PROGRAM REVIEW

IT DEPARTMENT
Academic Year 2016

Program Review for the UHMC IT Department AY2016

I.   OVERVIEW – Information Technology Department (IT)

Mission Statement: The mission of the 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.

Description: IT is a service-oriented department that provides high quality technical services in support of the daily operation of the college. IT plans, obtains funding, acquires, installs and supports the necessary technological tools and resources for the education, training, and use of technology for instructional, academic, and administrative support for the college's tri-island community.

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. Functions include Distance Learning (DL) services, campus-wide audio visual support, telecommunications and electronics installation and repair, computing hardware and software management, network infrastructure and internet access support, computer and peripheral installation and repair, website development and consultation services, computer programming support, server and maintenance support, video and television production services, digital asset management services, video encoding and ingest/playout services, duplication and graphic arts services, VoIP telecommunications management, and institutional research support. Additional functions include instructional and consultation services for computer hardware and software, electronic multi-media, instructional design services, and training and information technology implementation services for curriculum and program development.

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.

II.   MEASUREMENTS OF THE UNIT

Organization

IT is tasked with providing a wide variety of Academic and Institutional Support services. These services are organized into nine 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.

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

4. Provide technical and production services for Distant Education (DE)
Technical and instructional support for course instruction taught via DE.

5. Provide graphics and marketing support, printing, photocopying and duplication services and a faculty/staff work room
Duplication, printing, desktop publishing, laminating, velo-binding, graphic arts services, including catalog and schedule of classes development, informational and marketing publications and other promotional activities.

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

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

8. Provide orientation and training for multimedia and computing technology
Computing technology support and multi-media design services for course instruction, program development and content creation.

9. Provide marketing support services for the college's programs
Technology and consultation services to assist with program information dissemination and overall college marketing and advertising.

Quantitative Indicators – AY 2016

Demand

1. *Campus Enrollment* (Fall/Spring)
   Fall 2016: 3,342
   Spring 2017: 2,919

2. *Number of Faculty (FTE)*
   170

3. *Number of Staff (FTE)*
   128

Efficiency

4. *Hours of Operation*
   70.0 hours per week
   Monday through Thursday: 7:30am - 10:00pm
   Friday: 7:30am – 7:30pm

5. *Staff in Unit*
   16 FTE
Mike Albert	VCIT (Administration)
Arthur Agdeppa	IT Specialist (APT)
Malia Ah Nee	IT Specialist (APT)
Marc Antosch	Media Design & Production (APT)
Reuben Dela Cruz	Research Support (APT)
Brad Duran	IT Specialist (APT)
Louis Escobar	IT Specialist (APT)
Pacifico Evangelista	IT Specialist (APT)
Jeremy Gray	Media Design & Production (APT)
John Franks	IT Specialist (APT)
Bryan Hieda	IT Specialist (APT)
Ron Magarin	IT Specialist (APT)
Todd Mizomi	Media Design & Production (APT)
Chris Pieper	IT Specialist (APT)
Deanna Reece	Media Design & Production (APT)
Mike Slattery	Research Support (APT)

6. *Student Worker Hours*
   Fall 2016: 48 hrs per week
   Spring 2017: 67 hrs per week

7. *Number of work orders completed*
   Duplication Services – AY 2016
   Approximately 8 submitted and completed

   Graphic Arts Services – AY 2016
   Approximately 182 submitted and completed

   Engineering/Audio-Visual Services – AY 2016
   Approximately 1,712 submitted and completed

   Computing Services – AY 2016
   Approximately 1,006 submitted and completed

8. *Number of copies generated per year*
   370,058

9. *Total hours of DE/Cable/Videoconference programming – AY 2016*
   Summer/Fall 2016: 2,696 hrs
   Spring/Summer 2017: 2,949 hrs
   Total DE/Cable/Videoconference hours – AY 2016: 5,645 hrs

