

What factors contribute to attrition at day-time Centres in the Skills Training Programme

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Abstract

The purpose of this study was to record and analyse trainees' experiences with non-completion of the courses they enrolled to do in Technical Vocational Education and Training (TVET). Discussing the stories of trainees who dropped out the TVET program provided valuable information related to the root causes of student attrition at TVET centers. Educational planners, tutors and trainees can benefit from the information provided to understand the phenomenon of student attrition, recognize behaviors that are predictive of student attrition, and undertake strategies to increase retention at TVET centres.

This research paper used a narrative approach and drew on the value of phenomenology to gain insight into the phenomenon of attrition in TVET. Ten former trainees who dropped out of programs at three full time centers for TVET comprised the sample for the study.

Triangulation of the data collected for the study included the narratives of the participants as they responded to prompts in a semi-structured interview, the archival attrition reports of the training centers, and the findings of major studies on student attrition.

The narratives of the lived experiences of the trainees were written and the overarching themes that emerged from the analysis of the data were that family and social factors, financial factors, institutional factors and even student trajectories were key contributors to trainee attrition. The study is significant because it illuminates critical shortcomings in institutional policies and in the suggestions that it makes to stem trainee attrition in TVET.

Keywords: Attrition in TVET.

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DEDICATION

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Chapter 1 Background

Technical Vocational Education and Training (TVET), has been recognised as ‘essential for enhancing economic competitiveness and for contributing to social inclusion, poverty reduction and sustainable development’ in modern societies (UNESCO, 2006). It also responds to market trends, equips learners with basic skills and supports personal and social development. The introduction of public TVET is, therefore, important for economic and social development. However, it is not without its barriers one of which is attrition.

Tinto (2006) noted that the perennial problem of student attrition confronting tertiary level institutions has been around for more than one hundred years and that it seriously and negatively impacts the graduation rate of those institutions. Although globally funding for TVET still remains inadequate, there remains a dire need for a workforce equipped with technical vocational skills. In the Caribbean and in Trinidad and Tobago specifically, the problem of major significance has not been that of less funding but rather a high attrition rate. Example in the National Training Enterprise Programme (NTEP) when you look at the Attrition Reports at the end of cycle there was a steady increase in attrition which range from 11% to 59% with an average all round of 39%.

Technical/Vocational institutions suffer from high attrition rates which negatively impact the success of these programs (UNESCO). High attrition rates decrease the number of skilled graduates that are projected to enter the workforce each year, and in so doing, lessen business organizational growth and national productivity. High attrition rates are therefore an institutional, industry and national problem for which a solution must be found.

Several theories and theoretical frameworks have been proposed to explain why students drop out. Many dropout research studies have been guided by Tinto’s student integration model

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and Bean and Metzner's (1985) student attrition model. From as early as 1982, Tinto had suggested that group specific models of student disengagement be developed if researchers were to have greater insight into the reasons for student attrition. These models should include criteria like race, gender, age, social status, and even the background of the students if researchers were to avoid the distortion that may occur in defining the true characteristics of the dropout especially when disadvantaged groups were involved. By 1987, Tinto had reported that most traditional college students who did not complete their course of study had left voluntarily and that their decisions to withdraw were generally based on personal, social and financial problems.

Tinto (1993) identified the interactions between a student and his/her educational environment during students' stay in programs as a primary cause for student attrition. He suggested that the stronger the connection between the student's academic integration and social integration, the greater the student's commitment to the institution of learning and his or her persistence at school. Educators and researchers were not satisfied that Tinto's model had adequately addressed the causes of attrition among non- traditional students who are described as different in age and financial independence (Evelyn, 2002), family commitments (Leonard, 2002; Sweet and Moen, 2007) and career paths (Bauman et al, 2004) from their traditional counterparts. Bean and Metzner (1985) developed a model of student attrition which stated that older students (nontraditional ones) dropped out of school because of one or more of the following reasons: academic performance, intent to leave, previous performance and educational goals, and environmental variables.

Bean and Metzner indicated that adult students were more greatly influenced by environmental variables like finances, hours of employment, outside encouragement, family responsibilities and opportunity to transfer than by the academic variables like study habits,

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academic advising, absenteeism, major certainty and course availability. Bean and Metzner proposed that dropout decisions for non-traditional students were based both singularly and interactively on six constructs among which were background and defining variables, academic variables, environmental variables, psychological outcomes, and intent to leave.

The Bean and Metzner model contradicted the expectations in the Tinto model that social integration would have any significant effect on nontraditional student attrition. In fact, the Bean and Metzner (1985) model affirmed that the most significant variables affecting dropout decisions among nontraditional students were academic performance, intent to leave, background and defining variables mainly high school performance and educational goals, and environmental variables.

This researcher finds merit in the theoretical frameworks of Tinto and Bean and Metzner. This study draws on the Tinto 1987 model and the Bean and Metzner (1985) model to help determine the causes of attrition in the three post-secondary institutions that offer technical vocational training in Trinidad and Tobago.

Vincent Tinto's work (1975, 1987, and 1993) has paved the way for a sociological analysis of retention, which has been popular for several decades. Tinto's research and that of his followers may be credited with expanding the debate on the causes of attrition by calling attention to institutional factors that affect retention, namely the importance of academic and social integration in lessening dropout rates. Tinto also reveals that students'/trainees' commitment to pursue their goals depends on the individual characteristics of the individuals as well as their ability to integrate into their new environment.

Other studies have identified different factors that prevent students from completing programs (Bean and Metzner, 1985; Garnier et al (1997); Janosz et al, (2000); Ajzen, 1991). In

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addition, theoretical models based upon studies of traditional students are useful in describing the attrition process of traditionally-aged, resident freshmen may not necessarily be useful in describing the attrition process among non-traditional students/trainees. Bean and Metzner pointed out that even with the growing body of research on non-traditional students, because insufficient attention had been paid to differentiating between the adult student and other aspects of the non-traditional student, there remained a gap in the literature regarding the attrition process for adult learners in formal educational institutions (MacKinnon-Slaney, 1994).

The Tinto (1987) model provided a conceptual framework to gain an in-depth understanding of the contributing factors to the problem of attrition, but it did not limit the reasons for student attrition to one factor alone. The model identified many factors that contributed to the problem because Tinto focused on what happened before and after students entered a training program.

This study aims to identify the factors which give rise to attrition in technical vocational programs by taking careful note of the stories of trainees. This researcher believes that through the use of narrative models researchers can gain understanding of the reasons, explanations, causes and even likely solutions to problems just as if they had drawn on some epistemological consideration or theoretical model. A combination of the Bean and Metzner (1985) model with its focus on non-traditional students and the Tinto model with its focus on traditional students is also used to compare and support the findings of this researcher into the problem of student attrition in technical vocational programs in post-secondary institutions.

Research Setting

The vision statement of the centres under study declares them to be performance leaders in building human capacity for a competitive economy. Their mission mandates them to prepare

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citizens for a changing economy through delivery of innovative, market-driven, TVET and entrepreneurial development. Buchanan & Sharma (2009), in a significant study on attrition in Technical and Further Education (TAFE) courses in Australia revealed that the vast majority of students that left did so because of environmental factors. In Canada, Molgat et al (2014) looked at the trajectories of vocational school leavers and concluded that students/trainees dropped out because of institutional factors, generally because they felt that there was a mismatch between what was being offered at school and what the labour market demanded. On the other hand, in Germany, with its dual system of academic and technical vocational education, freshmen who dropped out of a TVET program invariably returned to one because of the strong societal sanction against persons who lacked TVET certification.

Maclean (2011) stated that skills development for employability and sustainable economic development had been identified by the United Nations Educational Scientific and Cultural Organization (UNESCO) as a major and growing priority within technical vocational education and training (TVET) programs. Many institutions have endeavoured to present a workforce that is equipped to play a meaningful role in the modern competitive economy. They met with marginal success because they put their emphasis primarily on recruiting and failed to recognise that an equally committed effort had to be made to ensure the retention of the trainees so that they could be certified as fit to enter the workforce. Recent trends have indicated a decrease in the number of persons enrolling in and actually completing TVET programs (Hail, Smith & Chir, 2008). Sheard (2009) insisted that trainees must not only be concerned with skill acquisition but must also develop a level of commitment and dedication to pursue their goals. Letawsky, Schneide, Peder & Palmer (2003) suggested that a prime indicator of the success of a technical vocational program was the program's ability to recruit and maintain motivated

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students. Morris (2010) contends that it is “reasonable to believe that TVET is potentially capable of satisfying people’s basic needs when one reflects on Maslow’s theories of basic individual needs.” p. 104.

Research Problem

Attrition in TVET is an area of primary concern to educators because attrition generally leaves students with disappointments, financial setbacks and a lowering of their career and life goals. Unravelling the complex phenomenon of attrition will undoubtedly be beneficial to current and future trainees as well as to the organizations that provide training for those trainees.

