Strengthening Inclusive Vocation Education and Training for Learners with Disabilities toward Academic Outcomes at the Institute of Adult Education, Tanzania

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Abstract: This study aimed to identify appropriate ways of strengthening inclusive education in Vocational Education and Training (VET) for learners with disabilities at the Institute of Adult Education in Tanzania. The current study employed a qualitative approach with a case study design, with 30 participants who were adult learners, instructors, and administrators. The findings reveal that developing a curriculum that incorporates vocational and technical skills training from primary to secondary education will help to eradicate the challenge. Also, the government should emphasise that vocational education and training are compulsory for all learners, including those with special educational needs. Furthermore, creating a friendly and supportive learning environment for persons with disabilities. It is concluded that inclusiveness within vocational education and training, particularly in adult education, has not yet been given adequate emphasis. As a result, the VET system and the adult education system are not fully aligned. It is recommended that the government, education stakeholders, and the wider community prioritise the creation of inclusive and learner-friendly environments, especially for learners with disabilities, particularly in adult education. Furthermore, financial, systemic, and material challenges should be addressed to broaden opportunities for persons with disabilities to access adult education and vocational training.

Keywords: *Vocational, Education, Training, Learners, Disabilities, Adult Education*

How to cite this work (APA):

1. Introduction

Vocational Education and Training (VET) has the role of providing knowledge and skills that are very crucial for self-development and the community at large (UNESCO, 2009). VET is crucial for employment, economic independence, and social inclusion. Observing this, Tanzania has implemented several policies aimed at promoting inclusive education and vocational training. Inclusive education in institutions gives all learners equal employment opportunities without any discrimination (Ngure, 2013). It gives importance to diversity, encourages participation, and ensures that all learners have enough assistance to accomplish their educational requirements (Anis et al, 2024).

Since the World Conference on Special Needs Education in Spain in 1994, inclusive education has been the focus of attention in the field of education (Ainscow et al., 2019). The conference drew together representatives from ninety-two member states and twenty-five international organisations, which made a spirited commitment to education for all (UNESCO, 1994; Anis et al, 2024). According to UNESCO, the definition involves a shift from viewing disability as a personal tragedy to

recognising it as a natural aspect of human diversity and seeing the school as the foundation for providing appropriate responses for all. The involvement of policies is seen as a critical influence on whether inclusive educational practices should align with vocational training education systems to support learners with different career paths (Ainscow & Miles, 2009).

In Europe, distance learning training and adult education programs promote access for marginalised learners (Jabir, 2024; Biewer eta l, 2015). In Scandinavian countries like Finland, Denmark and Norway, inclusive curricula and adaptive technologies in VET increase employability for people with disabilities (Nkuna &Mwila, 2024). In India and China, large-scale online vocational platforms expand learning access to rural learners with disability for them to access different opportunities available in their community. In Pakistan, inclusive education is a challenge for many. One of the major obstacles that inclusive education in Pakistan is the lack of financial resources within the vocational and training school system (Hameed & Manzoor, 2019). It means that schools do not have adequate funding from the education departments to run the program of inclusive education. Due to limited financial resources, the schools lack facilities, no laboratories for practical works, no libraries and qualified teachers (Anis et al, 2024). In addition to financial commitment, indoctrination and dogmatism, and the high prevalence of ideological indoctrination in some educational institutions hinder inclusive education (Aslam et al., 2022; Tahira et al., 2020).

In Kenya, the Development and Implementation of the Kenya Education Sector Support Program (2010-2025), the Ministry of Higher Education, Science and Technology Strategic Plan (2008) and the Science, Technology and Innovation Policy (2009) have enabled the country to achieve tremendous progress in the education and training sector in improving "access, equity, quality, relevance and sector management" (Godia, 2012: Malle, 2016). The 2010 constitution of Kenya, article 10 section (2) (b) (c) and (d) set out the values that in the education and training sector the government should ensure the full participation of people, along with "equity, social justice, inclusiveness, equality, human rights, non-discrimination and the protection of marginalised groups, good governance, integrity, transparency and accountability and sustainable development" (Republic of Kenya, 2010: Malle, 2016)). Kenya enacted a TVET Act "which will conceive the Kenya TVET Authority by 2015" (African Union, 2014, p. 24). The overall goal of the vocational education policy of the government of Kenya was intended to "provide relevant and adequate skills for industrial and economic development" (Republic of Kenya, Ministry of Education, Higher Education, Science and Technology, 2012, p. 91). The promotion of inclusion of persons with disabilities in all sectors of society was one of the strategic thematic areas declared on the Continental Plan of Action for the Decade of Persons with Disabilities of 2010-2019. Under this thematic area, representation, education, livelihood, work, employment and so on were identified as priorities requiring special attention from governments (African Union Commission, Department of Social Affairs, 2010).

