DIGITAL TRANSFORMATION, A BIHC Experience

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BILT Bridging Event
Going green and digital: TVET for hospitality and tourism
7th-9th November 2012
OVERVIEW OF THE PRESENTATION

- BIHC Background
- Overview of the Digital Transformation in Kenya
- BIHC Digitalization
- Opportunities & Challenges
- Future Digital Transformation Greening, entrepreneurship and migration in Hospitality and Tourism
BIHC Background

- Established in 2015, the Boma International Hospitality College (BIHC) is a centre of excellence TVET Institution accredited by The Technical and Vocational Education and Training Authority Kenya (TVETA), which has revolutionised hospitality education in Kenya and the region. In July 2022, the TVETA board approved BIHC application for accreditation to the first Private National Polytechnic in Kenya.

- BIHC has achieved key milestones: ISO 9001:2015 Certification awarded by SGS Kenya Ltd; Centre of Excellence in Hospitality and Culinary Arts Training awarded by TVETA; and Prior Learning Assessment And Recognition (PLAR)-Application stage

- BIHC students have won several international competitions: Young Chef Olympiad 2020, 2021 and 2022; EuroCHRIE University Challenge 2021; top Culinary Institution Cookery Zone; M.I.C.E Academic Institution of the Year Award for 2019. WorldSkills Africa 2022 competitions, Namibia.
OVERVIEW OF Digitalisation in Kenya

Key issues from various Reports

- Most youth are not attracted to reading traditional books and are always on the move accessing everything anywhere.

- “With the emergence of less costly gadgets/devices that can access internet, the youth can learn on the move.

- TVET institutions suffer from a lack of infrastructure and equipment

- TVETs have outdated and rigid curricula not addressing Emerging Skills in Demand

- Digital competence of teachers and trainers will continue to be a key limiting factor

- Digital Transformation in TVET increases dramatically in cost with increases in the complexity and sophistication of the offering.

- We document BIHC journey to Digitalization to enhance students experiences.
BACKGROUND & OVERVIEW OF BIHC ICT SYSTEMS

BIHC was established in May 2015 to address the shortage of hospitality professionals in the market both locally and regionally.

The 1st intake the college enrolled 36 students on a 2-year diploma program.

Simple tools were used to manage students' records such as Ms Excel and Ms Word which were then directly saved on computers.

Overtime, the college intake has had an upward trend that brought obvious data management issues that required investing in systems.

Over the last 3 years, the College started to improve on its systems to enable proper management of students data and ensure efficiency in delivering services. Among the systems the college has been able to onboard include:

DIGITAL TRANSFORMATION, A BIHC Experience
OVERVIEW OF BIHC CORE TECHNOLOGIES

- **E.R.P**
  - Enterprise Resource Planning (Unisol)

- **L.M.S**
  - Learning Management System (Moodle)

- **M.I.S**
  - Management Information System (Unisol)

- **C.R.M**
  - Customer Relationship & Support (Unisol & Freshdesk)

- **Ms Nav**
  - Enterprise Resource Planning (Ms Dynamics)

- **Calc**
  - Recipe & Menu Management (EGS Calcmenu)

- **RevSim**
  - Hotels Revenue Simulator

DIGITAL TRANSFORMATION, A BIHC Experience
DIGITAL TRANSFORMATION OF
STUDENTS ORIENTATION & INDUCTION

- An induction programme a training deployed to welcome new students to the college and prepare them for their new journey.

- Admitting students across the globe, the solution lies in adapting to technologically advanced methods to cater to the tech-driven students of today.

- TVETs must advance from traditional methodologies of PowerPoint Presentations to creating interactive and enlightening induction programs.

- Engaging the new students in activities that urge them to explore their new training facilities; arm them with simple tools and technologies like tablets, customised learning software and go digital with induction gaming.

- With the deployment of a standardized digital learning program, TVET institutions can ensure that new students joining across locations get uniform induction experience.
1. BIHC Library KOHA—Library management system, MYLOFT—A single app offsite Access, Dspace (Institutional Repository) and Calibre is a cross-platform free and open-source suite of e-book software

2. KLISC’s membership—A number of processes have been digitized through KLISC’s membership.

3. Through KLISC membership, BIHC has access to 34 databases. MY LOFT,

<table>
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<th>Database</th>
<th>Usage Statistics</th>
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We split the videos up between all culinary faculty and each member of faculty would film videos which were relevant to their subjects.

Within two weeks we had shot, edited and produced about 50 tutorial videos lasting from 10-20 minutes long full of infographics and interesting narration from the course lecturers.

Since 2020 March, BIHC has adopted Blended learning including our Practical Culinary Arts lessons.

For a few years, we have been delivering certain parts of the culinary curriculum via videos on Moodle to different groups and this has always worked well.

Much of the course was pre-recorded, so it was handy to be able to press pause and replay.

We encouraged the students to make the dishes at home and send in photos so the rest of the students could see and critique them.

The videos are still out there on youtube so anyone can check them out and try and use them.
Digital Transformation in Placement & Career Services (OCS) - Virtual Career Forums

- Technology ushers in fundamental structural changes that can be integral to achieving significant improvements in linking students to the industry.
- At BIHC we leverage on technology to support different processes involved in students internship placement cycle through the use of a placement portal.
- These range from initiating the process of application for internship, approvals for internship, assessments, reports and grading.
- At BIHC we have also leveraged on information technology to conduct career forums and industry experts talks that are aimed at augmenting classrooms learning.
- These approaches have tilted our modus operandi and hence placement services are not bound by barriers of distance and space.
- Placement Portal Features include:
DIGITAL TRANSFORMATION IN HUMAN RESOURCE MANAGEMENT SYSTEMS

- BIHC has transformed its recruitment strategy and uses Jazz HR as an Applicant Tracking System. We have adopted use of HR Jazz when advertising to up to including screening and selection to quicken our visibility to prospective applicants.

