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# **Challenges Affecting Technical Vocational Education and Training in Trinidad and Tobago: Stakeholders' Perspective**

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Abstract: The paper focused on the challenges impacting Technical Vocational Education and Training (TVET) within Trinidad and Tobago (T&T). The study highlighted issues plaguing TVET, with insights emanated from stakeholders within TVET institutions. The challenges that presented itself showed TVET in T&T faces copious amount of problems. Stigma, Attrition, and Quality teaching were some of the key problems affecting TVET in T&T. The researcher utilised a qualitative approach to gather data from stakeholders within the institutions. The data was put forward by way of a thematic analysis approach. Focus groups and interviews were used to extract many details that gave the study deep and rich insights on TVET and the challenges emanating at present. Two main themes emerged from the data: challenges and resources. These two areas were further broken down into sub themes. The study also showed that TVET institutions are incapable of treating with some of the issues they faced, and it requires intervention from the central government to address the macro problems that plagued TVET. The research focused on four TVET institutions that are tertiary level institutions of learning. Additionally, the study showed very persuasively that TVET is experiencing a number of significant challenges in T&T. The issues that face the institutions are very complex and which they may not be able to address in a significant way. These challenges require intervention from the governmental level, these matters require the right and adequate leadership as a very important factor in moving TVET forward.

Keywords: Attrition, stigma, TVET Institutions, resources, regulation

# 1. Introduction

According to Mends-Brew and Dadzie (2016) education is a vital vehicle for any civilisation, socio-economic advancement. Technical Vocational Education and Training (TVET) should be an ideal education platform that will bring socio-economic development. TVET was perceived to have a profoundly influential purpose in providing the vital human capital required by commerce (Anderson 2009). Human capital concept has been the leading methodology embraced by global monetary organizations such as the World Bank, the International Monetary Fund (IMF), and the International Labour Organization (ILO) and by national governments, tough human capital theory has changed in form and accent over time (Anderson 2009). Consequently, we can see the relevance and importance of TVET and with this back ground in mind the researchers will explore the subject of TVET, analysis and examine TVET in Trinidad and Tobago (T&T). According to Beardwell, Holden and Claydon (2004) the need for a skilled and educated workforce is vital for effective functioning of the economy and for the competitiveness and by and large the wellbeing of society. Tyson and Fell (1995) put forward the idea that the future will see more of a skill based organization in our world of work. In order for a country to achieve the required skills the government must establish TVET systems and policies that would aid in the acquisition of these skills (Beardwell, Holden and Claydon 2004).

United Nations Educational Scientific and Cultural Organisation (UNESCO) (2014) defined TVET as "those aspects of the educational process involving, in addition to general education, the study of technologies and related sciences and the acquisition of practical skills, attitudes, understanding and knowledge relating to occupation in various sectors of economic life". UNESCO (2014) further articulated that TVET is more than furnishing persons with vocational

competencies. However, TVET also focuses on knowledge, skill and attitudes which would provide meaningful contribution towards holistic development of individuals. Due to the great amount of unemployment within the developing world especially within the 15-30 year olds TVET can play a very integral role in facing this dilemma (Aring 2011). Mends-Brew and Dadzie (2016) shared a noble contribution favouring TVET, in which the authors stated that TVET seeks to furnish graduates with practical knowledge and skills which are mandatory for the world of work. This contribution reveals a very important role TVET plays, TVET is important and vital for the development of a nation. Hence, it is very important for governments and policy makers to see TVET as an arsenal that can combat unemployment, underemployment and the many social ills that will confront their societies. Wolf and Erdle (2009) articulated a very insightful opinion by stating that TVET and sustainable economic growth are inter-reliant. This argument by the authors provides a very positive narrative for TVET. However, this inter-dependence can only take place when the right and adequate systems are in place that will put TVET on a robust platform, that will see TVET achieving tremendous advantages. The researchers' intentions are to examine the challenges surrounding TVET within the republic of T&T. However, if T&T TVET system is not geared towards sustainable economic development, and do not have the right machinery that will allow the nation to benefit, from what was shared previously (as mentioned above) by the various scholars and gurus on TVET, T&T will not gain the benefits put forward (as mentioned above).