In Tanzania, the government tried to improve access to Basic Education for all youth and adult people. The concerted socio-economic development effort of the government of Tanzania, guided by the Tanzania Development Vision 2025, recognized quality education and training as key instruments for the country (Malle, 2016). The document further noted that the priority area programme facilitates access to vocational education for students from disadvantaged groups. Alongside this TVET development programme, the Vocational Education and Training Authority of Tanzania developed a five-year Corporate Plan 2012/13-2016/17. In accordance with this guiding plan, the authority, as a responsible government agency, adopted a common vision on TVET development, stating that it should "ensure provision of quality VET that leads to generation of competitive labour force and contributes to social economic development" (United Republic of Tanzania Vocational Education and Training Authority, 2012; Malle, 2016).

The increased effort had hardly materialised for learners with disabilities and other vulnerable learners; stigma, especially for disabled learners, dropout and repetition rates remained high. There is an observed tension between quantity and quality in education whereby quantity has been prioritised over quality (MEVOT, 2009). Ohba and Malenya (2020) also indicate that the proportion of students without disabilities who pursue secondary school in the United Republic of Tanzania is 13 per cent, whereas only 7 per cent of children with disabilities continue their education at the secondary level, not in Vocational Training Education. Similarly, evidence from the Institute of Adult Education, which is responsible for enabling all people out of the formal system to get knowledge and skills suitable for personal development, remains limited in highlighting a gap in knowledge and skills regarding the effectiveness of VET in promoting inclusion and equitable outcomes for learners with disabilities. Thus, this paper examined the strategic ways of enhancing inclusive vocational education and training for learners with disabilities on academic outcomes in the Institute of Adult Education in Tanzania.

2. Literature Review

This section presents a review of the literature related to the specific objective of the current study. It is organised under theoretical review, which discusses the relevance and related theory of Inclusive Education in Vocational Training Education, and empirical literature review, which provides an overview of the Inclusive Education in Vocational Training.

2.1 Theoretical Framework

Various scholars worldwide have advocated for the importance of applying theory in carrying out any research study. For instance, McGrath (1984), as cited by Muhando (2022) argues that a theory is as important as data because it is used to strengthen the data. It includes a means of identifying a problem and connecting one problem and one piece of evidence with others, even if they have been assigned different labels. It is also noted that theories help the researcher to understand, confirm and justify the findings of a study by comparing with other studies (Fusi, 2016; Muhando, 2022). Thus, the theoretical underpinning that guided this study is Human Capital Theory.

2.1.1 Human Capital Theory

Human capital theory was introduced by economists Gar Becker and Theodore Schultz in the 1960s as a theory that views people's knowledge, skills, attitudes, and abilities as valuable forms of capital because they contribute to productivity, economic growth, and social development. This theory points out that education and training are the investments that could add to productivity (Asadullah & Zafar, 2019). It enhances the skills and knowledge of individuals and thereby facilitates employment in the labour market. In the macroeconomic aspect, human capital, along with technological progress and innovation on contributes to economic growth (Lucas, 1988; Solow, 1956; Yoonseon, 2021). In addition, national investment in education and training as an instrument of developing human capital and economic growth is positively correlated (Asadullah & Zafar, 2019).

Vocation Education and Training in inclusive education is an instrument to provide human capital for maximising social and economic development for learners. The effectiveness of TVET enhances skills, innovation, productivity, self-employment and wages of workers. The empirical evidence supports that TVET enhances the skills of youth, especially uneducated youth, increases productivity and wages of workers in farming in the long run (Kijime et al, 2012; Jothilakshmi et al, 2009; Yoonseon, 2021). Furthermore, on-the-job training, which

is one of the TVET, positively affects wages and such effect enlarges with length of training and the size of firms (Rosholm et al, 2007). Thus, investing in inclusive education in Training Vocation and Education Training stimulates economic growth by increasing productivity, innovation and adaptation and improving employment for all groups of people, which helps to rebuild social and economic growth.

2.2 Empirical Review

Dixit-Bajpai (2023) studied the impact of Vocational Education on Economic Growth and Development across the G20 countries. The study found that to overcome these obstacles, policymakers and stakeholders must prioritise investment in vocational education programs, raise public awareness about its benefits, and improve access to training facilities. Also, they should consider the significance of vocational education and encourage member countries to invest in comprehensive and effective vocational education systems. These efforts aim to stimulate economic growth, reduce unemployment, and enhance the skills of the global workforce. Investing in vocational education is crucial for achieving sustainable economic growth, creating a competitive workforce, driving innovation, and benefiting society as a whole.

