ANNUAL
REPORT OF PROGRAM DATA
2022

UNIVERSITY *of* HAWAI'I
MAUI
COMMUNITY COLLEGE

Academic Support Services
Technology Resources

1. Program or Unit Description

Mission

The mission of the Information Technology (IT) department is to assist faculty and staff in the advancement of knowledge through the use of technology and to make available such technological tools that serve to promote the mission of the college.

Vision

The overall vision of IT is to develop, maintain and expand state of the art technologies to provide a learning environment that enables faculty, staff and students the opportunity to develop knowledge and skills to succeed in the 21st century and beyond.

Description

IT is a service-oriented department that plays a critical role in support of the daily operations of the college by providing high quality technical services. IT plans, obtains funding, acquires, installs, and supports the necessary technological tools and resources for education, training, and the use of technology for instructional, academic, and administrative support for the college on the Kahului campus and its Outreach centers in Hāna and Lahaina, and on Molokaʻi and Lānaʻi.

IT is located in the Kaʻaʻike Building, the central hub for the college's telecommunications network, integrating a broad range of computing, multimedia, and telecommunication technologies. The department is subdivided into Computing Services, Media Services, and Instructional Design. Each of these units work in partnership to deliver the utmost in quality customer service, training, support, and assistance. The IT team is composed of dedicated staff (figure 1) who make certain that campus technology runs smoothly.

The target student or service populations include face to face and distance learning students and faculty, the administration, the staff, other government agencies, and the community.

Computing Services supports:
- hardware
- software
- peripherals
- servers
- networks (ethernet and wifi)
- cybersecurity
- UHMC website
- VoIP (telephony)
- UHMC Help Desk
- Banner data requests
- Systems integration and design
- Custom developed software solutions

Media Services supports:
- distance learning
- audio visual (AV) services
- electronics
- AV production
- digital asset management
- closed captioning
- copyright assistance
- duplication
- instructional design services
- training

Instructional Design supports:
- faculty, staff, and students
- distance learning
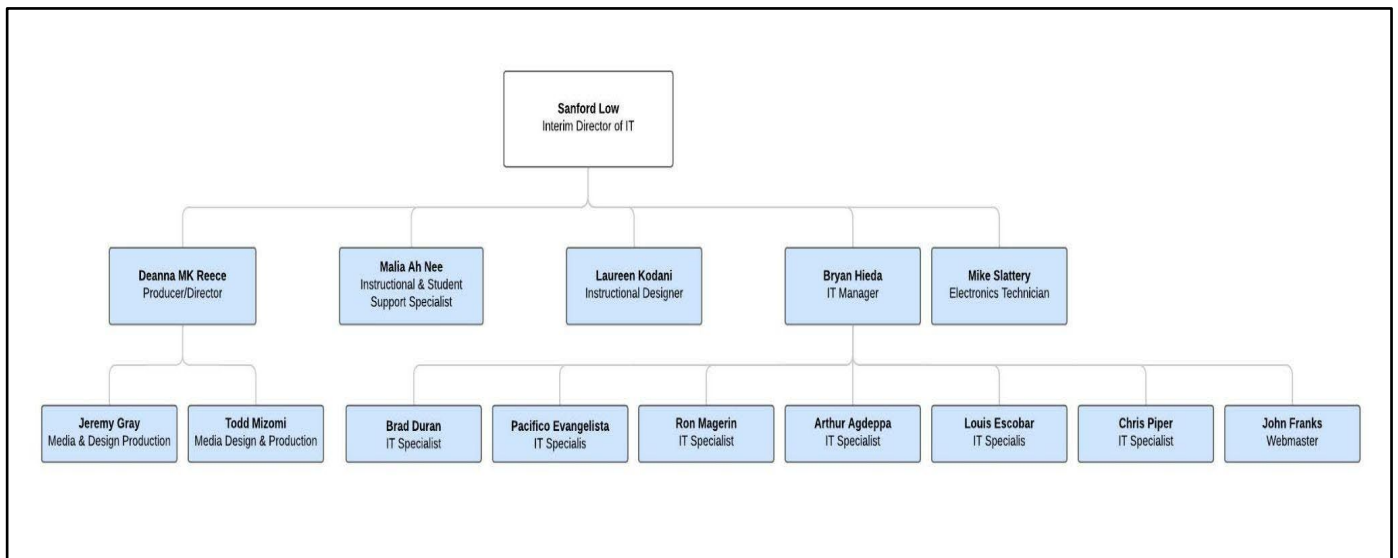- instructional design
- classroom instruction
- training

Figure 1UHMC IT Organization Chart

2. Analysis of the Program/Unit

IT is tasked with providing a wide variety of academic and institutional support services. These services are organized into thirteen major categories:

1. **Provide, install, service and assess computer and peripheral equipment**
   Computer and peripheral equipment and support services for classrooms, labs, faculty and staff offices.

