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Technical-Vocational Education and Training: A Way Forward to Developing Skills for Tourism Sector in the Twenty-first Century

Abstract

This study aims to provide a descriptive overview of the technical vocational education and training (TVET) system and discuss challenges it faces in developing skills for the tourism sector in the Philippines. A combination of secondary data analysis together with focus group discussions and key informant interviews of the trainers and graduates were employed for it. Findings showed that the Technical Education and Skills Development Authority (TESDA) Women's Center conforms to the national goals of TESDA, but objectives are limited to core competencies only. The Women's Center programs employ a modified competency-based training approach with uniquely designed curricula that includes more hours, various modes of learning and methods of training. The challenges encountered were the time-consuming process of realigning instruction and assessment to the twenty-first-century skills, and in maintaining a conducive learning environment. By addressing these challenges, TVET can play a pivotal role in shaping a competent workforce for the future of tourism.

Keywords: *challenges, issues, technical-vocational education, and training*

1 Introduction

Technical-Vocational Education and Training (TVET) involves the study of technologies and related sciences and the acquisition of practical skills relating to occupations in various sectors of economic and social life. TVET comprises both formal (organized programs as part of the school system) and non-formal (organized classes outside the school system) approaches (Technical Education and Skills Development Authority 2023). It also constitutes education, training and skills development relating to a wide range of occupational fields, production services and livelihoods. It seeks to promote job, productive work, and lifelong learning while empowering people, groups, businesses, and communities, thereby promoting inclusive and sustainable economic growth and competitiveness, social equity, and environmental sustainability (UNESCO 2022).

TVET follows a unique delivery approach called Competency Based Training or CBT. According to one report (Foyster 1990), the key characteristics of competency-based programs are: (1) competencies are carefully selected; (2) supporting theory is integrated with

skill practice; in other words, essential knowledge is gained to support the performance of skills; (3) detailed training materials are aligned with the competencies to be achieved and designed to support the acquisition of knowledge and skills; (4) methods of instruction involve mastery learning, and this is premised on the understanding that all participants can master the required knowledge or skill, provided sufficient time and appropriate training methods are used; (5) participants' knowledge and skills are assessed as they enter the program and those with satisfactory knowledge and skills may bypass training or competencies already attained; (6) learning should be self-paced; (7) flexible training approaches, including large group methods, small group activities and individual study, are essential components; (8) a variety of support materials including print, audiovisual and simulations (models) geared towards the skills being mastered and used are included; and (9) satisfactory completion of training is based on achievement of all specified competencies (National TVET Trainers Academy 2012).

Informal and non-formal learning are essential programs recognized by the ASEAN Qualifications Reference Framework (AQRF) in supporting life-long learning (The ASEAN Secretariat 2018). While the AQRF promotes the use of learning outcomes as the basis of qualifications, in the Philippines, non-formal learning has been prevalent across technical-vocational education and training, even before the signing of the Philippines Qualifications Framework in 2017.

The Technical Education and Skills Development Authority (TESDA) is the leading government agency responsible for overseeing the technical vocational education and training sector in the country. The training provided in the TVET program is expected to respond to the requirements of the economic sectors in the country. In other words, skills and competencies gained from training should be aligned with industry standards so that TVET graduates are in a position to enter productive employment and in this way contribute to the economy (TESDA 2015). In keeping with this, TESDA has been regularly monitoring the employability of TVET graduates via surveys. The present study hopes to assess the efficiency and effectiveness of TVET provisions based on the employment outcomes of its graduates.

The TESDA Women's Center (TWC) is one of the premier TESDA Technology Institutions in the country and has been one of the pioneer training centers providing quality TVET in the National Capital Region. TESDA and TWC have established key performance indicators (KPIs) to measure its outcomes in a systematic way. They express these indicators in the form of the acronym EGACE which stands for the number of trainees Enrolled, Graduated, Assessed, Certified and Employed. These indicators are what every institution and level use in reporting and measuring their performance.

One of the distinguishing critiques in the evaluation of TVET has been the seeming disconnect between the outcomes and the process. One research article, for instance, points out that the concentration of evaluation in most TVET programs across the world is focused directly on measurable effects like number of employed (Deitmer & Heinemann 2009).