Congruent with the stated problem, the aim of this research is to critically examine the reasons for attrition in TVET programs in post secondary training centres in Trinidad and Tobago. An understanding of the causes of the attrition problem will make it easier to find remedies that would help alleviate the problem. In Trinidad and Tobago, TVET education is important for providing the workforce with skilled persons. Student attrition is antithetical to the efforts to satisfy the demand for a quality workforce. This study hopes to shed light on measures that administrators and policy makers can adopt both when they design training programs and employ strategies to reduce the rate of attrition among trainees.

In keeping with the aforementioned purpose, this paper therefore seeks to answer the following research questions:

1. What factors influence a trainee to drop out of the NTEP skills training programme program prior to completion and certification?
2. How do institutional variables contribute to trainee attrition?
3. How do the local factors relate to the existing theories of attrition?

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Significance of the Research

Researchers such as Blue (2011) and Kallon (2009) recognise attrition or school dropout rates as significant enough to warrant further investigation. Knowledge of this problem has inspired this researcher to explore the factors giving rise to attrition in TVET with a view to making appropriate recommendations to increase student retention in TVET programs. It is important to investigate the factors that contribute to attrition in TVET, because continuing decreases in a country's short and long term workforce projections in skilled labour negatively impact productivity and national gross domestic product (GDP). Over time, if this problem is not addressed, governments may have to rely on imported labour which will deplete budget allocations for other sectors of the society, as well as foreign exchange reserves through remittances. Other consequences at the microeconomic level will be the reduced marketability and earning power of breadwinners, a lower standard of living and the other concomitant economic factors.

Summary of the Study

This study is organised into five chapters. Chapter One provides an introduction with a background of the study, the statement of the problem, the purpose of the study and its significance. Chapter Two is a review of the related literature to the study. Chapter Three presents the methodology used to provide some justification for the methods used in the study. Chapter Four presents the analysis of the qualitative data and the presentation of the findings. Chapter Five, the final chapter, discusses the findings, and makes recommendations for further research.

Chapter 2 Review of the Literature

The Seriousness of the Problem of Attrition

A review of the literature shows that there is no single risk factor to predict who is at risk of dropping out of school (Hupfeld, 2007). Suh (2001) states that dropout means leaving school without certification. Bean and Metzner (1987) and Tinto (1993), to their credit, focus on the process by which attrition occurs. They point out that there are multiple factors interacting with each other across many domains that lead to the high rate of drop outs and note that attrition rates for non-traditional students are higher than those for their traditional counterparts, with both the institution and the student suffering as a consequence.

Kallon (2004) states that the problem of school dropouts is one of the most crucial issues facing education systems in the Caribbean. Blue (2011) refers to high school dropout rate as a silent epidemic and laments that even in North America not enough attention is paid to the problem. Kallon reiterates that at the present time, sixty per cent of the jobs being created in the Caribbean need at least a secondary school education or some form of specialized training, so school dropouts constitute a great cost to local tax payers in terms of their weak earning power, the lower taxes collected from those individuals and the additional cost of unemployment benefits, health and policing (2004 p.1).

Many leaders in the region believe that TVET has the potential to address the mismatch between education and human potential (Jamaican National Commission for UNESCO, 2009). Whatever the reason for attrition, or wherever it occurs, Levine (1989) underscores the need to reduce attrition rates. Battin-Pearson et al (2000) maintain that researchers must identify the

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predictors of high school dropouts because understanding the causes and processes of dropping out can provide valuable insight into the creation of effective approaches to preventing the problem.

Attrition: Difficulty with its Definition

The information that exists relating to TVET attrition is significantly less than what is known about attrition in general. Tinto (1993) affirms that attrition remains a mystery to researchers in spite of the copious and impressive work done on it for several reasons. For one thing, contradictory findings have appeared in research studies because insufficient care was taken to properly define the problem. Those studies failed to truly shed light on the problem and unintentionally compounded the phenomenon of attrition (Cope & Hanna, 1975). Difficulty with the definition of attrition arose when the causes of attrition among traditionally aged resident students were declared to be the reasons for the attrition witnessed at institutions of learning. Those findings, though plausible, were misleading because they ignored the fact that the reasons for attrition among resident college students were not necessarily the same for the non-traditional students who commuted.

Moreover, even when attention was paid to the non-traditional student, attention was focused only on the older students who were only one facet of the non-traditional population (DeRemer, 2002). Munday (1976) points out that the term non-traditional student embraces many kinds of students and not only the aged or older student. In addition, the presence of non-traditional students at universities and college campuses has become a typical phenomenon today at post-secondary institutions of learning/training. Cross (1980) labels as 'new', students who were educationally disadvantaged and who would not traditionally be considered college material without open admission policies. For Cross, non-traditional students were those

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students, who while maintaining responsibilities such as employment, family, and other duties of adult life, returned to school either part time or full time. Commuter students were also included on the list of non-traditional students (Bean and Metzner, 1985).

In addition, care has to be taken to say whether the attrition under discussion is institution specific or systemic, involuntary or voluntary in nature, temporary or permanent in duration (Spady, 1970). In other words, before we can genuinely examine the causes of attrition, we have to know clearly whether we are referring to the student/trainee who leaves one institution but intends to complete certification or training in another institution (institution specific) or whether the student has left the institution and never receives certification or training from any institution (systemic). Researchers who hold a system-wide perspective on attrition view the institution-specific perspective as being narrow and misleading, and prefer to focus upon the factors that hinder a student's ability to realize his/her educational goals in the current system of higher education.

Attrition in TVET Education

There is no universally accepted definition of TVET. Maclean and Wilson (2009) contend that this field is continually changing. In general terms TVET is concerned with the acquisition of knowledge and skills for the world of work. Researchers in TVET found that many factors may contribute to attrition, for example: family factors, pregnancy, parenting, financial problems, poverty, chronic absenteeism and institutional problems.

In one of the first large scale studies on dropouts, Rumberger (1995) explained that increased drop-out rates were definitely related to school structure. Fine and Rosenberg (1993) described the dropping out process from the trainees' point of view and indicated that students had to take some form of responsibility for the reasons why they failed to continue studying.

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Fine and Rosenberg explained that persons who failed to meet societal expectations or norms often encountered problems with staying in school. Brown and Rodriguez (2009), citing a study done in North America, disagreed with Fine and Rosenberg and pointed out that dropping out occurred not only because of an accumulation of risk factors but also because of the negative daily experiences of the students in school.

In Scotland, Raffe, (2010) suggested that vocational colleges were not always equipped to deal with the needs of disaffected youths. For him, keeping the young trainees engaged was the way to increase retention. Education institutions and training centres had to adopt a less structured style of adult learning. Instead the emphasis should be to provide the support and motivation trainees needed to encourage them to persist at school. The institutions' focus should be on improving retention by seeking out best practices to guide them to achieve their TVET benchmarks and see an increased number of trainees graduate out of the TVET programs.

Bean and Metzner and the Student Attrition Theory

Bean and Metzner's (1985) Student Attrition Theory is based on organizational theory and attitude behaviours interactions theory. It emphasises that student decisions to leave university are synonymous with adult decisions to leave the workplace. Bean and Metzner developed this theory for non-traditional students and defined non-traditional students by age, residence and attendance. Bean and Metzner ascribe some particular characteristics to the non-traditional student. They describe the non-traditional student as being usually older than the traditional student, as being not resident on the campus (a commuter), or some combination of those factors, and as being not greatly influenced by the social environment of the institution.

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They hypothesize that non-traditional students' dropout decisions are based on four sets of variables: academic, background, psychological and environmental.

For Bean and Metzner (1985), academic variables refer to study habits, academic advising, absenteeism, major certainty and course availability. On the other hand, age, enrolment status, academic goals, residence, high school performance, ethnicity and gender constitute background variables. Utility, satisfaction, goal commitment, and stress comprise the psychological variables while environmental variables consist of finances, hours of employment, outside encouragement, family responsibilities and opportunities to transfer. Non-traditional students for Bean and Metzner are primarily concerned with the institution's academic offerings (especially courses, certification).

Bean and Metzner find that environmental variables are more important than academic variables for non-traditional students. They postulate that even when academic variables are good and the environmental ones poor, students tend to drop out of school and the positive effects of the academic variables on retention are not seen. Bean and Metzner also find that the psychological variables are more important for non-traditional students than the academic variables.

Critique of the Bean and Metzner Model

Stahl and Pavel (1992) conducted a study to determine how well the Bean and Metzner Model fit with community college student data. Like Anderson (1981) and Kohen, Nestel & Karmas (1978) who conducted extensive research among community college students to verify Bean and Metzner's claims, they found the Bean and Metzner model to be a weak fit with community college students and identified a new model, the Community College Retention Model to be superior to Bean and Metzner's.

