## Faculty Senate Information Technology Committee Annual Report August 2019-July 2020

## **Elected members:**

- Sophya Garashchuk, Chemistry (2020)
- Heather Heckman, **Co-Chair**, Libraries (2020)
- Tessa Davis, Law, (2020)
- Orgul Ozturk, Economics, (2021)
- Ana Lopez-DeFede, Social Work (2021)
- Robert Mullen, Civil and Environmental Engineering (2021)
- Neset Hikmet, Co-Chair, Integrated Information Technology (2022)
- Chun-Hui Miao, Co-Chair elect, Economics (2022)

## **Appointed members:**

- Davis Latham, Student Member
- Doug Foster & Michelle Foster, ex-officio, Division of Information Technology
- Paul Sagona, ex-officio, Research Computing
- Glenn Bunton, ex-officio, University Libraries
- Debbie Kassianos, ex-officio, Vice President for Research Office
- Cheryl Addy, ex-officio, Provost's Office
- Elaine Belesky & Aaron Marterer, ex-officio, University Registrar Office

## **DoIT Strategic Priorities**

We began with a review of the Division of Information Technology (DoIT) strategic priorities, a presentation that we hope will become a fall semester tradition. The committee commended:

- DoIT's focus on governance, involving faculty, staff and students in the decisionmaking process;
- the implementation of Amazon Web Services (AWS) and Microsoft Azure cloud storage options;
- the growth of the online <u>Knowledge Base</u>, which has resulted in fewer calls and tickets; and
- the introduction of after-hours AV service for classrooms, so that repairs can be made in a timely fashion while the classrooms are unoccupied.

## **Spring 2019 survey results**

The committee also reviewed the Spring 2019 survey results and selected three topics for investigation by subcommittees:

• Classroom support: Hikmet, Miao & Ozturk

- Systems for grant administration: Garashchuk, Kassianos & Mullen
- Legal contracts: Davis, Heckman & Sagona

## Classroom support & learning technology

The classroom support group endorsed a plan to invest in technology upgrades and support staff expansion. They also participated in discussions that culminated in the establishment of a Learning Management System (LMS) Governance Group. That group includes representation from the Faculty Senate IT Committee.

Mike Kelly and Katie Vaughn attended IT Committee meetings to present on the planned governance group and on upgrades to Blackboard, including Ultra Base Navigation. The IT Committee helped to disseminate information about the upgrade to faculty, and about an opportunity to pilot Blackboard Ultra Course, which was anticipated to have greater impacts on faculty workflows than Ultra Base Navigation. Complaints about the Ultra Base Navigation experience suggested that a similar pilot program should also have been adopted before its rollout.

Later in the semester, concerns were raised about data analytics and student privacy, issues that certainly arise with Blackboard, but that are not limited to the LMS.

#### **Recommendations:**

 DoIT should continue to recruit faculty to test changes to the LMS & other systems before performing upgrades

## Systems for grant administration

Caroline Agardy, Mandy Kibler and Lindsay Anastasio attended a meeting of the full committee to discuss grant reporting in the Finance Intranet, a system that is not administered by DoIT. We discussed faculty complaints about the user experience, as well as reports of the wrong people being paid from grant accounts. Kibler emphasized that these cases need prompt reporting to the Controller's office. The committee noted that it remained difficult for faculty to recognize these issues, as they could not easily view who was being paid from the Accounting Intranet. We also discussed faculty complaints about the relative difficulty of accessing information about their grant accounts since the implementation of PeopleSoft.

The committee helped to disseminate information about reporting erroneous charges to the Controller's office, as well as about PI access to salary information in PeopleSoft HCM (the HR module).

After our committee's final meeting, the Controller's office announced the availability of a Grants dashboard on the Finance Intranet that includes "burn rate" tracking of both direct expenses and cost-share.

### **Recommendations:**

• The Controller's office should prioritize displaying salary data in the Finance Intranet

#### **Contracts**

George Lampl joined the committee to discuss software licenses from the perspective of UofSC Counsel. Anecdotal reports of legal rejecting needed software licenses were of concern to the committee. We were also concerned about individuals signing, or clicking through, end user licensing agreements (EULAs) without input from Counsel, and conversely about the workload for legal if all EULAs were routed through their office. We noted that all contracts must be reviewed on paper by Board of Trustees policy, which presents difficulties for click-through licenses. We also noted that it would be helpful if there was an accessible database of licenses approved by legal.