10. *Total hours of Media Production Services – AY 2016*
    349 hours

11. *Department Budget*
    Media -
    　　　　Total Budget: $392,266
    　　　　Salary: $357,266
    　　　　Casual Hire: $20,000
    　　　　Supplies: $4,000
    　　　　Student Help: $11,000
    Computing -
    　　　　Total Budget: $859,143
    　　　　Salary: $667,911
    　　　　Supplies: $83,232
    　　　　Software: $10,500

12. *Total equipped classrooms & labs*
    86 classrooms
    64 w/ desktop computer, video projector, ELMO
    11 w/ desktop computer, Smart Board and video projector
    12 w/ flat screen LCD monitor, laptop or desktop & DVD player
    10 computer labs w/ 30+ computers per lab
    TLC computer lab with 76 computers
    Approximately 1,822 instructional computers on campus & Neighbor Island
    Education Centers

III.   Analysis of the Unit

Data Collection and Analysis

IT conducted an online survey available to faculty, staff, and students. The survey was created as a Google Form and distributed via the UHMC campus listserv, Maui-Announcements.

Performance Measures

To assess the performance levels of the services provided by IT to the campus in AY 2016, a user satisfaction survey was conducted. Due to extenuating circumstances, the survey was conducted in the early Spring 2018 semester. Seven Likert-scale questions and three open ended questions were generated to assess user satisfaction levels. Results show that campus users are mostly agree (33-50%) or strongly agree (22-52%) that they are satisfied with various technology in their classrooms and offices. Respondents also indicated that they were mostly very satisfied (35-38%) or completely satisfied (34-52%) with the technology support on campus.

Performance data were also collected from three open ended questions. Responses indicate that technology on campus needs to be updated on a regular schedule to keep up with changing technology. In general, users appreciate the level of support that they receive but would like more training in both hardware and software use. Recurring themes include the need for improved wireless access, newer computers, updated and additional software applications, audio-visual improvements in classrooms, workshops, technology training, additional media production staff and additional instructional design support

Work orders and requests for service and support in the nine major functional categories show that demand for these services continues to be high. Media production continues to show an increase in demand. The current numbers do not reflect the projects and requests that are not fulfilled due to a shortage of staff in that area. The demand for training continues to increase as reflected in many of the responses from the open-ended questions. Specific results from this survey can be found in the appendix.

Effectiveness

The overall health of IT has remained good. Previous IT Program Reviews noted that our biggest challenge was keeping pace with the demand for technology support on campus. This was often due to lack of staff and resources to improve technology tools and training support for faculty. However during the 2015 academic year, things changed. This change was initiated with the development and adoption of the new Strategic Plan. The plan provided the campus community the opportunity to help determine where resources would be directed.

Stakeholders identified IT as a part of the campus that required attention. Resources were directed to the computing side of the department and change happened. Recently, the department achieved a number of initiatives and objectives presented in the AY 2014 Program Review and the User Survey. Improvements included adding computing staff, improving classroom technology, and providing new computers to faculty, staff and classrooms. A much need upgrade to the wireless network was also included.

Our team understands we can provide the services and equipment for which the campus has been asking. Our services have improved, response times have improved, and the morale of the staff is very good. With additional resources being directed at the campus, I see continued growth and improvements to our operations provided additional staffing for the Media side of IT could be secured.

IV.   **Action Plan**

IT Initiatives:
1. Transition campus computers to a Virtual Desktop System (VDI)
2. In partnership with the UHMC Library, develop a Collaborative Learning Classroom (underway)
3. In partnership with the UHMC Library, provide students with a laptop/tablet loaner program (underway)
4. Upgrade network connection speeds to support 10 GB at individual buildings. (underway)
5. DNS solution to support growing increases network use and IP/DHCP deployment (underway)
6. Support a dashboard student registration system to integrate Banner and Starfish registration software designed to simplify database gathering and consumption
7. Upgrade A/V equipment and computers at Neighbor Island Education Centers
8. Upgrade wireless access point, bandwidth speed, and campus coverage (underway)
9. Address challenges and concerns shared with IT User Survey (AY 2014)