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Tinto and the Student Integration Theory

Tinto's (1975) Student Integration Theory was the most widely discussed and most researched model of student retention. Braxton (2002) points out that more than seventy (70) years of research have been done on the question of student retention in higher education, from which several theories have been subsequently developed, the majority of which have been derived from studies within the US higher education system. Berger and Braxton (1998) state that Tinto's student integration model has been the focus of much empirical research and a virtual paradigm for research in attrition among college students.

Tinto's (1975) theory drew on the findings of Durkheim's (1951) theory of suicide and Spady's (1970) theory of attrition. Tinto's theory is a longitudinal process and links attrition or persistence to the degree to which a student becomes integrated into the social and academic life of the college or university (Tinto, 1993; Rendon, Jalomo and Nora, 2000). Tinto (1993) states that both types of integration do not have to be equal but some level of academic and social integration must occur if attrition is to be reduced in US colleges or universities.

Tinto also explains the nature of the reciprocity between the two types of integration. He contends that if the relationship between the two types of integration is lopsided and that the student spent too much time on study, the social integration aspect may suffer and eventually lead to attrition. Tinto's (1975) theory postulated that students entered university with a set of background characteristics, individual attributes, and prior learning experiences. He defines background characteristics as those that include family social status, parental formal education and even parental expectations. Individual attributes refer to the student's gender, race, age and academic aptitude, and the student's prior learning experiences include the student's high school achievement and academic course work.

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Tinto argues that the student's degree of commitment to be identified with the institution or to achieve academic goals depends on how the background characteristics, individual attributes and prior learning experiences combine in the individual student. Moreover, depending on the student's level of integration into the academic and social life of the institution, the student's degree of commitment to achieve academic goals may be affected, and if negatively impacted, then attrition may occur (Tinto, 1975).

According to Tinto (1987), most college students leave voluntarily and their decision to withdraw stems most often from personal, social, and financial problems. Tinto suggested that integral to a student's success at the institution is the student's ability to incorporate new patterns of interaction with members of the new group and to establish competent membership in the group as a participant member. Tinto (1993) observes that the institution, unlike the society into which an individual has taken up residence, lacks the formal and informal mechanisms to connect students to it and identifies the important role that residence hall associations, student organizations, extracurricular programs and faculty lectures can have in reducing attrition.

By 1993, Tinto had revisited and modified his original theory to include another two constructs or factors: External Commitments and Intentions. Tinto (1993) recognises the role of individuals to determine their future and acknowledges that students' intentions can have a direct influence on their goal and institutional commitment, which both directly influence student retention. External commitments such as families, neighbourhoods, peer groups and work environments play as significant a role as goal and institutional commitments and therefore cannot be ignored in any serious consideration of factors that influence attrition in post secondary institutions.

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Tinto (1993) even identifies as being a positive side to the scourge of attrition, a scenario where students drop out of college to pursue another form of education or training in their best interest. Maroney (2010) refers to students' pursuing the Cisco Certified Network Professional designation, a technical credential that is not college-based, that is the industry standard for employment (Cisco Systems Networking Academy, 2007), and disagrees that those students can be considered dropouts.

Critique of the Tinto Model

Although the vast majority of studies into Tinto's Student Integration Model (SIM) have been generally supportive, some contend that the Tinto model is globally flawed and fails to explain the majority of attrition behaviour. Brunsdon, Davies, Shevlin and Bracken (2000) carried out a statistical analysis on a questionnaire administered to 264 first year University students in order to assess their conceptualisation of the key features of Tinto's model. After assessing each of the participants with their own questionnaire and with proven psychometrically verified valid tests [The Eysenck Personality Inventory (EPI), Rosenberg Self-Esteem Scale (SES) and the Satisfaction with Life Scale (SWLS)] they found that Tinto's model fails to adequately explain the data collected. However, they concede that there are several significant shortcomings in their own conceptualisation of the study, potent enough to render their results invalid. Rovai (2002) also notes the limited applicability of Tinto's model to non-traditional students, like those involved in distance learning.

Undeniably, the Tinto Model of student attrition has its strengths and weaknesses. Researchers, on the other hand, may have abused the model and are bound to be disappointed with it because they unreasonably expect that Tinto's model of student attrition can justly

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account for every conceivable reason that every single departing student has for leaving higher education.

Other Theories of Attrition

Sabharwal (2005) says that Tinto was perhaps the most influential scholar in the field of persistence research among college freshmen and that Tinto's research had spawned many other studies. In the Caribbean, Brown (2004) points out that at least five different theories have been advanced to explain the phenomenon of school dropouts. Each of these theories offers a unique set of affective influences or processes, and reveals the evident disastrous effect of the interrelationship of certain key variables. Garnier et al (1997) and Janosz et al (1997) advance the Academic Mediation Theory to reveal that poor academic performance as well as anti-social affiliations, personal deviance, family socialization and structural strains have consistently been strong predictors of dropping out from school.

Structural Strain Theory

Rumberger (1983, 1987), in studies that focus on demographic factors indicates that dropouts are more likely to be boys than girls and are more likely to be from families of low social-economic status. He hypothesizes that the structural factors like gender, ethnicity and socio-economic status have a direct effect on school dropout over and above the mediating influence of low academic achievement. Tesseneer and Tesseneer (1958) caution against oversimplifying the complex phenomenon of attrition and point out that students can be influenced in different ways at different times by the same environmental factors. Janosz, Le Blanc, Boulerice and Tremblay (2000) find that the use of differential dropout prevention strategies can serve to combat the influence of the structural stress factors on attrition. Miller

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(1998) highlights the dilemma that boys face in the Caribbean. They start their schooling late, attend school more irregularly, repeat more grades, drop out earlier, have lower completion rates and achieve less than girls while in school.

Non-Traditional Perspective on Attrition/Retention: The Trainee Perspective

Tanggaard (2013) cites Fine and Rosenberg (1983) for their presentation of one of the early studies describing the process of attrition from a student viewpoint. Fine and Rosenberg's study reveals that black and Mexican students feel that access to higher education is not always distributed equally across social groups. The Mexican students also state that the pursuit of educational qualifications to satisfy entry requirements to the labour market can sometimes be seen as an exercise in futility because of the other barriers beyond the educational context that prevent them from entering the labour market (Dorn, 1993). Smyth and Hattam (2002) explain that the perspective of groups, who are the principal subjects of an investigation, can be as informative and helpful as the epistemological or theoretical ground upon which a study is based.

Quality Assurance in Education to increase retention at institutions of learning

Hoy et al (2000) believe that quality education is what is critical for the improvement of student retention at learning institutions. While the notion of quality in education is not new, its recent rise to prominence is due to the increased scrutiny being made of the output of educational institutions with a view to assessing their relevance and appropriateness to societal needs.

Kuboni (2002), commenting in the field of TVET, declares that the terms quality assurance and National Vocational Qualifications (NVQ) are almost inseparable. In training institutions that follow the Caribbean Vocational Qualifications (CVQ) and NVQ qualifications, while the competency based method of teaching acknowledges that a lot of the learning can take

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place without actual teaching, the students expect there to be quality, well-planned teaching whenever that teaching is needed. Accordingly, it is important for TVET programs to measure the methods of teaching to ensure that they are imparting higher order cognitive skills, such as problem solving skills. If teaching methods emphasized rote memorization and rewarded passive learning then students/trainees who may already have had poor academic experiences in their primary and secondary school could become easily frustrated and opt to drop out of the technical vocational education program.

More Measures to Lessen Attrition

Hanna (2010) and Azzam agree that boredom and disengagement are two key reasons why students stop attending classes. Adult learners in technical vocational institutions need to see the importance of what they are learning to their life. More on the job training is needed so that trainees may see the relevance of the skill they are pursuing.

Furger (2008) argues that the institution must have positive expectations for the trainees. Some of the students/trainees in TVET institutions are victims of a failed education system and when the expectations for them are low, they just maintain the self-fulfilling expectations people have of them (Jules, 2012).

The implementation of schemes to make industries become more involved in training is also an important measure for reducing attrition rates. The internationally admired German system of basic TVET is dual in the sense of being not only partly based in training institutions external to industry, but also partly based in industry itself (Lauglo, 2006).

The training and mentoring of TVET staff is another valuable strategy to be employed if retention rates for students/trainees of TVET are to improve. TVET instructors must be supplied with the necessary tools and equipment to perform. The funding must be provided to help

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introduce the latest technology in the classrooms. If training is to meet the demands of the twenty-first century, vocational skills training has to be seen as a good alternative to academic education. The perception that skills training was for non- achievers has to be eradicated, and training agencies have to market the programs either as viable alternatives or as alternatives to go along with academics (Corrigan, 2013).