Effah (2014) found that developing states should demonstrate a feasible and readily available model for workforce capacity building, skills training and livelihoods development in other deprived communities. The scope for a considerable up-scaling and expansion of programming may be possible, and with the appropriate linkages, technical support and design for the future course of strategic programming, ICCES shows the potential to become flagship programmes in Ghana on how to demonstrate an effective capacity building program for livelihoods development, and skills training through technical and vocational education. He also found that a large group completing Technical Vocation and Training education in Ghana remains jobless. Thus, the state should therefore have a system to support these graduates by providing permanent employment and a market to encourage a large number to be enrolled in the program. Also, the donor community has a role to play in helping to harmonise the TVET system. The current practice, whereby each donor works separately and leaves when specific projects end, does not help the country very much in terms of vocational training. Continuity and sustainability hardly occur in practice because efforts are not pulled together to consolidate interventions (Effah, 2014).

Malle (2016) studied Inclusiveness in the Vocational Education Policy and Legal Frameworks of Kenya and

Tanzania. The findings show that promotion of inclusion of persons with disabilities in all sectors of society was one of the strategic thematic areas declared on the Continental Plan of Action for the Decade of Persons with Disabilities 2010-2019. Under this thematic area, representation, education, livelihood, work, and employment were identified as priorities requiring special attention from governments overall goal of the vocational education policy of the government is to "provide relevant and adequate skills for industrial and economic development.

3. Methodology

This study used a qualitative approach. Qualitative research seeks to understand a given research problem or topic from the perspectives of the local population involved (Guest, Mack, Woodsong, 2005). Macqueen and Namey (2005) illustrated that qualitative research is effective in obtaining culturally specific information about the values, opinions, behaviours, and social contexts of particular populations in their natural setting.

3.1 Research Design

This study was guided by a case study design. Creswell (2014) defines a case study as a qualitative design in which the researcher explores in-depth a program, event, activity, process, and one or more individuals. The case(s) are bound by time and activity, and researchers collect detailed information using a variety of data collection procedures over a sustained period of time.

3.2 Study Area

The study was conducted in Dar es Salaam Region. The area of this study was selected based on the fact that if the researcher is familiar with the study area, it helps to handle the obstacles that might affect the process of data collection (Shenton, 2004). For that reason, the researcher of this study is familiar with the Dar es Salaam region, particularly at the Institute of Adult Education, hence her experiences facilitated the process of data collection on the topic.

3.3 Population

Creswell (2012) defines the term population as a group of people having common characteristics. Kombo & Tromp (2006) define a population as a group of individuals, objectives or items from which samples are taken for measurement. The population of this study were the workers (instructors, administrators, learners and lecturers) from both the Institute of Adult Education and Vocational Education and Training.

3.4 Sample size

According to Kombo and Tromp (2006), a sample is the set of respondents or participants selected from a larger population for a survey. In this study, the sample size hinges on the attainment of saturation; hence, the researcher involved 30 participants. In a qualitative approach, "saturated" refers to the point where a researcher has collected enough data that no new themes, insights, or patterns are emerging, indicating they have thoroughly explored the topic and can confidently draw conclusions from their findings. Essentially, the data is considered full and further data collection would not provide any additional meaningful information, thus ensuring the research is robust and credible (Morse 2015).

3.5 Sampling Technique

Sampling is a procedure that a researcher uses to gather people, places or things to study (Kothari, 2014). This study used a purposive sampling technique.

3.5.1 Purposive Sampling

According to Kothari (2014), purposive sampling is an occasion based on previous knowledge of a population, and the specific purpose of the research investigators for use in personal judgments to select a sample. In this study, purposive sampling was employed because it was expected to help a researcher obtain the relevant data from the real targeted people and understand the problem under investigation. Purposive sampling is used to select participants due to their position, whereby learners are the primary victims/benefits of inclusive education in Vocation Education Training, while the instructors and lecturers are responsible for educating and taking care of students.

3.6 Data Collection Methods

Data collection involves systematically gathering specific information to support or substantiate facts, as stated by Kombo and Tromp (2006). This study gathered data through interviews and focused group discussions to provide a comprehensive understanding of the research subject.

3.7 Data Analysis Plan

Kothari (2004) described data analysis as a multifaceted process involving the editing, coding, classification, and tabulation of collected data. In this study, thematic analysis was employed to provide a proper analysis of data. Thematic analysis is used to identify and analyse

patterns within the data. A synthesis of findings, including summaries and direct quotations from participants presented, focusing on the study's objectives to offer a nuanced perspective. In analysing the data, Stewart (2020) illustrates that analysing qualitative data involves a systematic process of interpreting non-numerical information to discover patterns, themes, and insights. This process involves different steps. The first step is data familiarisation, where researchers immerse themselves in the data by reviewing transcripts, notes, or other materials multiple times. This initial phase helps researchers gain a holistic understanding of the content and context of the data. Thus, the researcher read and re-read the data to become familiar with it to generate a great understanding.