In order to accomplish this, the following strategies will be implemented:
1. Allocate external and IT funds to develop/commence VDI project
2. Allocate external funds for collaboration classroom
3. Allocate external funds to purchase and maintain laptops and essential software
4. Allocate funds to upgrade servers and fiber connections for upgrade
5. Allocate external funds to upgrade DNS server
6. Assign new IT Specialist position to support necessary dashboard hardware and software requirements. Duties include programming, operation and maintenance of database, and other duties as required
7. Visit all four Outreach sites, identify problem areas, allocate funds to support necessary upgrades.
8. Pursue Student Tech Fee funds to support Tier1 equipment for campus wide wireless improvements.

9. Identify challenges and concerns from Program Review. Based on findings, work with programs and departments and develop strategies to address areas of concern and implement necessary changes

V.   **<u>Resource Implications</u>**

This report compares much more favorably than the previous program reviews. Keeping up with technological change requires UHMC to invest in department needs and requires support from the entire campus.

The recently adopted Strategic Plan has earmarked funds which have allowed the department to make great strides this past year. The department hired a full-time Graphic Artist in Summer 2014. This action has greatly improved our services offered to the faculty, staff, students, and to the overall campus. In January 2017, we filled a vacant IT Specialist position. Approval to hire an Instructional Designer was granted in late Fall 2016 and will be in place by Summer 2017. Equipment purchases and replacements have been possible only with the assistance of external grants, gifts, departmental partnerships and Student Tech Fees.

These changes will have a positive impact on the services we offer our college community. I do foresee additional support required for sometime in the future. However, while additional staff was hired for the Computing side of IT, the staff levels on the Media side have remained flat. The three full-time Media Design & Production staff are tasked with direct support of cable and interactive television classes as well as video production services. There are a number of requests that must go unfulfilled since the current staffing levels cannot meet the demand for video/audio production services. Moreover, these staff's schedules are tied to the class schedules for which they provide direct support. This has caused the staff to come to work when they are ill or the other two staffers to work double shifts without receiving due compensation. There needs to be an increase in staffing in this area so that support can meet the demands as well as union requirements for proper time off for illness and proper compensation for overtime work. Therefore, we are requesting the following addition to the Media staff:

- The demand for video production support and training services now exceeds our capabilities. This demand comes from a variety of programs including credit, non-credit, and grants. In addition, instructors are requesting classes to be videotaped to allow for review of course material that students can access from anywhere on various devices. An additional challenge has been supporting a change in curriculum and pedagogy and how subject matter is being taught. As UHMC moves forward in adding more hybrid courses, the demand for high quality video and audio content is increasing. To assist with additional requests for video production support, IT requests a full-time Media Design & Production position be added to the staff.

Final Thoughts

We see the demand for IT services to continue to grow. The on-going development of technology and media-rich content will remain a core part of UHMC's future. IT must be readily available for new technological advances for both the traditional classroom and the web. Content development and Instructional Design support will become a larger component of our services. In addition, because of the current fluctuation of our student population, marketing and promotions will continue to experience growth within the department.