Methodology

The purpose of this study is to determine why trainees drop out of the skills training program that they register to attend before completing the six or nine modules of the cycle. The primary research questions to be investigated were

1. What factors influence a trainee to drop out of a TVET program in Trinidad prior to completion and certification?
2. How do institutional variables contribute to trainee attrition?
3. How do the local factors relate to the existing theories of attrition?

This chapter discusses the research approach, the rationale for the selected methodology, instrumentation, any researcher biases, ethical issues, timelines for the collection of data and the method of data analysis, the limitations and delimitations of the study.

Research Design

Researchers use paradigms in the human and social sciences to help them to understand phenomena (Creswell, 1994). Creswell underscores the importance of the selection of a topic and a paradigm as the beginning components of designing a study. This study seeks to discover the causes for attrition in vocational studies programs at three training centres using a qualitative approach. The qualitative approach, according to Roberts (2010), is grounded in the philosophical orientation called phenomenology, which is focused on an individual's experiences from his or her personal perspective.

Van Manen (1997) a noted researcher on phenomenological studies contends that phenomenology is the most appropriate method to explore phenomena as a response to how one orients lived experiences and questions the way one experiences the world. However, the

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challenge of phenomenology is to describe what is given to us in immediate experiences without being “obstructed by pre-conceptions and theoretical notions.” (p. 184.)

Creswell (1994) defines a qualitative study as an “inquiry process of understanding a social or human problem, based on building a complex, holistic picture, formed with words, reporting detailed views of informants, and conducted in a natural setting. Creswell further explains that in qualitative research, participants provide a framework for the researcher to critically analyze, synthesize, and organize the gathered data.

Many researchers including Grace (2001), Dore (2009) have researched the problem of vocational educational attrition by listening to the voices of the participants. The studies have revealed that dropping out or attrition is often determined by institutional and non-institutional factors. O’Neal (2012), Tanggaard (2014) and Jorgensen (2011), Connelly and Clandinin (1996) have all underscored the importance of understanding the life stories of participants in order to fully understand any phenomenon.

This researcher attempted to use the experiences of previous researchers to elicit stories from participants in order to explore their own explanations about dropping out TVET programs in Trinidad and Tobago.

The interviews in this study were conducted over three days, one day for each centre. The study was conducted over a six month period, from January to June, and a semi-structured interview was used with the ten participants.

The interview guide was organized around five headings:

1. Course attendance and reason for leaving
2. Institutional factors, skill and academic performance

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3. The family
4. Personal perceptions
5. Economic reasons.

The interview served to provide a good sense of the different perspectives from diverse students about:

- i. the reasons for their dropping out of the program
- ii. how their reasons for dropping out of the program compared with the factors identified
in the Tinto (1975, 1993) and Bean and Metzner (1985) models
- iii. the institutional factors that contributed to trainee attrition.

Justification for the Design

Davis (2007) states that good qualitative research is just as valuable as quantitative research in status, relevance, and methodological rigour, and may even surpass it. The qualitative research methodology, phenomenology, was chosen because of a desire to explore from participants' viewpoint reasons why they registered for a course and then dropped out or were pushed out of the program. Understanding the participants' perspective required a research design that allowed persons to express themselves (ideas, thoughts, experiences, feelings and memories) freely.

The qualitative process involved conducting interviews at the centres, analysing the interview transcripts, reviewing centre dropout data, and triangulating the data with the organisation's research department. Polkinghorne (1989) describes the phenomenological process as a three step practice applied to a research prompt that involves gathering data

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(detailed first hand descriptions) from persons who have experienced the phenomena being studied, analysing the data to provide an understanding of the root causes of the behaviour, and finally presenting a study that describes the phenomenon in such a way that an unsophisticated reader can be aware of the nature of the phenomenon.

Setting

The interviews were conducted at three day-time centres for technical vocational studies in air conditioned rooms. Trainees were interviewed in the centre they attended prior to dropping out. The rooms were comfortable, private, quiet and free from distraction so that the interviewees' responses could be uninhibited and confidential. All trainees were made comfortable and were provided with a snack and drink after the interview process.

The Participants

Marshall (1996) posits that it is rarely practical, efficient or ethical to study a whole population and that choosing a sample is an important step in any research project. Sampling as it relates to research refers to the selection of individuals, and Mason (2010) states that in qualitative studies the sample sizes are generally much smaller than those used in quantitative studies (Ritchie, Lewis and Elam, 2003). A purposeful sample is used in this study. Johnson and Christensen (2008) see purposeful sampling as one which involves locating individuals with specific characteristics as specified by the researcher. Moreover, Patron (2002) reports that purposive sampling focuses on selecting information-rich cases whose narratives can illuminate the questions under study. All the participants were enrolled in various skills programs at the three daytime centres, located in the north and central part of the island. The goal of the researcher is to have an appropriate representation of male and female participants. Lamentably,

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the centres offered soft skills and the percentage of males enrolled was typically smaller than the females. One centre did not have any of the hard skills that would ordinarily attract males. In addition, of the many persons contacted by phone and invited to participate in the study on attrition in the skills training programme at NTEP training institutions, only ten responded favourably and they constituted the sample used in the study. The participants for this study, aged 18 to 35, were within the age range specified in the Bean and Metzner Model for non-traditional students. All ten persons had been enrolled in the program in different cycles. The sample included two males and eight females.

Methods of Data Collection

After institutional approval was received from the organisation the study was initiated. Recruitment was done by contacting the three centre managers to call all trainees on the list of dropouts (Appendix A) using a prepared script. An invitation was extended to them to attend an interview on a scheduled day to be a part of the study on attrition in technical vocational skill courses at the various institutions.

An Interview protocol (Appendix B) was utilized to facilitate data collection. All participants were asked the same standardised open-ended questions so that the interviews could be faster and more easily analysed and compared (Gall, Gall & Borg, 2003; Mc Namara, 2008; 2009). All the interview questions were designed to ensure that they generated the relevant responses to answer the research questions. The standardized questions also helped to improve the credibility of the study. The researcher was able to write down the answers to the questions ad verbatim as the participants shared their stories.

Ten semi-structured interviews were conducted altogether in the month of April, 2014. Two interviews were done on day one, five on day two, and three on day three. During the

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second set of interviews one colleague was asked to take detailed notes for later comparisons with the researcher's notes (Mack, Woodson, Macqueen, Guest & Namey, 2011). After each of the five interviews conducted on the second day, the researcher and colleague compared notes to ensure the accuracy of their record before the next participant was interviewed. The other five interviews of day one and day three were conducted using detailed notes by the researcher. Two days later the interviewees were called to verify the accuracy of the transcript of all answers they gave. Upon review of transcripts, subjects were given the opportunity to meet with the researcher to clarify issues. In addition, the researcher recalled three (3) participants to probe further (hermeneutics) into their contextual meanings presented in the interviews (Geanellos, 2000).

Instrument – The Pilot Test and the Interview Schedule

This study employed the structured interview as its instrument. O'Leary (2004, p. 150) points out that, although collecting credible data is a tough task, no single method of data collection is inherently better than another. In an effort to eliminate bias and reduce the incidence of confounding variables, initially all interviewees were asked the same questions with the same wording and in the same sequence (Corbetta, 2003), and in the same tone of voice (Gray, 2004) so that the respondents would not be influenced by the tone of the interviewer. The Researcher also used prompts to probe the participants further if needed. This researcher chose to use of face to face interviews because this type of interview is used widely to supplement and extend knowledge about individuals' thoughts, feelings and behaviours, meanings, interpretations, etc. In addition, guided by Chenail (2009) and Mc Namara (2009), this researcher employed pre-interview exercises to improve her instrumentality and address potential biases. She followed Mc Namara's advice and heeded the value of preparation for the interview by choosing a setting with little distraction, explaining the purpose of the interview, addressing the terms of

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confidentiality, explaining the format of the interview, indicating how long the interview usually takes, advising the interviewee how he/she may get in contact with her later if he/she wants to, asking if interviewees have any questions before getting started with the interview.

All attempts were made to remain as neutral as possible without showing strong emotional reactions to responses. The interviewer ensured that there was no distraction of the interviewee and had transitions between major topics, to maintain control of the interview.

The interview schedule (Appendix G) was developed. An expert in the field of research was given the document to review, and only after her perusal and comments were the interview questions asked. The interview questions were then pre- tested prior to the research with a group of persons outside the sample (Kvale, 2007). The pilot test was used to determine the effectiveness of the instrument to elicit the thick rich information that will be needed to get insight into why the trainees opted to drop out of their programs

The pilot also allowed the researcher to establish if the interview schedule was clear, understandable and capable of providing answers to the research questions, and if, therefore, any changes had to be made to the interview schedule. After slight modifications to the structure of some questions, the interview instrument was found to be acceptable.