Stewart said, once familiar with the data, the next step is coding. Coding involves identifying and labelling specific segments of the data that are relevant to the research questions. These codes represent key concepts or themes that emerge from the data. Researchers may use manual coding, where they highlight and annotate the data, and software tools can assist in organising and categorising the information. In relation to this context, the researcher generated summaries of the main themes of the data that were relevant to answering the research question.

After coding, researchers group similar codes to form broader themes or categories. This step involves identifying connections between different codes and understanding how they relate to each other. The goal is to create a logical narrative or framework that captures the main ideas within the data. In this study, the researcher organised relevant data and reviewed the sustainability themes and grouped them according to the questions.

The final stage of qualitative data analysis is interpretation and writing a report. Researchers interpret the themes and patterns identified during the coding process, linking them back to research questions and theoretical frameworks. This interpretation involved concluding the meaning and significance of the data, often resulting in new insights or theories. Thus, the researcher checked the candidate themes against the questions to determine the reality against the asked questions. In this phase, the researcher developed themes, which sometimes involve divided themes, combined themes, or rejected themes. It helps the researcher to determine the relevant or irrelevant themes as provided by participants through checking or reviewing them again and writing up the complete report by weaving together the analytic description and data extracts and contextualising the analysis with existing literature and theory used to guide the current study.

4. Results and Discussion

A scrutiny was conducted on the data that was attained from the interviews and focus group discussions. The feedback that was established from the instructors was then analysed, and the results of that analysis were used to classify the instructors' overviews on Vocational Education and Training refinement in promoting equitable learning for learners with disabilities toward academic outcomes at the Institute of Adult Education.

The findings showed that the challenges facing inclusive education within Vocational Education and Training (VET) can be effectively addressed through the following measures: developing a curriculum that incorporates vocational and technical skills training in adult education and ensuring that it is compulsory for all learners, including those with special educational needs. Furthermore, it is essential to create a friendly and supportive learning environment for persons with disabilities by providing appropriate learning materials, well-equipped studios, and accessible assistive technologies. In addition, the community should be sensitised to eliminate negative perceptions and discriminatory attitudes that hinder persons with disabilities from enjoying their right to education, particularly vocational education and training opportunities.

During face-to-face interviews, one of the instructors stated that:

> The Government of Tanzania, through the Ministry of Education and Vocational Training, together with policy makers and curriculum developers, should formulate a policy that directs vocational training to be taught as a compulsory subject from the basic education level up to higher learning institutions. This should be applied to both the formal education system and the non-formal education system, which is often offered through adult education (Interviewed Instructor, September 2025)

In addition, one of the learners said:

> The Ministry of Education, in collaboration with curriculum developers, should design a curriculum that provides vocational training from the lower levels of education and prioritise people with disabilities,

especially those studying through distance learning or adult education. This would help increase the number of learners/individuals with special needs accessing vocational education (Interviewed Learner, August 2025)

Furthermore, an administrator stated that:

We often see many students, especially those who failed the Primary School Leaving Examination or Form Four examinations, rushing to join VETA. Most of those who go there are adults, but it is very rare to find people with disabilities in vocational training centres. Also, in adult education programs, the number of learners with disabilities is small compared to the formal education system. This is mainly due to the government's failure to emphasise and prioritise students with special needs in non-formal education. Therefore, the government should establish strong strategies and design a curriculum that ensures vocational training is also taught through non-formal education, especially adult education and that all people with disabilities are registered regardless of the type of disability (Interviewed administrator, August 2025)

On the other hand, the researcher discovered that the existing curriculum does not have a direct linkage between vocational and technical education, as well as the education provided through adult learning programs. Therefore, the government should design an integrated curriculum that combines VETA-type education with adult learning programs for all groups, both people with disabilities and those without special needs.

The above information implies that policy formulation and curriculum development should aim at integrating vocational and technical education with adult education programs. This integration should also consider people with special needs (those with disabilities). Furthermore, emphasis should be placed on making vocational subjects compulsory at all levels from Form One to Form Four through non-formal education programs, as well as for distance and adult learners from the first to the final year of their studies.

The current study corresponds to the study by Dixit (2023) who found that inadequate Funding is among the challenges facing. Vocational education programs require significant investments in infrastructure, equipment, and highly skilled teachers. However, many countries do not allocate enough funding for vocational education, making it difficult to develop and maintain quality programs. Also, the findings added that improper Curriculum Design in many countries, especially less developed, hinders Vocational education programs. It is recommended that the VET curriculum need to be designed in such a way that they are relevant to the current job market. Inflexible and outdated curricula can discourage students from enrolling and limit their job prospects after graduation (International Labour Organisation [ILO], 2013). The use of outdated curricula can result in a discrepancy between the skills employers demand and what students possess, which is a significant factor contributing to low employability and challenges in students' transition to the job market (Pilz, 2016).