Our team looks forward to these challenges. We desire students, faculty, and staff to look towards the IT department as leading technology providers. We look forward to growing our capabilities and we will continue to push initiatives to offer our clientele what we envision as one of the most advanced technological infrastructures on Maui. Our clientele can expect a positive, fast reacting, caring attitude. The IT team is thrilled with the colleges' progress and excited about the opportunities that lie ahead.
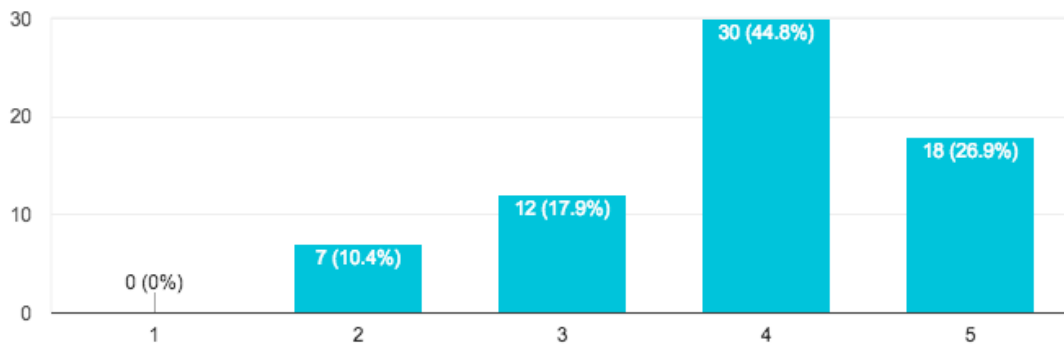
Appendix

IT/MEDIA Department Survey

Question 1:

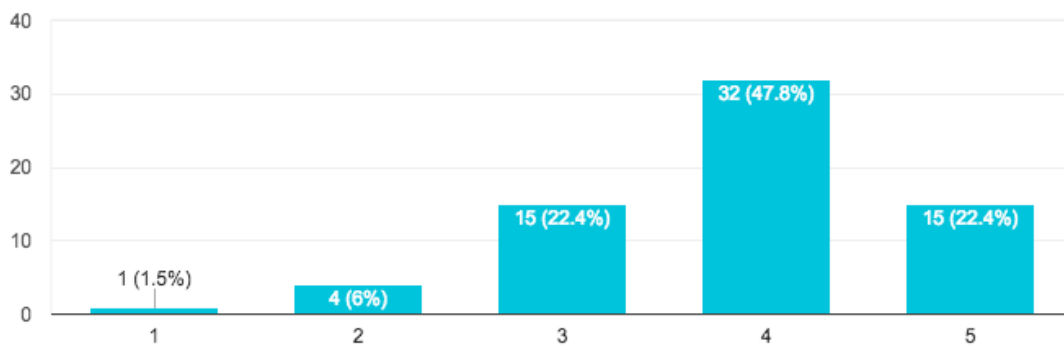**I am satisfied with the computer technology in my classroom, lab or office.**

67 responses

Question 2:

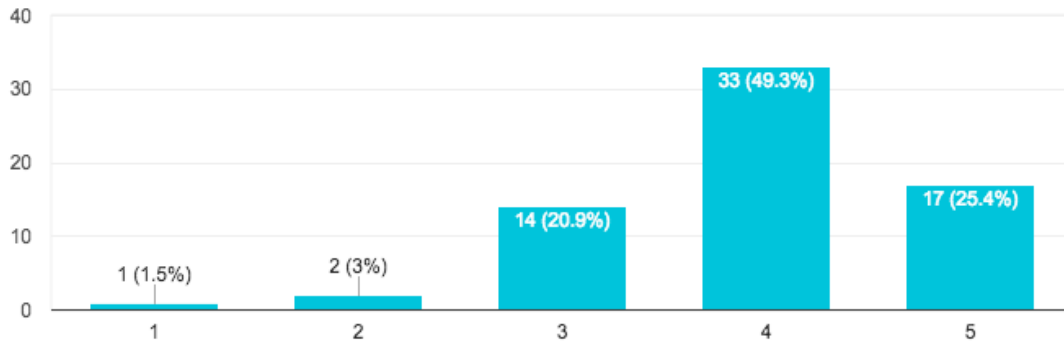**I am satisfied with the audio-visual technology in my classroom, lab or office.**

67 responses

Question 3:

