Promotion of Research, Innovation, Greening and Digitalization in Kenyan TVET Institutions

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Presentation Outline

Introduction

Research and Innovations in TVET

Integration of Research, Innovation, Greening and Digitalization in TVET

Commercialization of Research and Innovations

Conclusion
1.0 Introduction

- TVET Authority is a state Corporation established under the TVET Act No. 29 of 2013 to regulate and coordinate TVET in Kenya through accreditation of institutions, programmes and trainers;
- The Authority was established to address the emerging reforms and trends in the labor market and the TVET subsector (Access, Relevance, Quality and Equity);
- Prior to its establishment, the regulation of TVET was fragmented between different line ministries and county governments.
In Kenya, TVET plays a vital role in provision of skilled workforce for the labour market and for self-employment.

The institutions offer programmes at different levels and examined by approved examining bodies (KNEC, NITA, KASNEB and accredited foreign examining bodies).

TVET institutions are classified into three broad categories, National Polytechnics (NPs), Technical and Vocational Colleges (TVCs) and Vocational Training Centres (VTCs).
Introduction (Achievements by TVETA)

- Improved perception of TVET by organizing and participating in awareness campaigns (Skills competitions, conferences, Shows);
- Licensed 6,806 trainers
- Accredited 2,340 TVET institutions (1087 VTCs, 1241 TVCs and 12 NPs)
- Periodic quality audit of the accredited institutions
- Approved 457 CBET curricula
- Developed training and regulatory standards
- Trained 300 TVET monitors and evaluators
Achievements by TVETA continued

- Established 18 collaborations and partnerships;
- Conducted nine research studies on TVET;
- Published two volumes of the Kenya Journal of TVET (KJ-TVET);
- Published four issues of TVET Magazine;
- Developed the Kenya TVET National Skills Gateway;
- Published National TVET Standards Kenya Report 2020;
2.0 Research and Innovations in TVET

- TVET has gained increased attention and popularity globally and plays a key role in provision of skilled workforce for sustainable development;
- The potential and impact of TVET on development, can be realized through continuous review of the curricula to address emerging technology;
- Research & innovation as well as commercialization of research findings and innovations can help in solving common problems facing societies and contribute to sustainable development;
Research and Innovations in TVET cont..

- Research & innovation should therefore be integrated in all TVET programs.
- The research in the Kenyan TVET subsector had for a long time been fragmented and even available data could not be readily traced;
- TVET also lacked a streamlined system for patenting innovations.
3.0 Integration of Research, Innovation, Greening and digitalization in TVET

- Research, Innovation and Greening is included as part of criteria for accreditation and quality assurance.
- Research and Innovations have also been promoted through STI mainstreaming that was introduced in the FY 2021/2022 as National Government PC indicator in performance contracting for all public TVET institutions.
- TVETTA has developed ODeL standards to provide clear guidelines for online training.
Integration of Research, Innovation, Greening and digitalization in TVET Continued

- A training and digital content development centre (Prof Kanwar) has been established at KTTC to build capacity of trainers on online and blended learning techniques;
- TVET Authority is working closely with stakeholders to establish a central TVET data repository to mitigate duplication and provide easy access to data for decision making and policy formulation;
- Annual publication of KJ-TVET is promoting research in TVET and providing platform for knowledge sharing on TVET research findings.
Integration of Research, Innovation and Greening in TVET Continued

- Plans are in place to synthesize and translate research findings in KJ-TVET to improve dissemination and commercialization
- Other Initiatives used to promote research and innovation in TVET include:
  - Robotic contests and TVET fairs
  - Africa Tech Challenge (takes form of a training program and competition - most outstanding participants get full scholarships to prestigious Chinese universities
  - WSI competition
4.0 Commercialization of Research and Innovations

- A significant number of TVET Institutions have established commercial/production units and incubation centres which provide avenues for commercializing research and innovations.
- Commercialization of research findings and innovations is still generally weak due to lack of national framework on commercialization.
- KeNIA which is mandated to promote innovation and enterprise development from research ideas is offering support.
5.0 Challenges in promotion of research, Innovation, Greening and Digitalization in TVET Institutions

- Limited funding/fundable ideas;
- Relatively high initial capital required for setting up some greening projects;
- Low capacity of trainers to effectively coordinate and participate in research, innovation and ODeL (Lack of online training content for some courses);
- High cost of internet bundles;
- Poor internet infrastructure and lack of electricity in some parts of the country;
6.0 Conclusion

- Although remarkable progress has been made in promoting Research, Innovations and Greening in TVET, gaps still exist in commercialization of research findings, innovations and digitalization (uptake of online training);
- Capacity building and increased funding can enhance digitalization and translation of research findings and innovations into actual products (KeNIA to offer the support);
- Development of National policy on commercialization and collaboration with industry should be expedited to promote industry-initiated research.
THANK YOU