4.1 Creating a Friendly Environment for Learners with Disabilities

The researcher found that creating a conducive environment for people with disabilities, especially in vocational and technical training, is one of the best strategies to improve the delivery of vocational and technical education for learners with disabilities, particularly through adult education programs. A friendly environment includes having enough classrooms that allow people with disabilities to learn comfortably, the availability of sufficient learning and teaching materials, and the provision of special equipment designed for people with disabilities, for example, Braille materials for the visually impaired and audio equipment for those who need auditory assistance.

During a dialogue with students, one of them was quoted as saying:

Vocational training is more difficult compared to ordinary academic subjects. This difficulty, especially for learners with disabilities, is caused by the lack of adequate facilities, for instance, materials for the visually impaired, hearing-impaired, and those with mobility challenges. Sometimes these learners fail to continue with their studies because of these challenges; others do not even register for such training because they believe there is no friendly learning environment for them. Therefore, there is a great need for the government to improve and distribute learning materials and resources so that people with disabilities can learn

effectively (Focus Group Discussion with students, September 2025)

On the other hand, one of the instructors stated:

> The government should invest in improving friendly environments for people with disabilities, especially in non-formal education such as adult education. This includes constructing enough classrooms that meet the needs of learners with disabilities. Moreover, the government should provide appropriate teaching and learning tools that suit the specific vocational training and the needs of the target groups (Interviewed Instructor, August 2025)

From the students' perspective, during a face-to-face interview one of them stated:

> There is a great need for our government to improve the learning environments where vocational and technical training is offered, especially in middle-level colleges and institutions that provide non-formal education, such as the Institute of Adult Education. Honestly, there are no suitable learning environments, for example, classrooms for people with disabilities do not reflect their realities, and there is a lack of learning equipment specifically for them. Improving these conditions would enhance academic performance, understanding, and increase the number of enrolled students (Interviewed Learner, August 2025).

The current study is associated with the findings by Effah (2014), who found that the donor community has a role to play in helping to harmonise the TVET system. Similarly, it found that the state should therefore have a system to support these graduates by providing permanent employment and a market to encourage a large number to be enrolled in the program.

4.2 Eliminating Negative Beliefs about People with Disabilities

The study revealed that people with disabilities often face discrimination, including being denied their educational rights, especially in vocational and technical education, due to the misconception that they are incapable because of their physical conditions. Therefore, respondents suggest that the government, professionals, and the community at large have a responsibility to eradicate these beliefs by providing public education, enacting strict laws against offenders, and offering psychological counselling to victims who appear to have lost hope.

During an interview session with one of the instructors, he said:

> The Government of Tanzania has the responsibility to enact strict laws that will penalise parents who deny their children the right to vocational and technical education just because they are disabled. I believe that if one parent is imprisoned, this bad behaviour will stop. Many children, after failing their final examinations, remain at home even though they have talents that could be developed through VET programs (Interviewed Instructor, August 2025)

Similarly, another instructor added:

> I suggest there should be strict laws against parents who confine their children with disabilities at home without giving them access to education. Also, laws should be established for institutions or vocational colleges to guide and punish teachers and students who discriminate against or stigmatise learners with disabilities. If it is proven that someone has done so, whether in the adult education system, formal education, or VETA institutions, they should face severe punishment, including dismissal from work or expulsion from studies and imprisonment. I believe this would strengthen the proper systems and protect the rights of people with disabilities to access vocational and technical education (Interviewed Instructor, September 2025)

On the other hand, the researcher has discovered that the government, educational stakeholders, and human rights organisations have a significant responsibility to provide education and awareness about the harmful effects of misconceptions and superstitious beliefs regarding persons with disabilities. Such education should be utilised to enlighten members of society on the fact that people with disabilities also have equal rights to access skills and vocational training through adult education. Furthermore, this educational awareness should emphasise that it is a

grave mistake to suppress the dreams and diminish the talents of persons with disabilities, as doing so hinders both social and economic development.

In addition, the study participants expressed their willingness to utilise their traditional dances, customs, and cultural practices to form groups dedicated to advocacy and awareness-raising on the rights of persons with disabilities to education, particularly technical and vocational training, even for those who may not have performed well in their academic examinations. Such individuals should be encouraged and supported to enrol in adult education programs so that they may fulfil their aspirations and contribute meaningfully to their communities.