To achieve the objective of the study, it was important for the questions to be organized in a fashion that allowed for an orderly and natural interview session in a reasonable timeframe. The timeframe for an interview was between 40 and 45 minutes.

The qualitative questionnaire guide explored the following research questions

1. What factors influence a trainee to drop out of a TVET program in Trinidad prior to completion and certification?

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2. How do institutional variables contribute to trainee attrition?
3. How do the local factors relate to the existing theories of attrition?

The duration of the entire study will be six months. The semi- structured interviews consisted of several key questions on the subject of attrition. The semi- structured in-depth questions were able to provide the interviewer with the opportunity to digress in order to pursue an idea or response in more detail. Another justification for the semi-structured in-depth interviews was the flexibility of the approach, which allowed for the discovery or elaboration of information that was important for the study.

Ethics/The Research Protocol

The researcher adhered to the following protocol. The researcher requested in writing of the chief executive officer of the institution permission to access the reports, records and other information about the trainees who had dropped out. The letter included the rationale of the study, the benefits that will be derived from the study for the company and the promise of a bound copy for the organisation when the study was completed.

Marshall and Rossman (1989) remind researchers about the importance of practising all the ethical considerations when conducting qualitative research, while Merriam (1988) encourages researchers to respect the rights, needs, and values of the participants in their research studies. Besides seeking the permission of participants in writing to be a part of a research study, oral explanations as well as written ones should be afforded the prospective participants to avoid any embarrassment or inconvenience to anyone.

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The Interview Process

The purpose and procedure for the research was explained to each subject and the method of confidentiality use. Participants were also informed about the use of pseudonyms to ensure the protection of individuals' privacy. Once the research had been explained and concerns of participants addressed, the participants were asked to read and sign consent forms (Appendix 3)

As a new researcher, there were concerns about eliciting thick, rich descriptions of the participants' experiences in the Interview Process. However, once the interviews were started, participants spoke freely and the stories were told without inhibitions. They were open, and provided credible reasons for leaving the program and for how the institution may assist in the retention of trainees in the program.

The Interview Guide

The structured interview guide focused on Bio-data e.g. family, level of education of parents. Other areas of focus were: course attendance, academic performance, the family support, personal perceptions of the course, reasons for dropping out of the program, assistance from the institution.

Initial interview questions were formulated from the main research questions, the literature review and the researcher's experience as an educator. Strauss and Corbin (1998) state that easy concepts are used to guide initial interviews. However, some of the questions are discarded with the collection of real data from participants.

Seeking information can be challenging. However, the researcher tried to create the environment where participants felt at ease and free to discuss their problems. At times responses were manipulated to respond to the guide as stated by Yew (2005).

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After introductions, the participants were thanked for taking time out to be part of the research. The participants were also given a contact number in case they needed clarification on any matter.

Researcher Experiences

This researcher's concern about attrition was aroused because my position in the organization demanded that I have access to the attrition reports of the various centres. Exposure to the attrition reports stirred my interest in the perplexing phenomenon of attrition, especially after I saw the large number of trainees who enrolled to do TVET programs and the extremely small number that actually completed the program and graduated.

In the first year of a graduate program, this researcher was introduced to a module called Research Design where students were asked to think about some phenomenon that was worthy of investigation. I chose the topic of attrition to hone my problem solving skills and to challenge myself in a new way.

In January 2014 supervisors were assigned to groups of students as mentors for young researchers who had to write a research project. At this point, I learned that I needed to truly understand the research process and to gain in-depth knowledge of the topic before attempting to write the thesis. When I was asked to be among the first group of students to present the proposal for a thesis topic in January, I found it a challenging but stressful exercise. At first, I presented on attrition in colleges and universities. However, as I listened to the comments from the chair and other colleagues, I recognised that my research questions ought to be more closely related to TVET. I consulted with my advisor and the librarian, who directed me to sources of literature on the subject of attrition in TVET programs locally, regionally and globally. I began to review the

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literature and later sought and obtained permission from the administration at my organisation to conduct the research. Every Tuesday, from January until the month of April, I attended several seminars that dealt with the presentation of thesis proposals. This experience was rich because it provided me with a platform to know how to get information on the way to proceed with my study. Along the way I had to modify my research questions and my own perspective on dropouts as I continued to review the literature on attrition. I began to realise that there were many dimensions to the problem of attrition, and that some dimensions had been thoroughly researched (attrition in high school) and other dimensions had not been (attrition among adult students in technical vocational studies). My supervising mentor was particularly helpful when I purposed to research attrition in technical vocational studies among adult students since he was able to point me to studies in my area of interest and provide direction for the way I should proceed with the study. In the month of April, I identified prospective participants and called them to invite them to be a part of the study. I formulated interview questions, had them checked by a research expert and piloted the questions. Minor changes were made and the interview process took place. In May, I began the data analysis. I verified transcripts, interpreted and coded the data so that it could be analysed and presented. By the month of June, the first draft of the thesis was completed, edited by experts in the field, the suggested changes made and the study revised and prepared, for its eventual submission by the 30th of June.

Data Analysis

Qualitative research data analysis is an iterative process and its methods are deemed to be the best way to analyse the data collected because they facilitated the researcher's intention to provide depth and detail into the phenomenon of attrition to help guide the researcher to determine which categories of reasons appeared to be the important variables of attrition. This

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researcher used Hatch's (2002) method of analysing data. Hatch described the steps of a typological analysis as firstly by identifying specific themes that emerge out of the data based on the research questions, reading the data and marking entries related to those themes, reading the entries by typology, and recording the main ideas in entries on a summary sheet, looking for patterns, relationships, themes within the typologies, reading data, coding entries according patterns identified and keeping record of what entries go with which elements of the patterns identified, deciding if the patterns are supported by the data, and searching the data for non examples of the patterns, looking for relationships among the patterns identified, writing your patterns as one sentence generalizations, and selecting data excerpts that support your generalizations (Shaw, 2008). For the purpose of this research, the researcher used interviews. For this study the qualitative data were analysed after transcribing all interviews and coding them in two phases. Open-coding procedures were used in the data analysis to identify common themes like identifying, naming, categorizing, and describing phenomena (Glaser, 1992; Creswell and Miller, 2000; Strauss and Corbin, 1990). An axial coding, which is the process of relating codes (categories and properties to each other, via a combination of inductive and deductive thinking was also used in the analysis of this data (Glasser, 1992; Creswell and Miller, 2000; Strauss and Corbin, 1990). The three research questions guided the researcher in the study.

1. What factors influence a trainee to drop out of a TVET program in Trinidad prior to completion and certification?
2. How do institutional variables contribute to trainee attrition?
3. How do the local factors relate to the existing theories of attrition?

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Limitations

Creswell (2003) describes limitations as limiting factors inherent in a study that should be clarified and made explicit. Phenomenological research requires that the sample frame have the experience the researcher wishes to investigate. Furthermore, the participants must be able to think about the experience, reflect and describe the experience thoughtfully in detailed narratives. The researcher believes that the participants have those qualities but cannot guarantee that they do.

Another major limitation to studying student attrition is the difficulty in ascertaining the true reasons why a student discontinues a program. The researcher has little option but to believe that the participants are honest and forthright with their answers to the research question.

The researcher in qualitative research strives to have an in-depth understanding of the literature on attrition. To achieve the goal, given the short time frame for the completion of the study, was quite challenging. In spite of everything, the researcher had to ensure that there were no confounding variables that could negatively impact the analysis of data.

In terms of methodological limitations, it was difficult to get trainees to attend the interviews. After several calls to all the trainees, only ten of them kept their promise to attend. Therefore a small sample size was used and this could inherently affect the generalizability or transferability of the study (Eisner, 1991).

Delimitations of the Study

Among some of the delimitations in this study was the fact that only the full time centres were used so that the findings of this study may not hold true for trainees who attended part-time evening centres.

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The research study aimed to investigate the phenomenon of trainee attrition in TVET programs at three different full time centres. The trainees involved in the study were between the ages of eighteen and thirty-five. The sample was limited to a purposeful convenient sample as all the persons interviewed agreed to participate in the study. All the centres used in the study taught modularised courses that were popular with female trainees, therefore most of the persons involved in the study were females.

Summary

This chapter described the design to be used in the research study, including the survey instrument, a description of the participants, the procedure to be followed, the instruments used to provide reliability and validity to the study, the steps taken to observe the ethical considerations associated with the study, the strengths and limitations of the study, and the significance of the study for future research inter alia. The analysis of the data will be presented in Chapter Four.