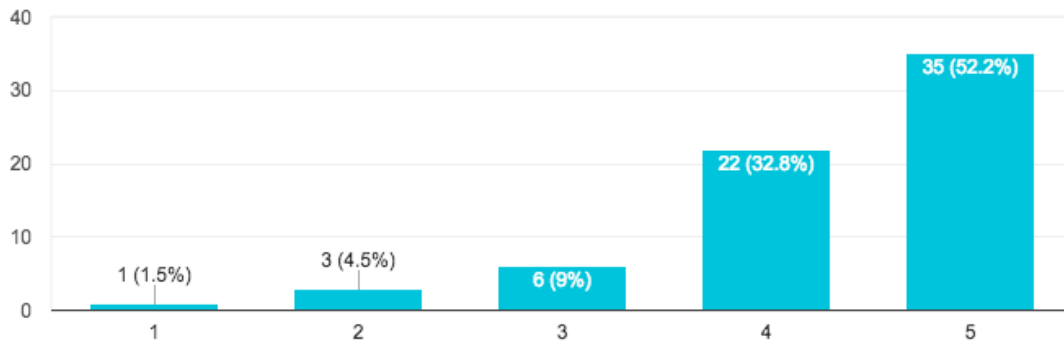## I am satisfied with the computer software in my classroom, lab or office.
67 responses

Question 4:

The Help Desk (uhmchelp@hawaii.edu) meets my needs for instructional or institutional support.
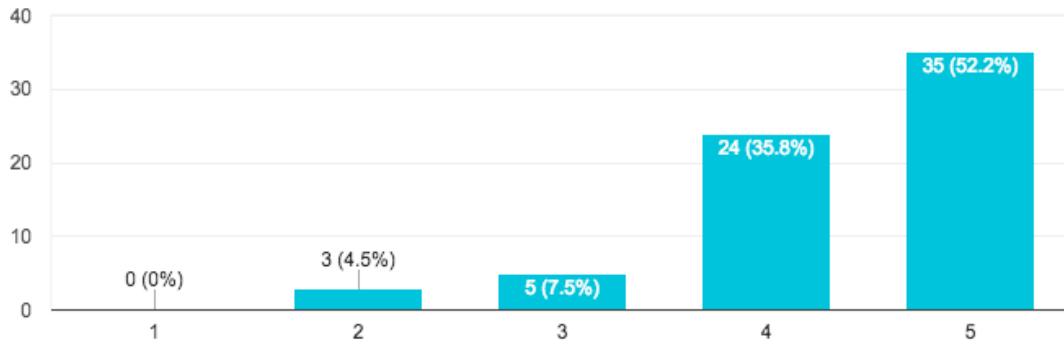67 responses

Question 5:

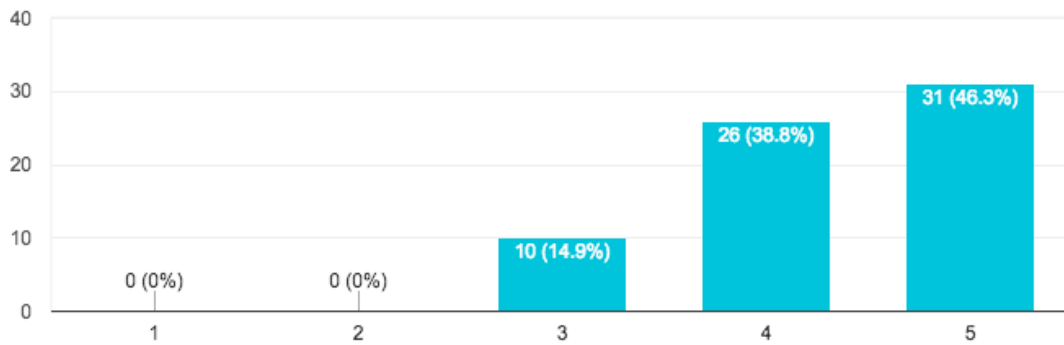## How satisfied are you with the Computing Services support at UHMC?
67 responses

Question 6:

How satisfied are you with the Audio-Visual and Media Services support at UHMC?
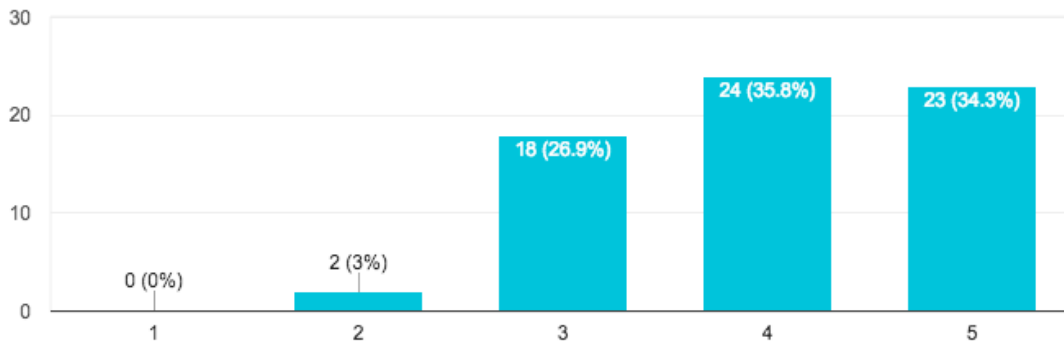67 responses

Question 7:

How satisfied are you with the Distance Learning support at UHMC?
67 responses

Question 8:

What technology improvements would you like to see at UHMC?
1. None (2)
2. n/a (2)
3. Disable the "save password" option
4. Smart Boards, Wireless screens to connect directly with a computer or tablet
5. nothing
6. Improvements to the visual set-up in Hookipa's Conference Room.
7. hardware is hard to keep up with
8. na
9. more smart boards or some technology that would allow instructor to have a screen up and be able to draw or annotate on it
10. more polycom services for all conference rooms
11. More Updated Office Equipment and Software
12. The projectors in IKE are breaking down frequently or having issues with fitting to the screen.
13. None that I can think of at the moment
14. maybe ipads in Hale. Keep thinking about doing a Perkins. Keeping them powered might be an issue with limited outlets in Hale.
15. Lucky me, I teachin the HITS studio so I have great support.
16. Systematic way of updating the computers (imaging from the IT end)
17. Windows upgrades support for problems in labs
18. I would like to see a shared printing service campus wide - something like the Ink machine in the Library though not attached to that machine per se. Would also like to see more uniform digital signage across campus. Need more training

opportunities for faculty and students to learn existing technologies and new learning technologies as they come out.

19. none
20. I am pretty satisfied with my computer and IT needs.
21. Updated projectors/screens and webcams in all classrooms.
22. mobile sign in for events
23. Apps for courses.
24. No opinion at the moment- except maybe R25
25. I would like to increase face to face instructor/student ability for more classes instead of just the skybridge for distance students.
26. routine of computer upgrades, MAC or PC as options
27. More laptop carts or ability to offer computers in classrooms without
28. Wi-fi connectivity is very poor in some classrooms (e.g. KAA108). It would be nice to have strong Wi-fi in all buildings, all classrooms, and areas on campus. Some classrooms have old computers for the instructor's workstation (e.g. TLC-L02). It would be nice to have current computers in all classrooms for both instructors and students.
29. Faster Internet connection in my office and KLMA 206 A & B
30. Assist in a timely manner
31. better use of the campus hallway televisions to promote campus events and activities instead of just constant CO_2 and energy savings, something more relevant to all campus users.
32. faster computers and better projectors..
33. Tech support on computer troubleshooting needs to be more timely
34. Blackboard use?
35. Quicker response time
36. Campus wide wi-fi
37. Redesign of the Math Classrooms in Kupaa - smart boards with white walls (painted walls that can use markers)
38. Better quality sound for films, also, google earth pro permanently installed on the computer
39. More computers available to loan to students.
40. Just to keep up with technology - it changes so fast (touch screens, etc)
41. surround speakers in classrooms to improve sound quality when showing mutlimedia
42. Video production
43. Basically, it s pretty good, but the classroom computers sometimes stay malfunctioning for weeks.
44. n/a non-faculty employee
45. Software and/ or upgrades of systems