Another study enumerates other outcomes as standardized performance indicators including 1) completion of courses and 2) completion of qualifications (Liu & Clayton 2016). In the context of the Philippines TVET, these are translated to the number of graduates for the former and numbers certified or those who were found competent in a national assessment certification program for the latter. Identification of successes and gaps are possible once the outcomes are measured as well as actions are taken to address the needs. However, solely looking at the outcomes is considered restrictive for evaluation, as this means that the crucial learning processes in TVET receive less attention (Deitmer & Heinemann 2009). The study further emphasizes that the rapid changes in the labor market prompted by development in technology and new knowledge could mean that there are challenges in the training, and education processes offered today may already be outdated, and yet this fact is not reviewed as the focus remains on the numbers employed. This approach has thus been critiqued based on the fact that the evaluation and measurement of processes in TVET need to be multifaceted (Liu & Clayton 2016). Hence, there is a need to balance the evaluation of both outcomes and process in the framework to be used for TVET.

Subsequent to the critique of outcomes, greater consideration was given to the need to evaluate the teaching and learning processes in TVET. The main reason for this is that TVET is education (Deitmer & Heinemann 2009); in other words, the sector must be forward-looking and cannot simply concentrate on producing graduates for today's labor market. While this approach addresses the challenge raised as it encompasses the skills development aspect—with a focus on the learner, the trainer, and the learning environment, among other factors—it is normally not part of the evaluation reports.

The present study seeks to provide relevant information and literature to satisfy this need to balance the evaluation of other significant factors in the framework that is being used for TVET. By looking at the challenges encountered in the implementation of TVET vis-a-vis twenty-first century-skills development, the study aims to recommend action and strategies to address the challenges towards developing skills for the tourism sector in the Philippines.

Specifically, this study does the following: (i) describes the TVET system and how it develops skills, focusing specifically on the TESDA Women's Center's tourism program, in terms of curriculum, program goals and objectives; instruction (teaching methodologies); learning environment (learning experiences); and assessment of learning outcomes; and (ii) discusses the challenges encountered in the implementation of TVET vis-a-vis twenty-first century skills development for the tourism sector.

2 Material and Methods

2.1 Research Design

The methodology used in the study is descriptive research with a combination of quantitative and qualitative methods of gathering data. This was done through a secondary data survey together with focus group discussions and questionnaires to obtain pertinent information from

the tourism program graduates of the TESDA Women's Center. Key Informant Interviews with administration and management personnel were also conducted.

2.2 Research Participants

Being one of the pioneer training centers providing quality TVET in the country, the TESDA Women's Center was deliberately selected to be the locale of the study. The purposeful sampling method was also used for the key informant interviews of the faculty and staff as well as the focus group discussions of the graduates of the training center. A total of three trainers participated in the KI interview and eight graduates participated in the focus group discussions.

2.3 Instrumentation

Focus group discussions (FGD) were employed to gather pertinent data from a set of tourism program graduates and a separate one for trainers of tourism-related programs. Key Informant interviews were conducted with the Supervising Technical Education and Skills Development Specialist and the Training Management Unit Head of TWC to discuss the process of the training from the perspective of the administration.

2.4 Data Analysis

The quantitative data collated in the study were analyzed using descriptive statistics, including frequency distribution and percentages computed based on the number of observations, to determine the program goals and objectives of the institution. On the other hand, the qualitative data gathered from the focus group discussions and key informant interviews were used to identify the challenges as well as recommend specific courses of action and strategies. Content analysis and comparisons from the answers of other stakeholders were used to provide meaningful description.

3 Results and Discussions

3.1 Curriculum, program goals and objectives

Unique curriculum. For TESDA, the competency-based curriculum of each program qualification is registered per institution. All curricula are based on the promulgated Training Regulations, but trainers and school heads are allowed to craft a unique curriculum subject to the approval of the district or provincial TESDA office upon registration.

Longer training duration. Comparison of the training duration per level of competency shows that the TESDA Women's Center's tourism sector programs have more hours versus the promulgated regulations. As per a key informant interview with the acting center chief, the reason for this is that "TWC includes a set of various Empowerment courses including: Trainees-Parents Orientation Program (TPOP), Gender Sensitivity Training (GST), Work

Ethic and Values Development (WEVD), Entrepreneurship Motivation Course (EMC) as well as the Job Orientation Program (JOP) in our curricula.” Comparison between the nominal duration per program and the actual duration used by TWC reveals that for Bartending NC II, the additional hours is 114, excluding the empowerment courses. For Bread and Pastry Production NC II, a total of 79 hours is added to the minimum required. Food and Beverage Services NC II shows the second highest number of additional hours among the four programs, with a total of 124 hours. Housekeeping NC II, on the other hand, stands with the highest number of additional hours at 164. This implies that trainees spend more time for the training at TWC as compared to other institutions that simply comply with the nominal duration set by TESDA. This also means that there could be ample time to develop other skills aside from core competencies when the training objectives are clear. What must also be considered is that there can only be a finite number of training batches in a year with more hours allotted to finish the program for a set of trainees.