#### **1.1 A Glance at TVET Institutions**

The study focuses on TVET institutions under the Ministry of Education Tertiary Division in Trinidad and Tobago (T&T) which are skills orientated and fits the UNESCO definition of TVET. The schools include: Institution 1, Institution 2, Institution 4. Also focus is placed on the Institution 3 which is a school based in the country sister isle, to gain a Tobago perspective as well. The four schools which are major players of skills training and institutions of learning within T&T which the research focuses on are Institution 1, Institution 2, Institution 3 and Institution 4. The institutions of learning were selected due to the high level of TVET training that they offer and the institutions are known for their competencies in the area of TVET. A point to note there was a need by administrators to address the needs of Singaporeans that fall under 25% who were less academically-inclined (Seng 2011). Singapore formed Institute of Technical Education (ITE) to generate other pathways, choices and diversity to the robustness of the Singapore education system (Seng 2011). This brought tremendous benefit and success to their educational system (Seng 2011). Considering the principles outlined by Seng (2011), there is a great role for TVET institutions to fulfil, in T&T especially in the area of human resource development. The schools were chosen since they are tertiary level institutions that possess the expertise, experience and skills sets needed to train students to meet high industry demands. These institutions have a great wealth of experience producing successful graduates with high technical competence. Thus, if they meet these criterion, their graduates should have the where withal to enter the world of work and bring about development to T&T. Bearing in mind all that were shared regarding the paramount role TVET can play, the intentions of the researchers are to examine if and how these realties that TVET brings can really take place within T&T.

The purpose of this study was to investigate the challenges that confront TVET in T&T, also, to ascertain what affects stakeholders within TVET institutions. Two research questions served to focus this investigation:

- i) What are the challenges that confront TVET in T&T?
- ii) How can the challenges influence the viability of TVET in T&T?

#### 2. Research Methodology

The research design was described by Vogt (1993) as the skill of arranging procedures for administering studies so as to get the most valid findings. Robson (2002) highlighted that exploratory studies are treasured means of unearthing what is occurring and seeking new insights. This was extremely important for this research, since this study sought to explore issues and matters involving TVET in T&T. Robson (2002) also stated that descriptive studies purpose is to highlight a truthful synopsis of individuals, events or situations. This study sought to provide meaningful and truthful data regarding the challenges plaguing TVET in the nation of T&T. Utilising descriptive studies was of great significance to the study. The research took the form of a phenomenological approach to the research design, which is also known as qualitative approach to research, which was endorsed Collis and Hussey (2003). This was done to draw opinions, insights, and experiences from individuals.

#### 2.1 Sampling

Purposive sampling is a method where the investigators are able to focus and where practical minimise their sample size in a non-random manner where it is possible to illuminate and test the hypothesis (Sage Publications 2003). The researchers utilised this approach to gather data from the TVET institutions; mainly from the TVET stakeholders who operate in the T&T TVET education system and 1 TVET administrator who manages the umbrella body of TVET in T&T. Overall eleven (11) focus groups and fourteen (14) interviews were carried to generate data for this study. Utilising this method provided the research with a principal focus where the researchers were able to select specific cases that provided the most beneficial information for the questions under study (Sage Publications 2003).

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# 2.2 Participants of the study

Table 1 provides a summary of the participants of the study.

Table 1 – Interviews conducted					
Organisation	Interviews	Number of interviews	Focus groups	Number of focus groups	Locations
Regulatory Agency	Senior Executive	1	None	0	Chaguanas
Institution 1	Centre Coordinators	3	Instructors	5	Chaguanas, Point Lisas, St Madegeline & Tobago
Institution 2	Centre Managers	4	Instructors	4	Diego Martin, Macoya, Penal, San Fernando & Tobago
Institution 3	Academic Dean	1	Instructors	1	Tobago
Institution 4	Centre Managers &Technical Supervisor	5	Curriculum Specialist, Programme Coordinators and Instructor	1	Chaguanas, Diego Martin, Valencia, San Fernando, Tobago

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#### 2.3 Instrumentation

According to Salkind (2010) Instrumentation refers to the apparatuses or means by which researchers endeavour to assess variables of interest in the process of collecting data. Instrumentation not only focuses on the building, designing, and assessing of the instrument but also emphasis is placed on the conditions under which the designated instruments are administered Salkind (2010). The researchers would have utilised standardised, open-ended questions for all interviews and focus groups. The focus group comprised of instructors and TVET professionals from the various TVET institutions. The interviews were done with a senior executive, centre coordinators, an academic dean, and technical supervisors from the four institutions. These questions were designed to gain insight into the issues and challenges that affected TVET within T&T.