Findings

The main purpose of this study was to explore the factors that contributed to attrition at the three full time centres in north and central Trinidad. This chapter provides a brief overview and profile of the ten trainees who served as the participants for this study, and outlines their perception of their experiences during their enrollment at the various centers they attended. The research study was guided by the following major research questions:

1. What factors influence a trainee to drop out of a TVET program in Trinidad prior to completion and certification?
2. How do institutional variables contribute to trainee attrition?
3. How do the local factors relate to existing theories of attrition?

In an attempt to answer these questions, the researcher conducted ten interviews with former trainees of the three TVET centres. Through analysis of the data, the researcher was able to gain insight into the various social, personal and institutional factors that influenced these trainees to leave the program. Four major themes emerged from the analysis:

- Family and Social Factors
- Financial Factors
- Institutional Factors
- Non Institutional Factors

Participant Profiles

The demographics of the participants were presented in (Table 1) and findings provided insight into their profiles (eg. age, gender, level of education and their home situation).

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The researcher then related that information to the findings of the research topic, attrition in TVET.

TABLE 1
PARTICIPANTS' INFORMATION

NO.	NAME	AGE	LEVEL OF EDUCATION	LEVEL OF EDUCATION OF MOTHER & FATHER	MARITAL STATUS	LIVING ARRANGEMENT
1.	June	19	Secondary	Primary	Single Mother	Mother
2.	Mary	25	Secondary	Primary	Single Mother	-
3.	Thomas	19	Incomplete Secondary	Primary	Single Mother	Common Law Husband
4.	Rosa	30	Secondary	Father deceased (Primary)	Widower	Mother
5.	Jenny	32	Secondary	Secondary/Secondary	Married/Separated	Mother
6.	Reena	18	Secondary	Primary/Secondary	Married	Husband
7.	Paula	25	Secondary	Primary/Primary	Single Mother	Single with child
8.	Peter	19	Primary Incomplete secondary	Primary/Primary	Single Mother	Mother
9.	Abi	28	Secondary	Primary/Primary	Married	Mother & Step Father
10.	Liliy	25	Primary	No Father/Mother	-	Sister, Boyfriend & 5 children

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In response to the first research question, “What factors influence a trainee to drop out of a TVET program in Trinidad prior to completion and certification?” the following accounts were given by the participants.

Lily’s response:

Lily has two children and lived with an extended family. She was in an abusive relationship and had to go to Tobago to escape the abuse. By the time she returned she had missed too many classes and had to withdraw. This is her account when asked the reason for leaving:

‘I was doing good in my class. I was working on my portfolio. Take a look at it. My children father was very jealous and did not want me to do the classes. I know if I complete I will get a job in the field. I always wanted to be a decorator and I was learning about colours. When I could not take it any more I went by some cousins in Tobago to cool off from the pressure. When I come back, my children father move out from the apartment where we was living with my sister and her boyfriend and three children. I went back to the center to see if I could continue but I miss too much classes and could not come back. I will try to sign up next time to do the course.’

Thomas’ response:

Thomas is a nineteen year old male who had dropped out of secondary school to learn a skill. He wanted to learn a skill because his father was a contractor and he could go to work with him.

‘I thought I could not learn because I was having problems in secondary school and I saw the advertisement in the papers and apply. The teacher of the class helped me a lot and I started to realize I could understand work. After about three months, my career tutor ask me if I want to

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complete secondary school because I was doing really good in the class. In my mind I could go back and do my exam. I had to tell my mother and she told me to do what I want. I went back to secondary school.'

In response to my prompt, "How did you perform in secondary school?" Thomas said, "I started good but then I follow the wrong company and was missing classes. I had problems with some fellas who wanted to fight me. I got fed up and did not want to end up in trouble so I left secondary school again." "I could not come back to the course because I had missed too many classes. I ain't finish secondary school and I ain't finish the course. I had to go and look for a job. I now work as a security guard."

Peter's response:

Peter is a nineteen-year-old male who did not complete secondary school.

'I was doing okay in the skill. I used to do the practical but I ent do the homework. I used to go and work after class finish at twelve. My mother was not working and I feel I had to help. The boss wanted me to work more hours, so I missed some classes and then I say this ent making sense and I leave to work full time.'" When I prompted him asking him if he would not have been better off completing the skill, he replied, "Yes, but I needed the money now to help my mother because my stepfather left and it was hard for her."

Rosa's response:

Rosa is a thirty-year-old female who has a primary school education. Rosa had successfully completed one skill course and was doing a second course.

'My father was very sick. I was doing the course patient care so that I can help my mother take care of my father. After about two months in the course, he got worse and it was hard for my mother alone to take care of him. We could not pay anyone to help when I was out. I

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missed some classes so I can help my mother with my father. He died not long after but I had missed too many classes and could not return”. In response to my prompt, “How are you feeling now?” Rosa answered, “I still miss him. It is harder for us now. I have to try to get a job so I can help my mother.”

I extended condolences and asked if she was capable of answering any more questions and she replied that she could.

June’s response:

June is nineteen years old and lives with her mother, father and brother. She attended secondary school and obtained two ordinary level subjects. She completed a food course before. She enrolled for a second course, events management, because she had time. She did not know much about the course but enrolled because the center manager needed persons to fill that particular course.

‘My mother lost her job. My father has a gambling problem. My brother used to help with the food but he lose his job also. I had to put out a lot of money to do group work and projects. My mother used to give me money to travel but when she lost her job it was hard. I had to make a choice: stay and do the course or get a job and help out. My aunt was cooking food to sell to workers in the factories and asked me to help her as I do the cookery course. I had to find a job to help my mother who was very good to me while I was in school.’

Jenny’s response:

Jenny is thirty-three years old and has one child. She has three passes at CXC. She lives with her mother who is an accountant but her father does not live at home.

“I had serious problems. I nearly finish the course and was doing well. Then my little girl father told me he was HIV positive. I had serious problems in class. I could not concentrate. I

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had to get a test for my baby and I. The test came back negative so I feel a little better now. He was only crying but I don't want to see him. I feel sorry for him but I have to stay away from him. On top of that, we have real problems at home with my father. He is a piper and selling out all my mother things." To my question, "Why did you leave?" She replied, "The tutor did not know how to speak to us. She told us she did not care and she learn already. I drop out of the career class because I could not take that teacher attitude. I was still going to the skill class but my skill tutor told me I would not get a certificate if I did not complete the career hours. With the child father problem, the career tutor attitude and no certificate, I drop out."

Reena's response:

Reena is eighteen years old and attended secondary school. Her parents are married and have primary school education. She was very timid and did not express herself fully. She had to be given various prompts in order to get her story.

"I was doing hair and make-up. I wanted to open my own business but then I got sick." I asked if she could tell me what was wrong. She answered, "I was pregnant and my mother and father make me marry. The baby is now three weeks old and my husband does not want me to come to any class. I want to do a child care course and open a nursery now at home."

Paula's response:

Paula is a thirty-three year old female who lives with her son. She attended the classes for three weeks and had to leave.

"I got a job and had to leave the course because I had to pay the babysitter. The child father is not giving support so it was difficult. With the job, I can now pay the babysitter." I asked her if she would have a better paying job if she learned a skill. She replied, "Yes, but I needed money to pay my rent and babysitter. I did not get any support so I had to leave."

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Abi's response:

Abi lives with her brother and mother who is separated from her father. She is twenty-eight years old and has six ordinary level subjects. Her mother has since remarried to her stepfather who does not work.

“My mother was under great stress. There was a lot of quarrelling in the home and it was very uncomfortable. Seeing that I have six subjects, I applied for a job and was called to do a two year on the job training contract. This was much more than the stipend so I left. I will still continue my studies because I want to be a nurse. The job will help me to save some money and assist my mother in the home.”

Mary's response:

Mary is a twenty-five year old who lives with a common-law husband. She has five ordinary level subjects. Her common law husband works in a factory and she stays at home with the three children. Her last child is two years old.

“I did a course in hairdressing before at another training centre. I wanted to learn more about the course so I enrolled in it. I have some good skills and was doing very well when I get pregnant with my third child. I continued coming for a while but I used to be ill and could not cope with the travel and having to care of the other children. My husband told me to stay home and see about the other children instead of going to complete the course.” When I asked her whether she knew that she could be certified at that workforce assessment centre at that very location because she had the skills, she answered, “No.” I advised her to inquire at the workforce assessment centre to learn how she can become certified.

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To obtain answers for the second research question, the researcher asked the following five questions (See Appendix G).

