPHICS

1. Type of company: Tick only one.

i) Private ☐
ii) Parastatal ☐
iii) Other specify: _____

2. Your gender: Tick only one.

i) Male ☐
ii) Female ☐

3. In which region is your company situated? Tick only one

i) Khomas ☐
ii) Otjozondjupa ☐
iii) Erongo ☐
iv) Omusati ☐

4. Which industry group does your company belong? Tick only one

i) Building construction ☐
ii) Auto-mechanics ☐
iii) Metalwork ☐
iv) Electrical engineering ☐

5. Number of employees in the company. Tick only one

i) Less than 10 ☐
ii) 11–50 ☐
iii) 51–100 ☐
iv) 101–500 ☐
v) More than 500 ☐

6. Your position in the company. Tick only one

i) Owner ☐
ii) Managing director/CEO ☐
iii) Human resource manager ☐
vi) Supervisor ☐
v) Other: specify: _____

PART B: THIS SECTION SEEKS TO DETERMINE THE EMPLOYMENT STATUS OF GRADUATES IN THE NAMIBIAN LABOUR MARKET.

1. Has your company ever employed VTC graduates during the past five years?
Tick only one box.

Yes ☐ No ☐

2. If yes how many, please indicate: _____

i) How many are male? _____ female _____

3. If no, provide reasons why it was not possible to employ VTC graduates. Tick only the most important reason.

Reasons for not employing graduates	**Please tick (√)**
The qualifications are not relevant to our industry's needs	
All our training requirements are provided in-house	
Fully qualified people not required, staff receive training only on modules relevant to our operations	
Have staff currently studying for such qualifications	
Not aware of training available to suit our requirement	
We have not been happy with the quality of VET qualifications	
No particular reason	
Other: Specify	

4. What educational level of trainees does your organization recruit each year? Tick only one box.

i) Level I (1☐year with basic skills)
ii) Level II (2☐nd year with intermediary skills)
iii) Level III (3☐ year with advanced skills)
iv) Graduates with more than one year's work experience ☐

5. What are the benefits to your organisation of employing VTC graduates as opposed to non-graduates? Tick only the most relevant box.

i)	More able to learn	☐
ii)	More achievement-oriented	☐
iii)	More independent	☐
vi)	Clear career-orientation	☐
v)	Professionally qualified	☐
vi)	Current knowledge in field	☐
vii)	Better analytical ability	☐
viii)	More innovative	☐
ix)	Less training cost and time required for training	☐
x)	Increased productivity	☐

6. Do you have a structured development programme for VTC graduates in your company?

Yes ☐ No ☐

7. In which areas do you aim to develop your new graduates during their first year of employment? Tick the most appropriate box.

i)	Knowledge of organisation	☐
ii)	Business presentation skills	☐
iii)	Specific technical skills	☐
iv)	Oral communication skills	☐
v)	Written communication skills	☐
vi)	Self-management skills	☐
vii)	Interpersonal skills	☐

8. **What are the most important selection criteria use to recruit new graduates?** Tick the most important two. Rate them in order of importance (1) most important and (2) important.

i) Academic results ☐
ii) Conceptual and analytical ability ☐
iii) Willingness to learn ☐
vi) Interpersonal skills ☐
v) Presentation skills ☐
vi) Able to work in a team ☐
vii) Flexibility/adaptability ☐
viii) Enthusiasm ☐
ix) Initiative ☐
x) Achievement orientation ☐
xi) Relevant work experience ☐
xii) Oral communication skills ☐
xiii) Written communication skills ☐

8. **What are the differences between the groups of successful VTC candidates and unsuccessful VTC candidates at the final selection process?** Tick the most important two. Rate them in order of importance (1) most important and (2) important.

i) Academic results ☐
ii) Leadership potential ☐
iii) Oral communication skills ☐
iv) Written communication skills ☐
v) All round achievers ☐
vi) Presentation at interview ☐
vii) Interpersonal skills ☐
viii) Demonstrated interest in the organisation ☐
ix) Specific desired skills or qualifications ☐
x) Flexibility/Adaptability ☐
xi) Enthusiasm ☐
xii) Willingness to learn ☐