#### 2.4 Procedure of data collection

In order to collect data a qualitative semi-structured interviewing technique was used. This method is a very flexible and helpful form of data collection and it is particularly useful in discussing the experiences and perspectives of the participants (Crano & Brewer, 2002; Sarantakos, 2005). A structured protocol was adopted for the 25 interviews which were taped and transcribed verbatim. The interviews lasted approximately 30 minutes, following which participants were given the chance to substantiate information generated during the interview sessions. The focus groups allowed for lucid discussion and interactive dialogue relating to the various questions posse to the group. One way to confirm validity in qualitative research is by member checking or respondent validation (Lincoln and Guba 1985). This was carried out by the researcher when conducting interviews and focus groups.

Saunders et al (2003) alluded that the utilisation of interviews can aid the researcher in gathering cogent and dependable data that would be pertinent to the research questions and objectives. This was extremely beneficial to this study since many questions had to be answered in order to address issues involving the issues affecting TVET within T&T. The interviews and focus groups were done in a semi-structured format. The researcher had a list of guided questions to steer the process of interviews. This method of research was very insightful as the researchers were able to generate a wealth of data that provided deep understandings and revelations involving TVET. The data was able to answer many questions and provided a great amount of invaluable research involving TVET in T&T.

Additionally, in the focus groups the interviewees responded to the questions posed to them and provided great details in most cases and their colleagues responded by expounding and affirming what the other said. Conducting interviews with the administrators from TVET institutions were done one on one, which provided opportunity for

interaction and answers to the many questions asked. The interviews and focus groups were carried out in a face-face manner. The individuals that were interviewed was done at their places of work, this was done in order for the researcher to take advantage of the comfortable environment. The interviews and focus group provided a wealth of data that proved very useful to the research. The focus group comprised of instructors and TVET professionals from the various TVET institutions. The interviews were done with: academic dean; centre coordinators, technical supervisors from the diverse institutions also one interview was done with the senior executive from T&T TVET regulatory body.

## 2.5 Data Analysis

Thematic analysis was stated by Bryman (2012) as a typical approach in analysing qualitative data. Bryman (2012) mentioned also that themes usually incorporate repetitions, or recurring topics in the data. This method was carried out to analysis the data, which was endorsed by (Yin, 2003) as a means of analysing the data by examining, categorizing, and tabulating the evidence. This addresses the two research questions of the study.

# 3.0 Results

Two main themes emerged from the information gathered from the participants of the study:

- i) Challenges
- ii) Resources

# 3.1 Challenges

This study was beneficial to unearthed a number of issues that are plaguing TVET institutions. The two main areas of focused were challenges and resources, which were two main findings gathered from the data, they were classified as themes. These themes were further broken down into sub themes. They provided many answers from the qualitative data which prove to be very beneficial to this study namely:

- Attrition
- Lack of industrial training
- Lack of regulation in TVET
- Management of TVET
- Teaching
- Stigma
- Quality of trainees

Attrition and the quality of trainees were two major problems mentioned by many stakeholders from the various institutions.

Instructor response (focus group interview): "So then you have a high failure rate and the fact you will have a high attrition rate as well because people drop out because they just can't cope so it's a whole chain system in alignment with that."

Instructor response (focus group interview): "Some of the candidates that enter the system they're lacking and I would say that it is a chain effect because they are lacking from the Secondary School system so the Secondary School system plays a part in terms of TVET because that is the clientele that we would get coming from the Secondary School system".

Another problem that TVET institutions are faced with is a lack of adequate training both theoretically and hands on. There was an absence of industrial training within the ranks of TVET institutions. Also, the quality of teaching due to the lack of standardisation. Please read some of the comments from the stakeholders within the schools:

Instructor response (focus group interview): "I try to explain to them is that they should go out into the industry, work in a hotel, work in a restaurant, because the knowledge and the skill you will earn from actually working and the experience you will get form working in a restaurant or a hotel or whatever is priceless."

Instructor response (focus group interview): "Whatever you're teaching you're not sure how deep you should go so you have to know what depths you have to go, to the level.

What will be the acceptable standard for this level so that you know ...okay if it's a diploma or whatever it is, you're going to this point and then what constitutes a higher level would be up to this point, and what constitutes a Master's level would be up to that point so there needs to be this clear defining mark as to what depth is required for what level of TVET level 1, level 2, level 3, level 4 right so it has to be clear the curriculum has to be clear in each subject area".

These statements highlight a major problem. If there is an absence of proper and adequate skills training, how then can students be competent and skilled? In order to be skilled the students should be exposed to a high degree of practical hands on training that way they will be able to meet the challenges of the  $21^{st}$  century. Two other areas that seem to

plague TVET were regulation of TVET and Management. These two areas had a lot of challenges. From the data gathered. One would come to understand that TVET in T&T faced a tonne of problems.