46. More Macs
47. more user friendly Polycom
48. Airplay available in classrooms
49. The WEBSITE!!!!!!!!!
50. I'd love for our math classrooms to all be smart classrooms. I know it will take a grant to have that funded so that we could get the appropriate technology and you folks can be appropriately compensated for the work it will take to install.
51. More PDF Pro licenses, faster WIFI
52. Able to answer my questions directly vs. sending me to Manoa or some other number to call.
53. more Apple/Mac as classroom computers
54. More computer labs on campus. Weekend and evening assistance.
55. Technology to improve the communication and engagement with distance students.
56. new computers - laptops vs desk tops
57. You should offer a N/A circle to check for the survey questions. Virtual Reality for meetings would be interesting. See response to the last questions.
58. none i can think of right now
59. I'd like to be able to "zoom in" in Ka'a'ike 107 and 109. I used to be able to, but now it just makes the font bigger - I want to be able to zoom in to show charts, data sets, and the like.
60. Hi, if possible, could there be a way for Dept. Secretaries to update our campus directory ourselves? The person in charge of this seems too busy.
61. More student-centric classroom set-ups in rooms with computers (less teacher-fronted, rigid classroom designs)
62. NA
63. Stronger wifi signal in KLA.
64. N/A
65. More automation - less paperwork and signatures. Even the IRS accepts digital signatures. I know this is a system/business office request, but that's all I can think of for now.

Question 9:

What training and support would you like to receive at UHMC?
1. na (2)
2. NA (2)
3. not sure (2)
4. None (2)
5. n/a (2)

6. .
7. Laulima, use of smart boards
8. nothing
9. Cybersecurity
10. depends
11. maintaining and updating website. Adobe Premiere for short video editing
12. Training in updating office computers, let us know which is appropriate and which one not to update.
13. I would be interested in distance learning technology if I ever teach distance learning.
14. None that I can think of at the moment
15. I've been here long time, appreciate what I've learned, always willing to learn more as tech changes, share what I've found works.
16. N/A
17. Regular web content uploads (WordPress) workshops
18. Applications support and training
19. Support for all computers and software with a long-term plan for updating software and replacing hardware - would prefer for IT dept to take lead/control over this rather than it being at the department level. I would also like to see IT/Media lead our campus in the introduction and adoption of new technologies so that depts can follow your lead or collab with you more directly in these initiatives.
20. Maybe how to reset things so that I wouldn't have to both IT so much.
21. Better response time to help desk emails- currently rarely hear back, and cannot depend on a timely response. Easy to use a/v training manuals in every classrm.
22. maybe a laulima site that can assist us in locating different passwords in classrooms
23. Not using enough to know
24. The staff and I could use help with being able to reboot computers when they go out of sync
25. help desk phone being answered
26. Laulima training for students
27. Training for steps/best practices to protect computers/devices from viruses, hackers, etc.
28. template sample or idea bank for instructors to use when designing their Laulima
29. classes for excel, laulima
30. none at this time
31. How to use some of the tech in classrooms
32. creation of online learning environments
33. How to trouble shoot equipments

34. None at this time.
35. Paperless systems
36. System and application software training
37. All good - lots of training on campus
38. training for distance learning at a time when my lecturers can attend and/or remote PD for online teaching.
39. Nothing right now.
40. Continue with Laulima training, etc.
41. I am good
42. We need a dedicated instructional support person for Laulima or whatever system is next.
43. n/a non-faculty employee
44. Adobe CC/ FCPX
45. set up Polycom
46. The ability to make class websites other than on Sakai
47. ?
48. I'm not sure.
49. Training on tips and tricks - Excel, PDF Pro, other hints to use what we have effectively
50. More training on how to utilize Laulima and/or Google. Understanding more about what Google can do and what Laulima can do and which is better for different types of projects.
51. none
52. Minor troubleshooting -something we can have our student assistants be a part of.
53. Continuing ed regarding new technology
54. Engagement software and student collabaration
55. Acrobat training (not for the circus)! How to get the most out of the program.
56. word press
57. Nothing comes to mind
58. If possible, I would like to see more availability of loaner equipment for offices when our equipment is taken for repairs.
59. "Studio Time" with Instructional Design / Media support to create high-quality videos for distance classes.
60. ;gb;iug
61. training on new technology equipments: media
62. Advanced Adobe kine training