The minimum number of training hours is 80, equivalent to 10 days, but can reach up to 160, depending on the program. It was also observed that while Bartending has no Supervised In-house Training, it makes up for this once the trainee decides to go on OJT with 200 to 300 training hours. Both Food and Beverage Services NC II and Housekeeping NC II fixed their OJT hours at 320, equivalent to 40 days. One of the graduates interviewed during the FGD expressed the importance of both the SIT and OJT, noting that, “As soon as we were on our On-the-Job Training at a hotel in Alabang, I was already able to apply as an on-call housekeeper at a hotel in Ortigas, which implies that I am ready (for employment). TWC really prepares a person for work.”

Focus on developing communication skills. Closer evaluation of the composition per level of units of competency reveal that while the hours at TESDA Women’s Center for core and elective competencies are lower, basic and common competencies like communication skills register an increase as compared to the nominal number of hours. A comparison of per program hours spent on basic competencies, which include the course subject Participate in Workplace Communication, shows that for Bartending NC II, an additional 66 hours were noted. It was the highest among the four Tourism programs under study. For Bread and Pastry Production NC II and Housekeeping NC II, a total of 50 hours had been added. Meanwhile, for Food and Beverage Services NC II, 54 hours were added. This meant that there were more opportunities given to the trainees in the sector to develop communication skills. This statement has been corroborated by the graduates themselves, with one pointing out during the focus group discussion that “When I first enrolled, I was very aloof to people. By the end of the training, I was able to develop my skills in speaking to anybody”.

These observations all imply that there are constraints to TWC’s objectives and program goals in executing their curricula for the Tourism Sector. Table 1 presents the difference in the breakdown of the nominal duration of TWC vis-à-vis the promulgated duration.

Table 1: **Breakdown of Nominal Duration and TWC Curriculum per program, 2019**

Program Qualification	Nominal Duration- TR					TWC Duration								
	Basic	Common	Core	Elective	Total	Basic	Common	Core	SIT/Elective	TPOP/GSTT	WEVD	EMC/JOP	Total	Difference
Bartending NC II	18	18	290	112	326	84	88	252	32					
Bread and Pastry Production NC II	18	18	105	-	141	68	40	112	-	32	16	16	220	+79
Food and Beverage Services NC II	18	18	320	-	356	72	88	176	80	32	16	16	480	+124
Housekeeping NC II	18	18	400	-	436	68	40	360	80	32	16	16	612	+164

Program objectives. The program objectives of the TESDA Women's Center have changed from time to time. In the past, as mentioned before, the main program goals, and objectives of the TESDA Women's Center, or any TESDA Technology Institution for that matter, were summarized in the acronym EGACE, which stands for the number of Enrolled, Graduated, Assessed, Certified and Employed. In terms of determining program objectives, the TESDA Women's Center affirms an individualized process wherein all trainees have the same objectives but there are specific ones for individuals who need one-on-one support (Bray & McClaskey 2014). The agency requires all registered institutions to upload their EGACE data on the T2MIS or the official management information system of TESDA. Since 2020, however, the program objectives have been modified and each qualification targets a particular number of trainees who will graduate and be certified by the end of the year, together with a qualitative description.

Tourism sector data. It is worth noting that for Bartending NC II, the number of enrolled, graduated, assessed, certified, and employed have all decreased sharply from 2016 to 2019. For Bread and Pastry NC II, records were available only for 2019 as the program has just been registered and implemented that year. There are high assessment and certification rates from those who graduated. However, there is a decline in the numbers of enrolled and graduated as well as those who were employed after getting certified. For Food and Beverage Services NC II, the number of EGACE increased from 2016 to 2019 with a sustained number of assessed after graduation. For Housekeeping NC II, on the other hand, the numbers of EGACE decreased between 2016 and 2019. The program has been able to maintain the number of certified among those who graduated and got assessed in 2016 up to 2019. For all programs, employment of certified workers has been low from 2016 to 2019.