During the COVID-19 emergency, a faculty member raised a concern about a statement on the University's Keep Teaching page that seemed to imply faculty could *only* use software available through the software distribution page in their teaching. The committee chairs were able to confirm that this was a miscommunication and the language on the page was updated.

### **Recommendations:**

- Establish a searchable database of approved legal agreements
- Consider membership in an app-vetting consortium

## Revision of the committee charge

The committee voted to revise its charge during the 2018-2019 academic year, but never brought the revised charge to the Senate. We received approval of the revisions from the Faculty Advisory Committee in spring 2020, but agreed that adoption of a new charge for the IT Committee was not a priority during the COVID-19 emergency. The following charge should be presented to the Senate during the 2020-2021 academic year:

The Faculty Senate Information Technology Committee ensures a faculty voice in assessing and planning Information Technology (IT) services, resources, and infrastructure for the University of South Carolina to further the University's mission as a world-class teaching and research institution. The Committee is part of the governance structure of the Division of IT (DoIT).

# Other topics

The following topics were also considered by our committee this year. In several cases, intended spring semester follow-ups were disrupted by the COVID-19 pandemic.

The committee tested Microsoft Teams as a replacement for Blackboard Organizations and was generally pleased with the functionality and user experience.

Maiden names do not always display properly in UofSC systems. A framework for preferred names among students was developed by the Registrar and the Chief Diversity Officer; however, faculty names (including maiden names of established women researchers) were out of scope. The IT Committee resolved that all systems should accommodate a preferred name and the framework was referred to the Faculty Welfare Committee.

Lab enrollment waitlists were requested by faculty. The committee deferred the issue as updates to Banner in spring 2020 were expected to meet this need. The COVID-19 emergency delayed follow-up with the Registrar's Office.

IBM consultants were engaged to study data center capacity in Spring 2020. Their recommendations have not yet been shared with the committee.

Multi-factor authentication (MFA) was added for Outlook to solve a recurring, and severe, problem of compromised emails. The committee understands that this was a necessary, if inconvenient, concession. DoIT notes that many faculty and staff continue to choose the call option for MFA; this can be costly for the university.

Melissa Spring spoke to the committee about the Digital Accessibility Initiative. The key message for faculty is that support will be provided, including tailored training. Expect further announcements in the 2020-2021 academic year.

Affiliate faculty approval is currently very slow. Network accounts for outside participants are crucial for collaborative grant projects, for outreach events expected by granting agencies, and for student recruiting. There may be a need for provisional network accounts while HR procedures are in process.

Garashchuk and Sagona are setting up a hands-on workshop in computational chemistry workshop with EPSCoR funding. They will report to this committee on the experience.

Sagona plans to present to this committee on storage of research data. Data repository needs for some faculty might currently be met by Scholar Commons, the UofSC Libraries-supported institutional repository.

### 2020 faculty IT survey

The committee agreed that we should survey the faculty annually for a few more years, in order to establish a base rate. In future years, we might reduce the frequency of the survey, perhaps adopting a biannual schedule. The survey report is reproduced at the end of this annual report.

### **Recommendations:**

- Support DoIT to the fullest level possible during the COVID-19 emergency
- DoIT should continue to work to promote and diversify its Knowledge Base
- Continue to improve WiFi & internet access more broadly on campus

## The IT Committee should:

- Repeat the survey in Spring 2021; consider biannual surveys thereafter
- Add prompts to future surveys about research technology and administrative systems used by faculty
- Consider exploration of the following topics during the 2020-2021 academic year (see the report below for further details):
  - Classroom technology & support
  - o Virtual classroom technology & support
  - Learning management systems (LMS)
  - Software licensing
  - o Centralization of IT
  - o Archival data storage
  - o Data security when working from home
  - o Preferred names

# Faculty Senate IT Committee Members (Heather Heckman & Neset Hikmet, Co-Chairs) 22 May 2020

### Report on the 2020 Faculty Senate IT Survey

In the spring of 2020, the Faculty Senate IT Committee distributed a brief survey on satisfaction with UofSC's state of technology to faculty. The project had two goals:

- to continue to monitor trends in faculty assessment of IT
- to identify topics for investigation by the IT Committee during the 2020-2021 academic year

357 responses were received, a substantial increase over the 228 faculty members who participated last year. Demographic information is included in <u>Appendix 4.</u>

Thus far, we have collected responses on satisfaction for only 2 years. We urge caution in the interpretation of these results.