2. **Provide, install, assess and service audio/visual equipment**
   Audio/visual equipment and support services for classrooms, labs, and special events.

3. **Provide and maintain campus network services**
   Wired and wireless internet access, VoIP services.

4. **Provide technical and production services for classroom instruction and distance learning (DL)**
   Technical and instructional support for course instruction taught via face to face and DL.

5. **Provide technical and production services for the campus and administration**
   Audio/video production support for campus programs to support marketing and the administration.

6. **Provide printing, photocopying and duplicating services and a faculty/staff work room**
   Duplication, printing, desktop publishing, laminating, velo-binding, graphic arts services, including catalog and schedule of classes development.

7. **Provide website design, development and support for UHMC homepage**
   Content development, design and consultation services, miscellaneous external website support, video streaming support, workshops, training and marketing services.

8. **Provide Help Desk operations and support services**
   Computer and multimedia troubleshooting and repair services for faculty, staff, and students**.**

9. **Provide orientation and training for multimedia and computing technology**
   Computing technology support and multimedia design services for course instruction, program development, and content creation.

10. **Respond to programmatic and management Banner data request**
    Provides programs and executive management with customized Banner student data requests. Implements and enforces distribution and access to data in a manner consistent with UH data integrity and security standards.

11. **Provides IT systems integration design and support for college**
    Works with college departments and programs to assess programmatic technical needs. Helps to select, deploy, and support customized IT systems to ensure needs of campus are met.

12. Provide customized software solutions and support for college
Works with college departments and programs to assess, design, deploy, and support customized software requirements. Services include off the shelf software customizations, augmentation, or in-house software development services.

Table 1 - Quantitative Indicators of UHMC IT Department

Indicator	AY 19-20	AY 20-21	AY 21-22
Demand			
Campus Student Headcount			
Annual Unduplicated	3,740	3,612	3,333
Fall	2,992	2,936	2,724
Spring	2,746	2,628	2,283
FTE faculty	119	109	98
FTE staff	166	162	153
FTE Student	1,497	1,393	1,214
Efficiency			
Operation hours per week	65	60	55
Student hire hours per week	57	40	40
Casual hire hours per week	19	0	0
Completed Work Requests (via OS ticket, email, phone and f2f)			
Computing	1341	1319	1678
Engineering/AV (total #) Workorders Other Equipment Installs, Design & Consultation	1,683	298 280 8 Zoom room installs see narrative	610 500 see narrative
Instructional Design (indicates total #) Number of Appointments Workshops/Webinars Delivered	536 478 58	446 380 66	303 263 40
Number of copies generated	26,486	2,671	59,230

Indicator	AY 19-20	AY 20-21	AY 21-22
Media Production (total hours)	2,924	1,450	3294
DL/Cable/Videoconferencing (total hours)	3,672	broken out below	broken out below
Video Production	-	-	595
Cable Course Production & Support	-	2,080	728
Zoom Hosting	-	200	577
Tech Classroom, Event AV, & Online Tech Support	-	1,020	707
Production & Zoom Host Planning	-	150	167
Closed Caption Services	-	1,790	520
Number of Instructional Computers (Kahului and Outreach Centers)	1,975	1,451	1451
Number of Virtual Desktop Infrastructure (VDI) Accounts	-	266	266

Quantitative Indicators

Table 1 shows the continued trend in decrease in enrollment, faculty, and staff. As the pandemic has eased and some sense of normalcy has slowly been returning, the campus hadn't completely re-opened to pre-pandemic numbers. In addition to more online course offerings than before the pandemic, faculty and staff continued to work remotely part-time.

Computing work orders increased slightly due to the partial return of faculty, staff and students back to campus. The amount of phone calls and email requests for remote requests continued. As faculty, staff and students returned to campus on-site requests increased. During the time the campus was shut down, the IT department used the time to upgrade classroom technology. Including older projectors were replaced with newer interactive and regular TV monitors and video cameras for interactive Zoom classes, which required some assistance from staff to get faculty acquainted with the new technology.

The Senior Engineer position continues to not be replaced. The lone Electronic Technician continues to take on not only the Senior Engineer's responsibilities, but also his own duties. The remaining technician responsibilities include installing, repairing, troubleshooting, and maintaining all of the audio video equipment for the main campus in Kahului and the remote Education Centers. In addition to his responsibilities, he continues to pick up the duties of the Senior Engineer; consulting, designing, and procuring most of the electronic equipment for the campus, not including computers. He also needs to receive, test, inventory, store and install all of the equipment ordered, which included over 600 pieces of equipment ordered from TechFee purchases.