3.2 Instruction

Variety in Training Methods. The TESDA Women's Center prides itself on implementing, as much as possible, the 10 principles of Competency Based Training or CBT. It does this through its wide array of training methods. The programs employ modular and individualized modes and TESDA Women's Center graduates appreciate that there are choices, with one of the participants in the FGD saying, "the in-house (Supervised In-House Training) helped me

in the work I am employed now, since everything I need to learn is there with the actual setting.”

Work-based training modes. The TESDA Women’s Center has also included two work-based training modes, apart from the Competency Based Training: the mandatory Supervised In-House Training (SIT) and the optional On the Job Training (OJT) . Since the Center has facilities for food preparation and catering, conference rooms, dormitories as well as its own innovation center and café, the Tourism Sector programs are able to include trainees in a workplace environment for Food and Beverage Services NC II, Bread and Pastry Production NC II, Housekeeping NC II, as well as Barista NC II and Cookery NC II trainees, without having to leave its premises.

3.3 Learning Environment

Training delivery methods. The most training delivery methods are: Lecture, Demonstration, Group Activities, Roleplays and Audio-visual presentations, which confirms that TWC does not adhere solely to individualized training. Only Food and Beverage Services NC II has case studies while both Bartending NC II and Food and Beverage Services NC II employ reports or presentations as well as exposure trips for their respective trainees. One of the trainers during the FGD attested to this observation, explaining that “we have industry tie-ups where there can be exposure and authentic learning in the industry, so I try to bring our trainees there.” The graduates were also aware of the different training delivery methods used in class, with some agreeing that “Hands-on demonstration has the most impact for us since the actual is different from the module”. They added that, “Practice allows me to do work as a process” and that “Roleplays are enjoyable, it simulates the actual work.”

3.4 Assessment of Learning Outcomes

Different assessment methods. Based on the FGD of trainers and validated by the graduates, the most common methods for assessment of learning outcomes by Tourism programs are Demonstration with Oral Questioning, Interview and Written Test. The former trainees interviewed during the FGD confirmed this, and even had preference for demos saying that “I like it when the demonstration is over and the trainer points out where to improve, it made me want to work on something better.” Portfolio assessment is only used for former graduates who wish to continue to another Tourism sector program. One of the trainers during the FGD noted that demonstrations and third-party reports are not employed by the sector in assessing trainees. She explained that:

“Third party reports or portfolios are also acceptable if the person is an industry practitioner. However, I have not yet encountered a trainee that has submitted such documents. The more common thing applicants say is that they have background, but no document is brought as evidence.”

It is also observed that the most commonly used assessment methods are all individually rated. Observation during work-based learning such as SIT or OJT, which involves groups, are not currently employed. Bray & McClaskey point out that individualized assessment of learning is an effective way to confirm what trainees know as it allows trainees to demonstrate that they have acquired the skills required in the curriculum apart from certifying their proficiency (Bray & McClaskey 2014). It was further observed during our study that core competencies are the focus during the National Assessment, while institutional assessment covers Basic, Common and Core competencies using the methods above at the end of every module. All assessments are divided into two categories: Competent or Not Yet Competent.

4 Challenges in the Implementation of TVET and Twenty-first Century Skills Development

It is important to state here that the challenges are examined through the lens of the outcomes of TVET.

4.1 Time-consuming procedures involving Competency-Based Training

Slow translation of training regulations to usable curricula. Based on the FGD with the trainers and seconded by the OIC Center Chief, TESDA recently distributed the promulgated Competency Standards for Basic Competencies with Twenty-first Century Skills in the last quarter of 2019. According to one trainer, “It is quite difficult to make immediate changes because there are ongoing competency standards review of TESDA and we are waiting for the promulgation of that as basis of the curriculum.”

The Competency Standards (CS) are now available for free on the official website of the agency. A thorough reading of these competencies reveals that some of the Units of Competency for National Certificate Level II, specifically Participate in Workplace Communication and Work in a Team Environment remain unchanged from what was already in place. The CS also contains new competencies such as Solve/Address General Workplace Problems, Develop Career and Life Decisions, Contribute to Workplace Innovation, Exercise Efficient and Effective Sustainable Practices in the Workplace, and Practice Entrepreneurial Skills in the Workplace. These are aligned with twenty-first century skills including the 4Cs. Performance criteria in each of these units of competency are still broad and will require specialized assessment methods. Another concern is that the objectives of EGACE on the national level do not explicitly include reporting of twenty-first century skills acquired during training (Brewer & Comyn 2015).