Moreover, the findings of this study indicate that counselling is the most effective remedy for rebuilding the confidence and motivation of learners with disabilities, many of whom appear to have lost hope in pursuing education. One learner, during a focus group discussion, was quoted as saying:

> I would advise that learners, especially those with disabilities, be given counselling on how to accept the nature of their conditions. Many of them seem to have given up on life and on getting an education. I have a neighbour who is physically disabled; he has only one leg. This young man cries every time he sees me leaving for college, telling me how much it pains him to be in his condition. He says, 'If only I had both legs, I would go to VETA to study automobile mechanics and driving. But now, I have no means or support to fight for my dreams (Focus group discussion with learners, September 2025)

Likewise, one of the instructors interviewed stated the following:

> There is a need for instructors, psychologists, and the students themselves to provide guidance and counselling, particularly to those affected by disability, to build their mental, emotional, and spiritual strength. We often encounter cases of learners with special needs losing hope and dropping out of college, sometimes without any notice. This usually results from the stigma they experience or from self-doubt when faced with challenges. Many tend to attribute their difficulties to their disability and consequently decide to quit their studies. I believe that providing counselling will greatly help them to regain confidence and restore hope in their academic journey (Interview with Instructor, October 2025)

The information presented above clearly signifies that educating the public about the negative impacts of discrimination based on physical disabilities through educational institutions, human rights organisations, and cultural traditions in Tanzania is a crucial approach toward resolving the existing challenges. Additionally, counselling stands out as a cornerstone in empowering learners with disabilities, as it strengthens their self-belief, capabilities, and determination to strive for academic success. Through effective counselling, fear and low self-esteem can be eliminated, thereby enhancing resilience and motivation among students to pursue their dreams through vocational and technical education systems, and through adult education programs.

Also, this study is similar to the study by Malle (2016) who found that promoting education on inclusion of persons with disabilities in all sectors of society was one of the strategic thematic areas declared on the Continental Plan of Action for the Decade of Persons with Disabilities of 2010-2019. Under this thematic area, representation, education, livelihood, work, employment and so on were identified as priorities requiring special attention from governments overall goal of the vocational education policy of the government is to "provide relevant and adequate skills for industrial and economic development.

5. Conclusion and Recommendations

5.1 Conclusion

This study aimed to identify appropriate ways of strengthening inclusive education in Vocational Education and Training (VET) for learners with disabilities at the Institute of Adult Education in Tanzania. It is therefore concluded that inclusiveness within vocational education and training, particularly in adult education, has not yet been given adequate emphasis. Many graduates, especially those with special needs, are not provided with sufficient support or encouragement to develop their talents and skills through the adult education framework. As a result, the VET system and the adult education system are not fully aligned.

5.2 Recommendations

It is recommended that the government, education stakeholders, and the wider community prioritise the creation of inclusive and learner-friendly environments, especially for students with disabilities, within educational institutions, particularly in adult education, which currently appears to lack full integration with vocational training. Furthermore, financial, systemic, and material challenges should be addressed to broaden opportunities for persons with disabilities to access adult education and vocational training, to enhance academic achievement and improve educational outcomes.

References

African Union Commission Department of Social Affairs. (2010). *African Union Continental Plan of Action for the African Decade of Persons with Disabilities, 2010-2019*. Retrieved fromhttp://sa.au.int/en/sites/default/files/CPoA%20Handbook%20%20AUDP%20English%20-%20Copy.pdf

African Union. (2014). AU outlook on education report: East African Community (EAC). Cameroun: Author. Retrieved from http://www.adeanet.org/sites/default/files/au_outlook_report_eac_english_version_2014_web.pdf

Ainscow, M., & Miles, S. (2009). *Developing inclusive education systems: How can we move policies forward*. In C. Giné, D. Durán, T. Font, & E. Miquel (Eds.), La educación inclusiva: de la exclusión a la plena participación de todo el alumnado (pp. 167-170). Horsori.

Ainscow, M., Slee, R., & Best, M. (2019). *The Salamanca statement*: 25 years on. 23(7-8), 671 676.

Ali, A. M. (2019). Quadratic Indirect Effect of National TVET Expenditure on Economic Growth Through Social Inclusion Indicators. *SAGE Open*, *9*(1). https://doi.org/10.1177/2158244019830557

Amjad, H., & Muhammad, Y. (2019). Teaching students with down syndrome: Perspectives of special school educators and psychologists. *Journal of Inclusive Education, 3*(1), 127-143.

Anis, F., Bokhari, B. T., & Pirzada, G. (2024). Inclusive Education in TVET: Exploring Vocational Educators' Perspectives on Policies, Structures, Systems, and Practices. *Pakistan Journal of Law,*

Analysis and Wisdom, 3(3), e-ISSN: 2959-0825, p-ISSN: 2959-0817

Ansari, B., & Wu, X. (2013). Development of Pakistan's technical and vocational education and training (TVET): An analysis of skilling Pakistan reforms. *Journal of Technical Education and Training, 5*(2).

Aslam, A., Muhammad, Y., & Nasir, L. (2022). Transgender students' experiences of bullying: Some case study evidence. *Global Social Sciences Review, 7*(2), 71-80.

Bryman A. (2012). *How many qualitative interviews are enough? In: Baker SE, Edwards R, editors. How Many Qualitative Interviews are Enough? Expert Voices and Early Career Reflections on Sampling and Cases in Qualitative Research. Southampton:* ESRC National Centre for Research Methods, University of Southampton; pp. 18–20.