Question 10:

In which area(s) of Computing, Audio-Visual, Media and Distance Learning support can we improve?

1. n/a (3)
2. na (2)
3. none (2)
4. N/A (2)
5. None (2)
6. ? (2)
7. .
8. Just equipment upgrades. Support is incredible.
9. nothing
10. speed up tech fee procress
11. computing
12. Please have somoeone answer calls most fo the time.
13. The IT department has been quick and efficient. The only improvements I can think of would be the equipment itself (projectors).
14. None that I can think of at the moment. On a side note, mahalo nu nui for the work that the Media and IT departments do to keep us function efficiently! If you haven't been told yet - YOUR TEAM is very much APPRECIATED!
15. I think students could use more access to tech in the classroom. Some bring laptops, not all have them.
16. More campus-wide approach, instead of individually meeting when there's issues (proactive vs reactive) for example with regular updates, etc.
17. IT
18. We desperately need the UHMC website updated. And, it would be great to have ongoing website training and support for departments who are now managing their own pages. Audio-Visual and Media have been an INCREDIBLE help to our dept!
19. everyone is doing great, thank you for everything!
20. If anything, more upgrades to keep up with software.
21. Response time to help desk emails. Maybe add a priority level rating so we can say High/Immediate vs Med/ 2 days vs LowSu
22. not sure
23. Encourage conservation of Laulima bandwidth.
24. Will appreciate having and audio speaker that is bluetooth that can hook up to Instructors laptops and projector
25. more zoom or blackboard usage
26. You are well on your way so I am not complaining!

27. A well-staffed instructional design team.
28. Computing - upgrading Internet speed and computers
29. Be more available
30. none at this time
31. Don't know
32. I would like to be able to move around more in cable classroom and have a bigger board to write on. Also need student mics to work better
33. timely assistant in troubleshooting
34. Mahalo
35. Doing a great job!
36. Update classrooms for students/teacher
37. opportunities for students to receive mandatory Laulima training prior to taking online courses.
38. None right now.
39. DL support - something practical
40. Billing process
41. Laureen is very good, but she cannot do everything we need to support the volume of DL classes we are running. We need someone specific to Laulima and maybe another design person.
42. n/a non-faculty employee
43. Email response to work order requests submitted could be sent upon receiving and approximate date to complete task
44. More Macs
45. I have never used any of them.
46. I chose 5 on the DL support, but I don't actually teach DL, so I just used the rank I'd chosen for the other two.
47. Distance Learning and professional development relating to computers, applications, media. Thnak you!
48. My questions often get routed to Manoa - setting up email, questions about Laulima. It would be nice to have more support right here on campus.
49. Programming and scripting to gather info from banner. For DL - more polycom/HITS rooms.
50. Audio-visual to improve student meetings.
51. Distance learning support and computing
52. Are there V-R options for meetings. That would be really interesting if we could put on a pair of goggles and be sitting a table with a bunch of people, that would save a ton of travel money and time wasted in traveling to meetings.
53. already doing a great/fantastic job
54. Some help with the zooming in in 107 and 109 would be great! Mahalo!
55. Our IT/Media Dept. is fantastic. Pleasant people to work with, and always helpful.

56. Additional individuals/positions to support our current Instructional Designer (who is doing an execellent job, but who needs an ID team to better support the entire campus)
57. NA
58. web site support
59. Audio-Visual
60. A better structure or an automated processes for departments paying for goods services from the media center