Developed curricula require validation. For the TESDA Women’s Center to make the CS usable, TESDA gives them a free hand to develop their own curriculum based on the CS (Brewer & Comyn 2015). This requires a substantial number of hours for trainers who work as developers as this implies revising the current curricula and using individualized learning principles to craft and align existing modules of instruction to accommodate the changes

aligned with twenty-first century skills. These revisions will have to undergo a validation process from industry stakeholders, all of which will take months to finish. A TESDA Women's Center trainer adds in this regard, "There is an initiative on my part to revise the basic competencies of TESDA Women's Center, but this will still be subject to validation, meaning that it is not yet implemented as of the moment."

Lack of Training Plans. Further inspection of the SIT mode reveals that although it is mandatory, respective Training Plans for each of the program qualifications have yet to be formulated. This means that the trainees who are assigned by the facilities' supervisors have not been reviewed and the trainer has not been consulted yet as to what kind of work must be performed or what competencies and learning outcomes the trainees need to accomplish. Graduates can attest that the work involved is needed for employment, however, there was no evidence found of an organized plan. There is evaluation at the end to determine whether the required number of hours has been met, but the center has yet to process the backlog of feedback. There was also no evidence of observation being used as an assessment method. As for the OJT mode, although there are forms for evaluation and process in place for endorsement and culmination, there is no training plan being utilized nor an assessment plan for supervised work-based learning.

4.2 Underutilized Work-based Training Delivery

Training hours are not maximized. One study confirms that there is little information on best practices regarding instructional approaches for twenty-first century skills (Soland 2014). The trainers agree on this issue, pointing out that to integrate the 4Cs in their training, time is of the essence. The trainer of Bread and Pastry Production cited an example, "We have 28 days for the whole duration, to develop and apply twenty-first century skills, the duration might not be enough."

However, one of the graduates said that she would like more hours in training rather than using it in extracurricular activities. This disconnect means that while there are more hours being registered for TWC's tourism courses, these are not being efficiently utilized to meet the needs of each individual trainee. Consequently, without any Training Plan provided to partner industry players, the Supervised In-house Training and On the Job Training hours are not optimized by TWC as avenues to incorporate development of 4Cs, specifically in creativity and collaboration. This is significant because a significant portion of the sample population scored below average to very low in the latter.

Lack of experts on twenty-first century skills. Another concern is that trainers admit they are not experts in teaching twenty-first century skills. One trainer noted during the FGD, "[We should be] at least we are of one level higher. Even if we read materials, when we are not given more awareness as to how we look at these skills, or workshops that will give us tools to develop these 4Cs in students, then we may not achieve the goal of developing these things. The concept of transferring these skills require staff to be trained as well. And because these skills are not simply lectured, the real-life approach must take place."

The acting center chief said to us during the key informant interview, “Only one representative has attended a twenty-first century skills-related training in the past two years and a re-echo seminar has been conducted to the rest of the trainers.” Brewer and Comyn (2015) state that public institutions receive capacity-building programs in the delivery and assessment of twenty-first century skills, but as to the effectiveness of cascading the program to all concerned personnel, the data is uncertain. This has implications for the trainers’ ability to master the topics and accurately balance the explicit and implicit learning outcomes in their training methods. This further means that trainers, like curriculum developers, need to develop and use a separate rubric to take on board twenty-first century skills.

CBT as passive learning. This has implications for developing twenty-first century skills such as creativity and collaboration, which are considered dynamic (Care et al. 2018). The results of the creativity and collaboration test in the initial research and in this study imply that TWC’s training delivery and curriculum need to be more dynamic and applicable in collaborative and creative contexts.

4.3 Uneven administrative processes to support twenty-first-century skills development

Delay in updating facilities and systems. The FGDs with the graduates make it evident that not all the facilities, tools and equipment for the Tourism sector are up to date with industry standards, nor are they readily available for use. The trainers noted a lag in the process related to renovation of classrooms. A backlog in feedback and the monitoring process of the institution was remarked upon as well. One trainer said, “That is one issue we have raised, because there was a time when after the evaluation, we the trainers are given a copy of the scores or results and we are asked to make an action plan based on it. However, that practice has stopped, and we are unaware now of the views of the trainees, what difficulties they are encountering that they are not able to say directly to us. I think it was two years ago when I last received a rating of the evaluation.”