Creswell, J. W. (2012). *Educational Research Lanning, Conducting and Evaluating Qualitative and Quantitative Research (4th ed.)*. Boston: Pearson Education Inc.

Creswell, J. W. (2014). *Educational Research Lanning, Conducting and Evaluating Qualitative and Quantitative Research (5th ed.)*. Boston: Pearson Education Inc.

Dawson, C. (2002). *Practical Research Methods: A user-friendly guide to mastering research techniques and projects*. United Kingdom: British Library Cataloguing Publication.

Effah, B., Obinnim, E., Osei-Owusu, B., Pongo, A. N., & Sam, K. F. (2014). The Impact of TVET on Ghana's Socio-Economic Development: A Case Study of ICCES TVET Skills Training in Two Regions of Ghana. *American International Journal of Contemporary Research, 4*(1), 185-192

Ehlert, M., Peter, F., Finger, C., Rusconi, A., Solga, H., Spieß, C. K., & Zambre, V. (2017). *Methodological and data report*. The Berliner Studienberechtigten-Panel (Best Up):

European Union (EU) (2010). *Education and Training for Social Inclusion: European Success Stories*. Luxembourg: Office of the European Union.

Fisher, D., & Frey, N. (2017). *Inclusive education: A practical guide to supporting diversity in the classroom*. ASCD.

Fuller, A. (2015). Vocational education. *International encyclopaedia of the social &behavioural sciences, 25*, 232-238.

Godia, G. I. (2015). *Kenya, a nation in transition. Opportunities and constraints, alignment of the education centre to the new constitution*. Paper presented at the 5th Annual Conference of the Kenya Scholars & Studies Association. Retrieved fromhttp://kessa.org/yahoo_site_admin/assets/docs/5TH_ANNUAL_CONFERENCE_PAPER_keynoteaddress.25190110.pdf

Mack, N., Woodsong, C., MacQueen, K., Guest, G. and Namey, E. (2005). *Qualitative Research Methods: A Data Collector's Field Guide*. Family Health International (FHI), USA.

Hameed, A., & Manzoor, A. (2019). Similar agenda, diverse strategies: *A review of inclusive education reforms in the subcontinent. Bulletin of Education and Research, 41*(2), 53-66.

International Labour Organisation [ILO] (2013). *Possible futures for the Indian apprenticeship system*: Options paper for India hp://www.ilo.org/wcmsp5/groups/public/-asia/-ro-bangkok/-sronewdelhi/documents/publication/wcms_234727.pdf

Iqbal, T., & Muhammad, Y. (2020). Using differentiated instruction in inclusive schools: A qualitative analysis of prospective educators' self-efficacy. *Journal of Inclusive Education, 4*(1), 229-257.

Jothilakshmi, M., Krishnaraj, R., &Sudeepkumar, N. K. (2009). *View all authors and affiliations* to answer the challenges in this sector? *Journal of Education and Vocational Research*, *4*(6), 193-204.

Juvonen, J., Lessard, L. M., Rastogi, R., Schacter, H. L., & Smith, D. S. (2019). Promoting Social Inclusion in Educational Settings: Challenges and Opportunities. *Journal of* Educational *Psychology, 54*(4), 250-270. https://doi.org/10.1080/00461520.2019.1655645

Kijima Y, Sserunkuuma D & Otsuka K, 2006. How revolutionary is the NERICA revolution? Evidence from Uganda. *Journal of Developing Economies 44*(2), 232–251

Kombo, K. D. & Trompo, A. L. D. (2006). *Proposal and Thesis Writing: An Introduction.* Nairobi: Pauline's Publications Africa.

Kothari, C. R. (2004). *Research Methodology and Technology.* New Delhi: Age International (P) Limited Pushers.

Krohn-Nydal, A. (2008). *The Development of Inclusive Education in the Tanzanian Primary School.* Norway: University of Oslo

Kumari, N. (2023). Impact of Pradhan Mantri Kaushal Vikas Yojana on Income and Saving. *International Journal of Innovative Research in Engineering & Multidisciplinary Physical Sciences, 11* (2).

Lucas, R. (1988). On the Mechanics of Economic Development. *Journal of Monetary Economics, 22*, 3-42.http://dx.doi.org/10.1016/0304-3932(88)90168-7

Malle, Y. A. (2016). Inclusiveness in the Vocational Education Policy and Legal Frameworks of Kenya and Tanzania. *Journal of Education and Learning; 5*(4), 53-62. ISSN 1927-5250 E-ISSN 1927-5269

Mezzanotte, C. (2022). *The social and economic rationale of inclusive education: An overview of the outcomes in education for diverse groups of students*. OECD Education Working Papers No. 263. https://dx.doi.org/10.1787/bff7a85d-en

Mhando, F. S. (2022). *Understanding Research Methods in Education*. Tanzania: ISBN 978-9976-5475-7-3

Mishra, B. S. & Alok S. (2017). *Handbook of Research Methodology*. India: Edu Creation Publishing.