Instructor response (focus group interview): "The school needs vision so any political party that comes into power would now we have a vision, we have a plan and policies in place that we have a direction that we have a plan we know 20 years down the road we want to be there."

Centre Manager response (individual interview): "Institution 4 is affected a lot by elections okay the politics, ok a Minister comes in "this is where I see Institution 4 then he loses or the Prime Minister influence another one and he comes in "this is where I see Institution 4. So the mandate keeps changing based on what the Minister who is in charge of it".

Senior executive response (individual interview): "We have come up with a draft bill and it has been around for a while now but that is as far as it has reached and I believe that in the absence of that legal authority that's one of the challenges. We are responsible for coordinating and regulating, quality assuring TVET institutions but they are not mandated to come to us so that makes our job very difficult. That makes it even more difficult to rationalize the TVET system in Trinidad and Tobago. As opposed to with the tertiary level institutions, and the accreditation counsel, the accreditation counsel would have been established via an Act and therefore they have the legal authority to tell an institution "look if you're not registered we shut you down!"

Two major problems as can be seen from the data gathered as shown above are regulation and politics. The management and administration of TVET is affected by the political directorate of the day. Additionally, an absence of overarching polices, laws, structures and guidelines have hindered the ability of TVET to make inroads. When asked What are some of the contributing factors or deterrents that affect TVET, in T&T Please discuss/identify? Below is some of the responses provided:

Instructor response (focus group interview): "I think it's the status with TVET for sure, because since our colonial past they thought that persons who worked with their hands are inferior to those who are academically inclined. So I would think the major, one of the major factors is the stigma attached to persons pursuing TVET courses."

Centre Manager response (individual interview): "For Tobago...number 1 the stigma. So you have a stigma of vocational skills"

According to Essel (2014) one of the severe consequences of stigma associated with TVET in Ghana and other African countries is that many parents and guardians deter and avert their children and dependents from chasing after TVET programmes.

## 3.2 Resources

The area of resources provided a wealth of responses which unearthed many insights. The utterances provide a wide array on answers and insights that informed the research very positively. Which included:

- Funding
- Equipment and Materials
- Infrastructure

Looking at the area of funding which affects equipment and materials as well, was highlighted as a very serious challenge that affects the administration and running of programmes. Also it can cripple the institutions ability to provide training that is meaningful. The area of funding was noticed in every interview within this study

Curriculum Specialist response (focus group interview): "I think it was the last two budgets TVET the institutions that were cut the most in their budget so what message is that sending to the general public? You know that TVET is like nothing why spend money on that?"

Centre manager response (individual interview): "We had to shut down community based program because of a lack of funding in 2016, which started from 1994 up to 2016".

Instructor response (focus group interview): "So then and there it's a big challenge in itself because remember TVET is practical... it's practical based as well too. So in terms of equipment you know, they say because of the economy, the economic turndown, the economic turnoil that's why we see problems in term of purchasing equipment

Instructor response (focus group interview): "We have equipment but we don't have all the equipment"

A senior executive spoke on the issue of infrastructure that spoke to the closure of prominent institutions, please review the deliberations:

Senior executive response (individual interview): "In addition to that we've had several TVET institutions in operation a few years ago...everybody is familiar with John D and San'do Tech and Point Fortin Vocational Centre those would have been closed and the UTT would have been expected to pick up the slack in terms of training in the TVET areas...

Senior executive response (individual interview): "however what I've found is that they have not really been delivering TVET programs relevant to the needs of Trinidad and Tobago as such. That's personal opinion... and therefore you find that, that has resulted in a derf of TVET instructors in Trinidad and Tobago so that right now in the Secondary school system we have a number of TVET teachers retiring and you have no replacement for them."

Senior executive (individual interview): "in addition to that not only in the Secondary school system but in other TVET institutions there's a derf of TVET instructors and we really need to take steps towards addressing that"

The information shared is vital to understanding some of the structural or root challenges that plague TVET at the moment more has to be done to provide massive change within TVET.

#### 4. Discussion

Two major themes emanated from the study the first theme dealt with challenges. Challenges had seven (7) sub themes. Institution 1 carries a 20%-25% attrition rate yearly, which was shared by the institution's chairman (Raghubar 2016). This is a large number of persons that drop out of the programme each year. Another major challenge was the quality of education of many students are not that comparable to the entry level of the institutions. Other problems that face TVET institutions are a lack of adequate training both theoretically and hands on. There was an absence of industrial training within the ranks of TVET institutions. Also, the quality of teaching due to the lack of standardisation. Quality teaching should be top priority and should be seen as vital to all institutions and TVET within the wider T&T context. In order for Sri Lanka to be a regional hub in strategic capacities, they sought to develop an effective skills development structure, that would aid in their diversification strategy, enhance their labour improve efficiency and competitiveness (Dundar 2013).