With the campus not fully open for in-person classes for much of the year, the Media department continued to support cable classes, Zoom classes, hybrid events and various productions. Given that the Electronic Tech is now the only staff in the engineering area of Media, other staff have stepped in to assist with equipment installs and AV support for both regular classrooms and campus events.

Spring 2022 saw the completion of the installs of different Zoom Ready Rooms and the switch from Polycom based video conferencing rooms which were the former HITS/Skybridge classrooms. As more meetings and classes began to be scheduled in these rooms, other services had to be reduced due to the demands on the limited staff. More classes and meetings continue to be added which requires specific support from staff to operate the tech in the rooms and to train and be on standby for the independent Zoom Ready Rooms located in various buildings on campus.

With the upgrading of some of the classrooms to Zoom Ready Classrooms, the Media department has included the support and training of the classrooms as part of their services for the campus. As faculty have been getting accustomed to the classrooms, the media staff have been providing training and on-hand support to the faculty.

The continual decline in individual instructional design request is not an indication that the Instructional Designer is not an important position for the campus. The numbers are a reflection of her outstanding work over the last few years training faculty and staff with not only online pedagogy but also use of different software applications.

The Instructional Designer also continues to have Mixed Plate and Zoom Cafe series, allowing faculty and staff to drop into Zoom "Office Hours" in a group setting. During these sessions groups of faculty and staff are able to ask questions and learn from each other.

The Instructional Designer has also continued to work with other Instructional Designers across the University of Hawaii College system. Some of the professional development opportunities the Instructional Developer collaborated with other Instructional Developers include:

- Course Planning for Active Learning
  - Two-week online asynchronous course for faculty to create a detailed plan for active learning that aligns with course learning outcomes
- The 8 Habits for Highly Accessible Course Content
  - Synchronous and asynchronous course learning about the laws and rules of course accessibility
- Excellence in Education Day
  - In addition to designing and developing materials for presenters and facilitators, the Instructional Designer Facilitated Zoom scheduling, coordinated tech support, presented, and facilitated sessions
- Level-Up Laulima
  - Asynchronous course exploring updates to Laulima and providing tips and tricks to improve Laulima's learning space

Collaborating with colleagues from other campuses provided the Instructional Designer other colleagues in their expertise, online learning. The Instructional Designer at UHMC is in a unique position as the lone person supporting an entire campus while other campuses have a team of distance learning support staff.

Strengths

The major strength of the IT department is its people. The department supports all of UH Maui College, including the remote Education Centers, and all the units of the college including administrative affairs, student affairs, and academic affairs.

The staff are extremely dedicated to the campus and will go the extra mile to ensure that the technology needs of the faculty, staff, students, and administration are met. This includes both the credit and the non-credit programs. Staff will arrive early, stay late, work double shifts and even come in on weekends to ensure that the campus networks are up and running and DL and face to face classes are covered and receive needed support. There is no price that can be put on this kind of commitment.

Areas to Improve

Technology continues to be an important component of the campus. There is a continual need to upgrade, maintain, and repair computer hardware and software, and AV equipment. Adapting to the changing business models of software and hardware companies is a challenge. Companies have been switching to a subscription type of service which will continue to have an impact on how the campus budgets for certain software and hardware. The department continues to implement technology, such as virtual labs, to improve the administration and decrease the cost of administration of hardware and software.

The demand for distance learning continues to grow. Programs are being accredited to provide degrees that can be attained fully online. The department will continue to support the growth and provide assistance to ensure faculty and students are successful.

3. Unit/Service Outcomes

- Added a few more external access points around campus
- Worked with contractor to resign the network reconfiguration spaces of Maui Food Innovation Center and eSports area
- Designed and developed a web base, self-serve, Vlab account management system enabling students to gain access to Vlab on their own.
- Upgrades PC in Kaa 217 and reconfigured computers in media lab Kaa 218
- Upgraded Nutanix hypervisor and Citrix brokers providing enhancements and more compute resources to better Vlab experience.
- Updated open source Pandora network / system monitor which helps detect critical system and network failure before they are reported.