The second research question was:

2. How do institutional variables contribute to trainee attrition?

June and Abi indicated that they had to spend too much money on the course to do projects. The stipend was late so it was a problem financially for them. June and Thomas also indicated that they got too many notes and that they wanted to do more practicals. June said that she learned better when she did practicals but did not realize that she would have to put out the amount of money that she had to in order to do it. The institution lacked the support that June and Abi needed when they realised that they could no longer afford the costs incurred to do the projects associated with the course for which they were enrolled. TVET institutions that desire to fulfil their vision and mission must go beyond enrolling students for a particular course and accept the responsibility of providing the mechanisms to assist with student retention at the TVET centres. The institution must demonstrate greater concern for the process of learning so that trainees who have started courses even if they find themselves in some kind of difficulty can access the institution's resources to inform them of their difficulty and hopefully get some measure of relief. In addition tutors should always demonstrate respectful and helpful attitudes to their trainees and be able to gauge if their teaching style (amount of notes they gave to students) or attitude (verbal or non-verbal) was contributing to student attrition or retention. The setting for the study, the participants and the researcher's instrument served to provide the stories, insights and reflections that highlighted the importance of the students' voices in a study on student attrition. An appropriate response to the trainees' voices can bring countless benefits to the trainees and the country because student retention and

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certification can be increased. The certified persons can then be a part of the country's workforce that is prepared to earn a decent wage and move seamlessly into other levels of education (Sandelowski, 1990).

The centres have policies that require a minimum attendance at classes as a prerequisite for certification. From the students' stories it is clear that absenteeism was really a symptom of a larger problem. When the institution forces a trainee out in such circumstances, the trainee is made to suffer twice because there are pressing circumstances keeping them out of school and they are made to suffer consequences because they were absent. Institutions that are committed to increasing the human capital and being true to their vision and mission should closely monitor the attendance so that they can make the appropriate intervention when they recognise that, given the attendance records, student may be at risk of dropping out of school. The institution has to operate beyond the Mathematics of number of sessions absent, no certification, to number of sessions absent, the office begins to sense or suspect that a trainee must be at risk and be ready to intervene to save the trainee and the institution of the scourge of student attrition.

Jenny had problems with her tutor and Jenny and Mary did not get along with the other trainees. Rosa did not understand the work and felt that she had too much homework.

When asked the question, "What can the company do to prevent the trainees from leaving?" the ex-trainees replied that the company should provide:

- i. baby-sitting facilities at a nominal fee
- ii. more practical exercises and fewer theory sessions
- iii. opportunities for on the job training
- iv. orientation for prospective trainees enrolled to do a particular course

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Reena, Paula, Abi and Thomas had no problems with the institution but found themselves overwhelmed by the circumstances of their personal, social or financial life. Caring institutions that are aware of the circumstances that can easily overwhelm students must be proactive rather than reactive with the measures that can serve to insulate students from the dropping out of school before being certified.

Research question 3: “How do the local factors relate to existing theories of attrition?”

No single theory of student attrition can justly account for every conceivable reason that every single departing student has for leaving higher education or a TVET program, and an examination of the reasons given by students for leaving the TVET program vindicates the assertion.

Bean and Metzner’s (1985) model of student attrition was specifically directed at the non-traditional students enrolled in institutions of higher learning and spoke to student attrition. Bean Metzner hypothesized that non-traditional students’ dropout decisions were based on four sets of variables: academic, background, psychological and environmental. For Bean and Metzner, academic variables referred to study habits, academic advising, absenteeism, major certainty and course availability.

There was insufficient evidence of academic advising, significant evidence of absenteeism and course availability as reasons for student attrition at the TVET centres. Lily, Peter, and Rosa had missed numerous classes and left on their own. Jenny, on the other hand, was forced out and not allowed to return to complete her course because of the institution’s stipulation that a trainee could not be absent for eight consecutive sessions or failed to satisfy the minimum number of hours required for certification. Jenny would not have been certified

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because she did not get along well with the career enhancement tutor and had missed so many sessions in that class that she could not satisfy the minimum period of time needed for certification.

Bean and Metzner identify environmental variables as another major factor that affects attrition/retention in institutions of higher learning. This study revealed that environmental variables like finances, hours of employment, outside encouragement, family responsibilities and opportunities to transfer were responsible for attrition in the cases of Peter, June and Abi. Peter went to work to help his mother and the younger siblings, while June who already had some skills in food went to work with her aunt to provide financial assistance to her mother. Although her mother wanted her to persist with her studies, Abi left voluntarily to assist her mother when her mother broke off her relationship with Abi's stepfather.

Bean and Metzner, in their model of student attrition, also identified the role of psychological variables like stress, utility, satisfaction and goal commitment. Jenny's stress over the HIV positive status of her child's father and the drug addiction of her father, and Rosa's stress over her father's illness and eventual death contributed to their dropping out of the TVET program. Thomas, on the other hand, on realizing that he could learn, sought to improve himself by returning to do his CXC subjects and dropped out of the TVET program.

Tinto's (1975) theory postulated that students entered university with a set of background characteristics, individual attributes, and prior learning experiences that either singly or in combination, predispose them to either persist or dropout of their study programs. He defined background characteristics as family social status, parental formal education and even parental expectations. In this study on attrition in TVET programs, it became quite evident that the poor financial and social status of families as well as the level of education of parents did influence

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negatively, student persistence in the TVET program. It was also evident from the study that there were no mechanisms in place to foster and encourage student integration at the centres, and true to his model, in the absence of those mechanisms, attrition did take place among the students pursuing TVET studies at the three centres.

There is ample evidence in this study to vindicate the Garnier et al (2001) Poor Family Socialization Theory, the Academic Mediation Theory of Garnier et al (1997), and the findings of Janosz et al (1997), that poor academic performance combined with anti-social affiliations, personal deviance, family socialization and structural strains (Rumberger's Structural Strain Theory) have consistently been strong predictors of dropping out from school. While this study did not reveal any instances of personal deviance, all the other characteristics could have been found to be influential causes of attrition.

Chapter 5 Discussion and Recommendation

The final chapter of the study reprises the findings of the study, and makes recommendations for policy and practice and future research. The findings addressed the three research questions and linked them to the literature review on the value of students'/trainees' narratives in an investigation into the causes of trainee attrition in TVET. This study also links the literature on student attrition in post-secondary institutions, because of the scarcity of literature on attrition in TVET, to support its findings. The study concludes with recommendations for the policy and practice in TVET, and the identification of topics for future research.

Findings

From the analysis of the data, it was evident that four themes: financial, personal, social and institutional factors were major contributors to student attrition in TVET. To a lesser extent the theme of student trajectories also played a part in student attrition. The findings from this study corroborated the theories of Tinto (1975, 1987) and Bean and Metzner (1985) on student attrition. The findings also validated the claims that student narratives could be as helpful and informative as the epistemological or theoretical ground upon which a study is based (Connelly and Clandinin, 1990; Sandelowski, 1990; Dorn, 1993; Smyth and Hattam, 2002). The students' narratives did not only reveal why they dropped out of the TVET program but they also provided invaluable insight into the reasons underlying their decisions to drop out (Connelly and Clandinin, 1990). For example, the reasons given by the trainees for dropping out can be found among the factors identified to cause attrition in the Bean and Metzner's, and the Tinto model of student attrition in particular as well as with those factors given by other models that seek to identify factors and predictors of student attrition.

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Several trainees (June, Peter, Pamela, Abi, Rosa) did not complete their TVET program because of financial problems. They all left voluntarily either to render assistance to a breadwinner or to satisfy the demands of their own financial situation. A reassessment of the quantum of the stipend given to trainees as well as a monitoring of their financial situation throughout their period of training can help to encourage persistence in the TVET program. In addition, administrators need to have positive expectations for their trainees and not assume that trainees are absent because they are indifferent about acquiring the skill training. From the narratives, the trainees were absent because of the very difficult circumstances in which they found themselves and were forced out because of the institution's requirement of having a prescribed minimum attendance.

Some former trainees had personal problems that led to their dropping out. Caring for a sick father (Rosa's case), domestic violence (Lily's case), pregnancy and illness with no spousal support (Mary's case) and the stress caused when someone has a young baby and learns that one's spouse is HIV positive (Jenny's case) illustrate the point. The provision of counseling and day-care facilities at a nominal fee for trainees is the investment needed if one is serious about increasing persistence in TVET programs. Tinto had spoken about the need to provide mechanisms for students at colleges (residence hall associations, student guilds, extracurricular programs and faculty lectures) to become integrated into the institution to encourage persistence. Attention should now be paid to the mechanisms that are needed for trainees in TVET programs to persist.

Reena, the victim of a forced marriage whose husband insisted that she stayed at home to attend to their young child, and June, in whose family the breadwinners lost their jobs and in whose house a gambling father lived, found themselves in difficult social associations that led to

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their dropping out of the TVET program. Friendly monitoring of the trainees' social situation is necessary so that the social status of the family from which the trainee comes is not allowed to jeopardize the trainees' desire to persist in studies in TVET. Institutions must be mindful of the external commitments of trainees and the demographics and social status from which the trainees come if they hope to increase retention of the trainees enrolled to do TVET programs in them.