Two major problems that came out of the study were regulation and politics. The management and administration of TVET is affected by the political directorate of the day as mentioned by the participants of the study. Additionally, an absence of overarching polices, laws, structures and guidelines have hindered the ability of TVET to make inroads. There is apparent lack of direction and focus within TVET not much is being done to advance the cause. As mentioned by the senior executive there is nothing in place to regulate TVET organisations and institutions. However, the only institution that has the legal powers can shut an institution down if they are not following the law in terms of managing and administering their part of the educational process is the one responsible for tertiary education institutions.

Two situations took place within the TVET landscape that impacted directly on the management and regulation of TVET were the dismissal of a senior executive and the regulatory body responsible for TVET straying from its mandate. It was found that the Senior Executive conducted many improper practices at the institution which including hiring family and financial impropriety (Public Accounts Enterprises Committee (PAEC) July 4, 2018) Also the revelations involving the regulatory body came when they were brought to account to Parliament by the PAEC. These disclosures were witnessed on the Parliament channel and on YouTube for the entire globe to witness. In order for an organisation to succeed it is dependent on its capacity to unleash the creativity of its people who will like to make a difference and initiate change (According to Magzan 2011). Instructors indicated they want to be heard and contribute to the development of their institutions.

Stigma was another major issue that emanated from the study. Stigma arose in every single interview and focus groups conducted. Almost all individuals that are stigmatised are inclined to possess lower levels of psychological wellbeing than those who do not get stigmatised (Markowitz 1998). Stigma is really associated with affiliation between a characteristic and stereotype (Goffman 1963).

The second challenge that arose was resources. Deriving from resources a major sub theme was funding which affected equipment and materials as well another sub theme. One institution mentioned that funding affected them very badly and as a result they removed the stipend; which is an allowance institutions give students on a weekly basics. Many institutions indicated funding was a major challenge for TVET from flourishing. Additionally, can affect the institutions from operating in an optimal fashion. Funding can come as no surprise since T&T is coming out from a lengthy recession emanating from energy supply tremors and low energy prices (International Monetary Fund (IMF) 2018).

Lastly, under the sub theme infrastructure the closure of the famous top-level institutions John S Donaldson Technical Institute and San Fernando Technical Institute both were rated as prestigious and recognised TVET institutions but now closed to make way for the University of Trinidad and Tobago. The findings provided insights into some of the structural or root challenges that plague TVET at the moment and showed these changes brought many negative changes.

Another educator spoke about the closure of both institutions have diminished quality tutor/educators to teach at the secondary level and even at his institution

## 5. Conclusion

The study provided deep insights into the value and importance of TVET. Great focus was place on the importance of TVET and the relationship it has with socio-economic development. Many ideas emanated that spoke to TVET importance and the role it can play in transforming a society in a positive manner. The study looked at four TVET institutions within T&T, the institutions in question were tertiary level institutions. The institutions of this nature have the expertise, knowledge and the skills required to produce graduates that can further contribute to the nation of T&T. The research was in the form of a qualitative study, which uncovered a great amount of data that spoke to the challenges involving TVET. The study showed very convincingly TVET has a number of obstacles at the moment. There are many dilemmas that needs confronting and addressing. The study reviewed the factors that affected TVET in T&T and examined how the challenges can impact upon the viability of TVET in T&T. The institutions mentioned in the study can play a pivotal role in TVET's agenda. However, with the ton load of challenges that the organisations face, which are matters out of their remit, they may be unlikely to deal with these challenges in a meaningful way. Considering factors such as: funding, stigma, attrition, regulation, politics and many others are more of a strategic nature and this is a role for the government and their agencies to address. Take for instance the State of California in USA are spending over 200 million USD to convalesce TVET delivery (Krupnick 2017). This development by California shows the importance and value of TVET. The data showed an overwhelming amount of difficulties with no praise for TVET leaders, administrators of institutions. Leadership is a process of influencing people to comprehend and agree about what needs to be done and how to do it, leadership also involves a process of facilitating individual and collective efforts to achieve shared purposes (Yukl 2006). This is what is needed in TVET at the moment. The study showed a number of challenges and the right leadership will move TVET out of the trouble they are in.

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