Table 2 - Instructional Design Webinars, Presentations and Virtual Workshops

Webinar/Presentation/Virtual Workshop	Qty	Notes
Laulima Workshops	5	Open lab workshops at the start of each semester.
Laulima Upgrade to v20	1	With colleagues from other campuses to review the latest updates and provided a resource highlighting recent changes.
Zoom Café	15	Zoom Café is an open, informal, and collaborative workshop for all faculty and staff. Get personalized support at your need level. We

Webinar/Presentation/Virtual Workshop	Qty	Notes
		cover learning technology, andragogy, pedagogy, teaching tips, course design, and more. Need help with teaching strategies, Laulima, Zoom, Google apps, and more? Join us to learn, teach, share, test an educational tool, or hang out. Stop by for as little or as much time as you need.
Mixed Plate PD Series	7	A variety of focused topics. View the resource document for details.
Digital Accessibility	4	Share the UHMC Digital Accessibility Cheat Sheet and covered the 8 essentials of digital accessibility Including one webinar for UHOIC Unconference Event
Create Interactive Learning (RSI)	2	Covered DE versus correspondence course, definition of RSI, how to implement RSI, share ideas
Visual Design Principles	1	Share design principles for faculty participating in the UH 5- and 8-Week Online PD
Creating Your Electronic Dossier (Organization)	2	Co-presented with other UHCC faculty
Aloha E PD	1	Invited to be a Guest Speaker about Active Learning
Work Smarter (Not Harder) with Google series	2	Fall - Docs Spring - Slides

Support and Consultation

Support and consultation online or by phone were provided for the following:
- Instructional and course design
- Laulima
- Basic Computing Skills
- Google Suite (e.g., Drive, Docs, Slides, Mail, Calendar, Keep, Tasks, YouTube)
- Video Conferencing (Zoom, Google Hangout, etc.)
- Learning Technology
    - Animated Video/Presentation (e.g., Powtoon)
    - Gamification (e.g., Kahoot!, Quizlet)
    - Google Suite (e.g., Drive, Docs, Slides, Mail, Calendar, Keep, Tasks, YouTube)

- ○ Interactive multimedia (e.g., Thinglink)
- ○ Learning Management System (e.g., Laulima)
- ○ Online Engagement (e.g., FlipGrid, Padlet, EdPuzzle)
- ○ Online Learning Platforms (e.g., Pearson MyLabs)
- ○ Video Conferencing (e.g., Zoom, Google Hangout/Meet)
- ○ OER (e.g., search, find, course design)
- ○ Polling (e.g., Slido, Zoom)
- ○ Screencasting (e.g., Loom, Zoom)
- ○ Whiteboard (e.g., Zoom, GoBoard, Google Jamboard)
- Software applications (Microsoft Office, Adobe Creative Cloud, etc.)
- Graphics (e.g., Photoshop, Canva, PowerPoint)
- OER
- ADA
- Creative Commons
- Distance and Online Learning and Teaching (Distance Education)
- Webpage and Presentation Design
- Pedagogy/Andragogy
- Learning Theories and Strategies

Table 3 - Instructional Design Support and Consultation

Support /Consultation	Qty	Notes
Scheduled Appointments	29	The average appointment is 15 mins to 1 hour 30 mins
Unscheduled	~approximate average 234	Approx average 2-7 per week; 15 mins to 1 hour

4. Action Plan

The UHMC Technology Plan addresses a range of technology and services on campus. Some of these projects were started in earlier years and are still active. All action plans meet the College's Mission and Strategic Plan in moving the College forward.
- Maintain and upgrade the campus's Virtual Desktop System
- Work with administration and security to upgrade the security cameras and access controls to the buildings and classrooms
- Provide more comprehensive training for Zoom rooms for faculty, staff and administrators
- Provide tech support for Zoom rooms for community users
- Provide workshops and professional development opportunities for faculty and staff
- Provide training for distance learning
- Work with academic, student and administrative support units

5. Resource Implications

UHMC needs to continue to keep up with the advancement of technology. Although there have been some equipment upgrades and replacements, there will continually need to be upgrades and replacements.

The transition to Zoom has not decreased the need for video production support and training. Not only has there been an increase in the need for support for Zoom, but there continues to be a demand for video and audio content from the entire campus, not only instruction. There is also a high demand for distance learning services with the increase in demand for online learning.

The Information Technology and Audio Video department support is not limited to just instructional support. The department is responsible for supporting all of the UHMC campuses, including the remote education centers (Molokai, Lanai, and Hana) and remote learning. To continue to provide a high level of technical support for the ever-changing needs of our campus and the community. In order to assist us in this, IT is requesting:

- a full-time Media Design & Production Band B position to assist with additional requests for video production and instructional design support

- a full-time Instructional Designer Band B due to the increasing number of programs providing fully online degrees. As more degrees are being offered fully online, there is a need for more support and training of students and faculty..

- the filling of the Senior AV Engineer position to meet the demand of AV maintenance, installation, and repair. Without this position, we will have to, on occasion, reassign other personnel to assist with electronic tech and engineer duties, both in AV, which is specialized.

- Additional funding to cover upgraded instructor and student computers for classrooms, AV upgrades in classrooms, updates to the campus wifi network to allow for continued growth and purchasing software licenses to ensure network functionality and security.