- HR Portal - Navision System - The Leave and absence workspace provides a flexible framework for creating new leave plans. It also provides workflows for managing requests and an intuitive self-service page for employees to request time off. Analytics helps the organization measure and monitor leave balances and usage for all leave plans.

- PayRoll - Navision: BIHC has embraced the system as it enables the HR Office to keep detailed records of employees. We are able to register and maintain employee information & Biodata, such as employment contracts, confidential information (Age, gender, ID No. PIN), qualifications, and employee contacts.

- Modern automated time and attendance systems at BIHC will require employees to touch or swipe to identify themselves and record their working hours as they enter or leave the work area.
The college started in 2015 and all the systems were excel based, both the budgets, Profit and Loss accounts, Balance sheets.

In 2017 the school invested in an ERP system that support both:
- Finance functions
- Payroll functions
- Stores and inventory and
- Procurement.

Accessing banks and carrying out all relevant financial transactions online; suppliers payments, payroll and receipting.
To minimize on risks, BIHC came up with a zero cash policy and implemented both Mpesa and other online payments, all staff or 3rd parties are paid via Mpesa or bank.

For accurate and real time records BIHC integrated the ERP system with the banks. A transaction in the bank is automatically posted in the ERP.

New system covers both Student management, registration, self invoicing, receipting academic modules.
Quality Assurance for BIHC is an endeavor whose ultimate intention is to ensure that the institution meets stakeholder and regulatory as well as statutory requirements. BIHC being a TVET Institution means that it must align with the national aspirations of the country thus must conform to TVETA requirements once of which is establishment of robust management systems including quality assurance.

- Lecturer Progress Forms
- Stakeholder experience surveys
- Class attendance sheets
- Data analysis and presentation including sharing with key persons
DUAL TRANSITION: DIGITALISATION AND GREENING AT BIHC: SUSTAINABLE COOKING PRACTICES.

- The culinary world is in constant evolution; technology is affecting how we grow, produce and deliver food.
- BIHC is Implementing sustainable practices and cooking, through consistent attentiveness to zero wastage.
- To address sustainability, BIHC has adopted initiatives such as Farm to Folk (F2F), digital practical culinary arts classes and greening initiatives-Gathiru tea Estate.
- The initiatives to promote local farms as well as reinforce BIHC commitment to sustainability and sustainable cooking practices.
- A modern culinary school should shape and develop the mindset of aspiring chefs towards sustainability.
Recent project Research

Some of emerging roles identified include: Digital Marketers, Safety and Health Swimming Pool Attendants / Cleaners;

Multidisciplinary Artist - Calligraphist, painters; Qualified Babysitter; Hotel Animator - (an entertainer who keeps the tourists busy); Acrobatics / Dancers; Valet parking;

Hotel Artisan - (Plumber, Electrician, Carpenter, hotel painter); Interior Designer; Beauticians; Massage Therapists / SPA operators/yoga therapist; Fitness Instructors / Gym instructors; Dance Instructors; Event Decorators; Food Delivery guys; Audio-Visual Technicians

There is huge employment opportunities in SMEs and MSMES in Hospitality and tourism industry
Swahilipot Hub Foundation working with the Global Opportunity Youth Network (GOYN) Seeks to catalyze opportunities therein demonstrating how hospitality sector that employs approximately 10% of its workforce can create a pipeline for the 373,000 NEETs in Mombasa.

BIHC is the training and Placement Partner using Dual Vocational Apprentice Approach (70% of the training is takes place at the industry training and placement partner—30% specialized theoretical knowledge)

PILOT

a) Hotel Animation & Recreation Studies (30 students)-Hotels
b) Certified mixologists and certified barista (25 students)-Java
c) Kitchen Stewarding Operations & Management (25 students) Java
DUAL TRANSITION: DIGITALISATION AT BIHC: OPPORTUNITIES

- Digitalisation and enhanced Student Experiences (*Independent learning, Catering to various student types, Customised learning applications, Maintains learners’ focus*).
- Digitation and benefits to Finance, Administration & HR internal processes
- Practical Culinary Arts in the digital age (*pace the instructions, 40% digital and 60% hands-on is the right balance, The impact of digital technologies, need to harness the best of both the digital and hands-on approaches*)
- Future in Modern Online culinary arts in Africa (*Proliferation of online courses, Online Culinary Schools, Recognition of prior learning frameworks*)

Click this link for more information on Opportunities & Challenges
DUAL TRANSITION: DIGITALISATION AT BIHC: CHALLENGES

- People are used to the status quo - lack of user acceptance
- A lack of a clear strategy or direction for the digital adoption
- Incomplete knowledge of the skills needed to achieve meaningful digital adoption
- Unclear data pictures for the institution
- The capability of existing systems
- The Cost of Acquisition, renewal of licences and maintenance
- After sale IT support after deployment Shared digital resources; May-be
- Digitalisation and data protection issues

Click this link for more information on Opportunities & Challenges
Conclusion

- TVET institutions need to capture the attention of the majority youth through “online interactivity”.
- Digitalisation hold the most potential for transformation of the TVET sector
- There is need for deliberate and joint efforts and strategies for digital transformation in TVETS in Kenya
- BIHC experience project demonstrate the practical use of different technologies in not only enhancing student experience but also streamline internal processes to achieve greening and sustainability in the long term
- There need for increased documentation of programmes/projects in hospitality and tourism to inform digital transformation in TVETS