Institutional failure was responsible for Jenny's, Thomas', June's, Abi's and Mary's decision to abandon the TVET program. Jenny's complaint about the tutor's attitude in the TVET program, Thomas's exposure to bullying at the secondary school, and the institution's failure to provide June with a proper orientation of what her course entailed as well as to advise Abi that she could have been assessed at the Workforce Assessment Centre before she entered the workforce are all examples of institutional factors that contributed to attrition. Kuboni (2012) has spoken about the need for the continuous training and monitoring of TVET staff so that staff will be exposed to best concepts of andragogy, for improved attitudes and approaches to delivering the curriculum and increased knowledge about the ideal physical environment to maximize output, increase retention and improve trainee outcomes in TVET.

Taking heed to the role of student trajectories on attrition as seen in Thomas' case, the question of the negative perception of TVET surfaces. Thomas, on recognizing that he could learn, opted to drop out of the TVET program, not because of any particular difficulty in which he found himself in the program, but because he actually believed that he was endeavoring to make an improvement in his career path if he exited it. If Thomas believed that TVET was for persons who could not 'learn', and that because he recognized that he could learn he no longer belonged in TVET, then a committed and sustained effort must be undertaken to correct that flawed but widely held perception.

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An examination of the reasons the participants gave for dropping out of the TVET programs reveals the reasons given by the former trainees corresponded to those found in the Bean and Metzner's (1985) model of student attrition. That model spoke of students' predisposition to dropout because of environmental, background, academic, and psychological variables. Environmental variables, according to Bean and Metzner, refer to family responsibilities, outside encouragement, financial status. Academic variables included student advising and absenteeism while psychological variables referred to stress, utility and satisfaction. The reasons given by former trainees for their decision to drop out of the TVET program fit perfectly with those given for student attrition in the Bean and Metzner model.

Also, correspondence was found with the reasons given in the students' narratives and the factors identified in the Tinto Student Integration Model (1975, 1987) that spoke of the voluntary decision of students to dropout because of personal, social and financial problems.

Lauglo (2006) recommends that industries should become more involved in training along the lines of the German dual system of education where one's education is complete when one has been trained and assessed in the theoretical and practical side of one's skill. Having students do internships in industries can do a lot to improve the quality of the workforce and help to provide a seamless transition from training to the world of work. Careful consideration must be given to the incentives needed to give to industries to have them become willing partners in TVET.

The perception that pursuing TVET programs is less prestigious than pursuing academic programs must change (Corrigan, 2013). Accordingly, TVET programs must be properly planned, outlined and executed to encourage a wider range of trainees in the cohort than what

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currently exists. Aggressive marketing of TVET is also necessary and avenues must be provided to encourage the relating of the success stories of persons involved in TVET and the general promotion of TVET via consistent media campaigns or the hosting of seminars that highlight the importance of TVET at special fora for TVET at least twice a year to counter the negative psyche about pursuing TVET. No one should feel that he/she had to abandon a career in TVET if he/she hoped to have a successful career. Effecting a change in trainee attitude and implementing strategies to infuse them with pride and a lifting of their self-esteem another major recommendation that can encourage persistence in TVET.

Future research in TVET can be directed in the areas of how adequate is the support (stipend, tools, equipment, consumables) provided to help in the retention of trainees in TVET programs. In addition, although there is a scarcity of literature in TVET, studies ought now to be done to identify clearly the variables that increase retention in TVET. In conclusion, this researcher believes that longitudinal qualitative studies with administrators, tutors, trainees, spouses and parents of trainees, even in focus groups, should be undertaken to research student retention in TVET. Such studies can undoubtedly make an invaluable contribution to the current efforts to promote TVET in Trinidad and Tobago.

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Appendix A**A Phone call**

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APPENDIX A Phone call

Hello, (student's name). I am Florence Pierre, I a student of the University of the West Indies (UWI). I need your assistance. I am currently working on a study on attrition where I would like to tell the stories of trainees who dropped out of the programme. I am hoping you will be willing to be part of the project.

The interviews will be held on a date convenient to you so let me know if this date is alright. I will call you one day before the scheduled interview to remind you of the meeting.

I want you to know that everything you say will be treated with the strictest confidence. You can withdraw at any time during the interview if you feel uncomfortable.

Do you have any questions? Would you be willing to participate? Do you have transport?

Thank you so much. I truly appreciate your participation.

Appendix B

Reminder Phone Call To Rprospective Participants Of The Study

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Appendix B**Reminder Phone Call to Perspective Participants of the Study**

This call was made the day before the school meeting:

Hello

My name is _____. I am a student of the UWI in TVET and Workforce development.

This call is to remind you we have we are scheduled to meet tomorrow. Is tomorrow at <Time>
still convenient for your interview.

If yes,

Thank you for your time.

If no,

I am sorry that we won't be able to meet tomorrow. What is convenient date to reschedule?

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When date is provided.

Thank you for I have made the adjustment for your Reschedule Date.

Appendix C

Biographical Information

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Appendix C**Biographical Information**

Name: _____

Address: _____

Telephone Number: _____

Birth of Date: _____

Number of Children in Family: _____

Position in Family Origin: _____

Occupation of Father: _____

Occupation of Mother: _____

Level of Education: _____

Level of Education Attained (Father): _____

Level of Education Attained (Mother): _____

Marital Status of Parents: _____

Appendix D

Organization Consent Form

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Appendix D**Organization Consent Form**

By signing below, I am giving permission to **Florence Pierre** to contact the trainees of the organization. To request any data from Research Department that will be of value to the study.

Name of the Organization

Signature

Date

Appendix E

Participant Consent Form

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Appendix E**Participant Consent Form**

Researcher:

Florence Pierre
22 Sapphire Drive
Crown Street,

Tacarigua

Email: oxpot@hotmail.com

Telephone No: 768-2073

Purpose of the research Study research study is to find out the reasons why trainees drop out of the Skills Training Programme at centre.

Potential Risk

This project will pose no risk to participants. If you wish to discuss these or any other discomforts you may experience, you can call the Researcher at – 768-2073.

Benefits

There is no direct benefit to you as a participants, if you participate you are free to decline or respond to any question or withdraw from the interview at any time.

Protection of Confidentiality

Records of the study will be kept private. When the study is completed the reports will not include information that make it possible to identify any subject/participants. Documents will be destroyed once the study has been accepted and approved.

Signature

Consent to Participate

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I will seek to clarify any information that you require clarification.

I have read the above information I have asked question and have received answers satisfy me.

Signature of Participant

Name of Participant (Blocked)

Date

I consent of participate in the study and have my interview recorded.

Signature of Participate

Name of Participant (Blocked)

Date

Appendix F

Interview Protocol

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Appendix F

Interview Protocol

PRE INTERVIEW CHECKLIST

- | | | |
|---|--|--|
| ☐ Purpose of Study | ☐ Confidentiality | ☐ Length of Interview |
| ☐ Review of Consent form | ☐ Signature of Consent Form | |

Possible Introductory Questions (Intended to build a rapport with participants.

1. Tell me what made you decide to choose to do a Skill Course?

Post Interview Checklist:

- | | | |
|------------------------------------|--|--|
| ☐ Questions | ☐ Thank Participant | ☐ Confidentiality |
|------------------------------------|--|--|

Appendix G

Interview Questions

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Appendix G**Interview Questions****Course Attendance:**

1. Tell me what drew you to register for the course? In other words, why were you attracted to attend this course?

2. Tell me about the course that you were doing?

3. What did you liked about attending the course?

4. What were your experience like during your stay at the centre.? Give me some positive negative example?

4. Tell me what you disliked about attending the course?

5. Did you tell your tutor that you wanted to leave the course?

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Academic performance:

1. How were you performing when you deciding to leave?

2. How did your parents/spouse react when you told them you were dropping out?

3. What support did you get from your tutor when you decided to leave the course?

4. What is your strength? Were you able to get counselling?

5. Could the company have done anything to keep you attending the course?

The Family:

1. Who are the members of your family? Do any members of your extended family live your house?

2. Do you discuss your problems with your family? If yes, with which member of your family do you feel most comfortable to discuss your problems?

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3. How did your family give after you dropped out the course?

4. What advice did your family give after you dropped out the course?

5. How did you discuss the problem with any of your classmates?

Performance Perceptions:

1. What plans do you have to participate in further training?

2. How do you feel now about your decision to leave the course?

3. How could this affect your earnings level throughout life?

4. What future plans do you have for attend an educational programme or course?

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5. Did the course you were doing prepare you for employment?

6. If you had the opportunity to “do things over”, would you come to the same decision or would you continue with your schooling?

7. Describe your feelings after dropping out of the course?

8. Could you give some suggestion as to what could be done to encourage trainees to remain and graduate?