10. Are you satisfied with the current vocational education and training (VET) system?

☐ Yes ☐ NO

11. The VET System is providing graduates with skills appropriate to employers needs.

Strongly agree ☐ Strongly disagree ☐

12. Training pays for itself through increased productivity.

Strongly agree ☐ Strongly disagree ☐

13. The VET System does not take into consideration the needs of employers

Strongly agree ☐ Strongly disagree ☐

PART C: THIS SECTION SEEKS TO IDENTIFY THE EMPLOYABILITY SKILLS REQUIRED AT A WORKPLACE, AND TO RATE THEIR IMPORTANCE

1. Which employability skills are important at the workplace?

Please indicate on the importance of **all** the employability skills below. Use the following scale to indicate the level of importance:

Employability skills	Very important	Important	Somewhat important	Not important
A democratic orientation to life				
Analytical ability				
Application of numbers				
Capacity for or commitment to lifelong/independent learning				
Career management				
Citizenship/model citizen				
Communication				
Coping with multiple tasks				
Creativity				
Critical thinking				
Customer focused				
Decision-making				
Emotionally balanced				
Empathy				
Entrepreneurial skills				
Facilitation				
Flexibility				
Improving own performance and learning				
Information Technology				
Initiative				
Interpersonal skills				
Leadership				
Logical reasoning				
Managing Information				
Negotiation				
Persuasion				
Planning				
Positive attitude				
Presentation skills				
Problem-solving				
Project management				
Research skills				
Sceptical but open minded				
Self management				
Social responsibility				
Team work				
Time management				
Tolerate uncertainty				
Work ethics				
Others, please specify.				

2. Please indicate the extent to which you agree/disagree with the following statements. Please tick the appropriate box.

i) In a workplace employability skills are more important than specialist knowledge.

Strongly agree ☐
Agree ☐
Disagree ☐
Strongly disagree ☐

3.5 3. If you have employed VTC graduates in recent years, how would you rate your satisfaction with their employability skills? Answer for all employability skills.

Employability skills	Very satisfied	Satisfied	Not satisfied
A democratic orientation to life			
Analytical ability			
Application of numbers			
Capacity for or commitment to lifelong/independent learning			
Career management			
Citizenship/model citizen			
Communication			
Coping with multiple tasks			
Creativity			
Critical thinking			
Customer-focused			
Decision-making			
Effective communication			
Emotionally balanced			
Empathy			
Entrepreneurial skills			
Ethics/values			
Facilitation			
Flexibility			
Improving own performance and learning			
Information Technology			
Initiative			
Interpersonal skills			
Leadership			
Logical reasoning			
Managing Information			
Negotiation			
Persuasion			
Planning			
Positive attitude			
Presentation skills			
Problem-solving			
Project management			
Research skills			
Sceptical but open minded			
Self management			
Social responsibility			
Team work			
Time management			
Tolerate uncertainty			
Work ethics			
Others please specify.			

PART D: THIS SECTION SEEKS TO IDENTIFY HOW EMPLOYABILITY SKILLS EDUCATION SHOULD BE FOSTERED AND INTEGRATED INTO THE VET CURRICULUM.

1. **In your opinion, where should employability skills development take place (environment)?** Please rate **all** the following choices according to importance.

Development of life skills	**Very important**	**Important**	**Somewhat important**	**Not important**
Family/home				
Social context/society in general				
School				
Vocational training centre				
Workplace				

2. **If it is important for VTCs to develop employability skills, at what educational level should employability skills education be introduced?** Tick Only one box.

i) Level I ☐ (1st year with basic skills)
ii) Level II ☐ (2nd year with intermediary skills)
iii) Level III ☐ (3rd year with advanced skills)

3. **How should the acquisition of employability skills be promoted at VTCs? (Mode of delivery.) Please explain.**

_____

_____

_____

_____

4. Who is responsible for developing employability skills? Please explain.

_____

_____

_____

_____

5. How should the development of employability skills be assessed? Please explain.

_____

_____

_____

_____

END OF QUESTIONNAIRE

Please return questionnaire to the following address:

Raimo Ndapewa Naanda
PO BOX 20772
WINDHOEK
Or fax: (061) 226971

Company stamp

Thank you for your valuable time and co-operation
for completing this questionnaire.