Furthermore, there is an inadequate number of personnel engaged in administrative work (related to clearing backlog) as a result of which there are delays in taking corrective action relevant to meeting the needs of trainees, including trainers’ delivery and facilities improvement. The trainer also noted, “We already gave that feedback to the administration, but we also see that one person cannot do all that job immediately.”

The Key Informant Interview affirms these observations, noting that addressing the issue requires approval for additional funds. Both problems support the result of the research: TVET institutions need sufficient provisions of the right work base learning facilities to deliver effective and functional learning aligned with the twenty-first century workplace (Oviawe, Uwameiye, & Uddin 2017).

4.4 Underreported assessment of twenty-first century skills

Focus only on core competencies. As mentioned earlier, the National Assessment of TESDA is focused on the achievement of core competencies. The FGD reveals that trainers at the TESDA Women's Center are now encouraged to add twenty-first century skills into the competency assessment tools they use; however, this is limited to the institutional level. This confirms the research findings that there is an inconsistent and inadequate assessment process of twenty-first century skills in the country (Brewer & Comyn 2015).

Limited measurement tools. Another concern is the limitation of the rating system currently used by TESDA in all units of competency which are only two: Competent or Not Yet Competent. One trainer mentioned in this regard, "There are written tests yes, but as to a tool to measure the 4Cs, then there is none yet."

Given the complexity of measuring twenty-first century skills, there is a need to consider using assessment as part of learning with the help of a different set of evaluation instruments. Specifically, evaluations that enable group performance to gauge collaboration and employ creativity-rating rubrics are required (Hanover Research 2014). Lastly, trainers have yet to tap assessment methods for Supervised Industry Training (SIT) or On-the-Job Training (OJT) modes, including third party reporting and observation that can capture more application of skills. This requires industry participation and guidance, and a more open communication line with stakeholders.

5 Conclusions

Technical vocational education and training is effective for the development of core competency skills that are necessary for entry-level employment. Therefore, it requires adequate focus in research aimed at education management, akin to the research in basic and tertiary levels of education. Distance learning, online or blended learning, advanced information, and communication technology, as well as new ways of teaching and learning can all be part of research on TVET.

One of the main challenges in TVET is determining the optimal duration for the objectives and outcomes that are expected to be delivered. The time spent in training presents both opportunities and constraints that must be considered by all stakeholders – the trainees, the trainers, and the institution.

In order to achieve the stated outcomes and ensure that the program is aligned to delivering twenty-first century skills, a working feedback mechanism must be prioritized, including forms that need to be filled in and personnel to process the information being gathered. The work and outputs of the feedback mechanism would be essential not only for the trainees, but more importantly, for the trainers involved.

TVET institutions such as the TESDA Women's Center highlight the need for training plans that incorporate not only the classroom aspect, but also work-based learning. This means that

industry coordination and communication move beyond letters and memoranda of agreement and that there is continuous partnership and timely evaluation on both ends. Other recommendations made to the TESDA Women's Center based on this study include:

- The need to review the Institutional Development Plan of the TESDA Women's Center and include the results of this study in making the necessary adjustments in goals and activities.
- The training management unit should ensure alignment in the curriculum, instruction, and assessment with technical and twenty-first century skills through explicit programs and continuous monitoring.
- The Center Chief can direct initiatives on improving support systems that will further enhance the learning environment of the institution.
- The trainers should be committed to acquiring and delivering twenty-first century skills and collaborate more in developing programs towards this goal.

For other technical vocational institutions, the study determined that there is an urgent need to take a holistic perspective of the evaluation of current TVET outcomes as well as to introduce new methods to deliver twenty-first century skills.

- For curriculum developers, this study suggests embracing the new research findings on TVET and twenty-first century skills and incorporating new knowledge on both outcome and processes in the crafting of training programs that are not just current, but also forward thinking.
- The results from this research emphasize the value of feedback from all trainees of TWC and they are encouraged to provide information on the program implementation and evaluation, as well as administer graduate tracer studies to improve TWC's programs, processes, and policies.

TVET can be crucial in creating a skilled and resilient workforce for the tourism industry if it tackles the present challenges, encourages flexibility, and matches programs with industry demands. To fully utilize TVET in promoting the sustainable growth of the tourism industry, it is evident from our study that collaboration amongst stakeholders from all walks of life is essential.

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