MOEVT (2007). *National Strategy on Inclusive Education 2009 - 2017 Final draft*. Tanzania: Ministry of Education and Vocational Training.

Morse, J. M. (2015). The significance of saturation. *Qualitative Health Research journal, 5(2):147–149. doi: 10.1177/104973239500500201.*

Nelson, R. R., & Phelps, E. S. (1966). Investment in Humans, Technological Diffusion, and Economic Growth. *The American Economic Review, 56*(1/2), 69–75. http://www.jstor.org/stable/1821269

Ngure, S. W. (2013). Where to vocational education in Kenya? Is analysing training and development needs the

Ohba, A., &Malenya, L. M. (2020). Addressing inclusive education for learners with disabilities in the integrated education system: the dilemma. *A Journal of Comparative and International Education, 52*(1) p19-36 2022

Pérez-González, J.-C., & Núñez-Pardo, J. A. (2020). Inclusive education in vocational education and training: A systematic review. *International Journal of Inclusive Education, 24*(2), 164-181.

Pilz, M. (2016). *A view from the outside: India's school-to-work transition challenge–strengths and weaknesses*. India: preparation for the world of work: education system and school to work transition, 345-357.

Pilz, M., &Gengaiah, U. (2019). *Teacher training education for VET teachers in India*. India: Handbook of vocational education and training, 1733-1746.

Preeti Dixit, R., & Ravichandran, R. (2023). *Indian Journal of Vocational Education, 35, 56-68*

Republic of Kenya. (20012). *Kenya Vision 2030*. Nairobi: Author. Retrieved from http://theredddesk.org/sites/default/files/vision_20 30_brochure__july_2007.pdf

Romer, P.M. (1990). Endogenous Technological Change. *Journal of Political Economy, 98*, S71-S102. http://dx.doi.org/10.1086/261725

Rosholm, Michael & Nielsen, Helena Skyt & Dabalen, Andrew, 2007. Evaluation of training in African enterprises. *Journal of Development Economics, Elsevier, 84*(1), 310-329.

Shenton, A. K. (2004). Strategies for Ensuring Trustworthiness in Qualitative Research Projects. *Education for Information*, 22, 63-75. https://doi.org/10.3233/EFI-2004-22201

Stewart, A. (2020). *Strategies in Qualitative Research Approaches.* Los Angeles: SAGE Publications

Tara, S. N., Kumar, N. S., &Pilz, M. (2016). *Quality of VET in India*: The case of industrial training institutes. TVET@Asia (Vol. 7). Autonomy in forging public-private partnerships in vocational education and skills development: baseline study. European Training Foundation.

Terzi, L. (2014). Reframing inclusive education: educational equality as capability equality. *Cambridge Journal of Education, 44*(4), 479-493. https://doi.org/10.1080/0305764X.2014.960911

UNESCO (2009). *Towards Inclusive Education for Children with Disabilities*: A Guideline, http://www.uis.unesco. org/Library/Documents/disabchild09-en.pdf.

UNESCO. (1994). *The Salamanca statement and framework for action on special needs education*. https://unesdoc.unesco.org/ark:/48223/pf0000098 427

UNESCO. (2022). *The right to education in the 21st century: findings from the international seminar on the right to education*. https://unesdoc.unesco.org/ark.

UNICEF (2014). "*Legislation and Policies for Inclusive Education*", *Webinar 3 Companion Technical Bookle*t. http://www.inclusiveeducation.

United Republic of Tanzania Ministry of Education and Vocational Training. (2010). *National strategy on inclusive education (2009-2017)*. Final Draft. Dar es Salaam: Author.

United Republic of Tanzania Ministry of Education and Vocational Training. (2013). *Technical and vocational education and training development program (TVETDP) 2013/14-2017/18*. Ministry of Education Press, "A" Magogoni Road, Dar es Salaam: Author.

United Republic of Tanzania National Assembly. (2010). *The persons with disabilities act*. Dar es Salaam: Author.

United Republic of Tanzania. Vocational Education Training Authority (VETA). (2012). *VETA corporate plan 2012/13-2016/17*. Dar es Salaam: Author.

Vandekinderen, C., Roets, G., Van Keer, H. & Roose, R. (2018) Tackling social inequality and exclusion in education: from human capital to capabilities. *International. Journal of Inclusive Education, 22*(1) 1-20

Wessels, A., & Pilz, M. (2018). *Teacher training education training*. India: International handbook of vocational education and training.

World Bank. (2017). *World development report 2018: Learning to realize education's promise*. The World Bank.