- As in 2019, in the aggregate, satisfaction with IT services and support offered by *units* appears to exceed satisfaction with those provided *centrally* by the Division of IT (see Appendix 1).
- However, satisfaction ratings seem to have improved overall relative to 2019. This change might
  be attributable, at least in part, to the larger sample size recruited this year; nevertheless it is
  commendable that a survey distributed during this difficult time would receive so many positive
  satisfaction ratings (see <u>Appendix 2</u>).
- As in 2019, satisfaction appears to be lower in the College of Arts and Sciences than in other academic units (See Appendix 3).

From the comments submitted, the Committee selected the following issues for possible exploration in Academic Year 2020-2021:

- Classroom technology & support: Concerns about equipment age, maintenance scheduling and support response times continue to be reported. These topics have been considered by the Committee since its formation, but we anticipate renewed urgency in Fall 2020.
- Virtual classroom technology & support: Subtopics that emerged from this spring's survey—
  distributed during the COVID-19 emergency—include online testing, a need for backup options
  when Blackboard Collaborate fails, reports of erratic behavior of the centralized authorization
  system (CAS), and support for both synchronous and asynchronous teaching.
- Learning management systems (LMS): Many respondents expressed dissatisfaction with Blackboard and/or interest in Canvas. DoIT is establishing an LMS governance group that will include input from this Committee. In parallel, and related to both in-person and virtual classroom technology, above, our Committee will consider whether requirements to use particular learning technologies violate academic freedom.
- Software licensing: The software licensing process, both for new licenses and renewals, remains
  challenging. The Committee endorses efforts by DolT's unlTe group to begin to collect a
  centralized "catalog" of license approvals and rejections. We will work in parallel to identify other
  avenues toward more timely acquisition of software for teaching and research.
- Centralization: The tension between centralized infrastructure, which lowers costs to the benefit of all, and decentralized services and support, which seem to be preferred by many faculty, remains and will likely never be perfectly resolved. The Committee hopes this year's more positive results are early evidence that we are moving toward a more productive equilibrium, but there is still room for improvement. Can we identify targeted improvements? Which specific services are most valuable at the local level? Which services could be centralized?
- Archival data storage: UofSC's solution for archival data storage is, increasingly, cloud storage. Is this a satisfactory solution for our faculty?
- Data security when working from home: What, if anything, needs to be done to secure the data that faculty need to access?

 Preferred names: The preferred name framework developed by the Registrar and the Office of Diversity and Inclusion was limited to students. Faculty Welfare is working to extend it to faculty and staff. What is needed to implement the framework for faculty and staff?

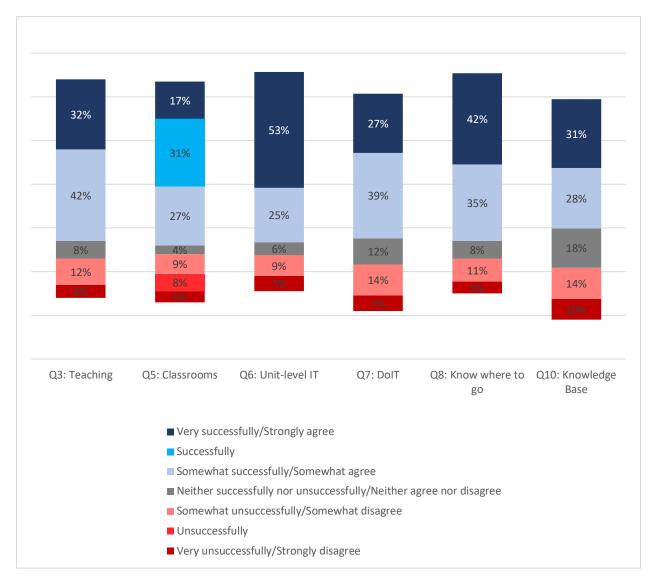
#### The Committee also notes:

- Even as satisfaction with the state of technology on campus may be improving, this Committee
  believes we still under-invest in IT infrastructure. The current crisis places both unprecedented
  economic pressure on the university and unprecedented demands on our campus technology.
  DoIT must be supported to the fullest level possible.
- More than a third of respondents had never heard of DoIT's Knowledge Base. We urge promotion
  and discoverability of this resource (e.g., presentation to the Faculty Senate next fall; Google
  indexing).
- The emphasis on classroom technology in the responses collected may have been influenced by the questions asked. We plan to add prompts on the state of research technology, as well as on satisfaction with administrative systems used by faculty (e.g., PeopleSoft, Finance Intranet).
- Some survey respondents raised concerns about students' ability to remotely access specialized software required for their coursework during the COVID-19 pandemic. This issue is under consideration by DoIT's unITe group.
- Reports of poor WiFi coverage continue. The Committee endorses efforts to improve WiFi coverage and internet access more broadly on campus.

See Appendix 4 for aggregated responses.

### **Appendix 1: Comparison of satisfaction ratings**

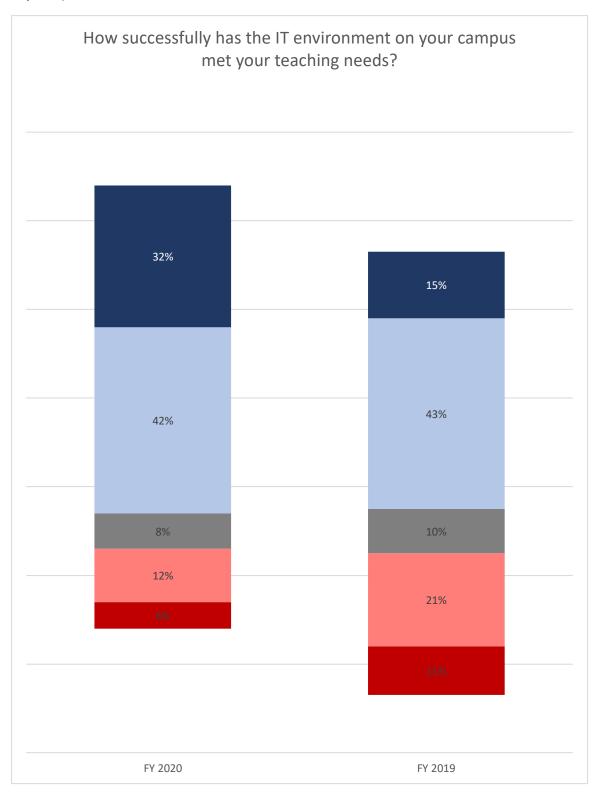
The diverging bar charts that follow are centered around the median of "Neither successfully nor unsuccessfully/Neither agree nor disagree" responses.

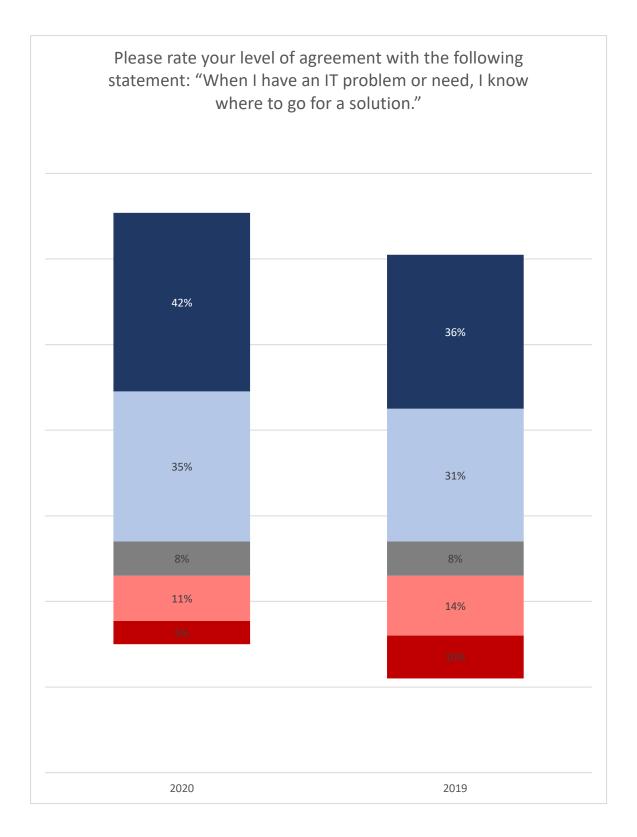


- Q3. How successfully has the IT environment on your campus met your teaching needs? (Very unsuccessfully—dark red; Somewhat unsuccessfully; Neither successfully nor unsuccessfully; Somewhat successfully; Very successfully—dark blue)
- Q5. Considering my experiences from January 2019-January 2020, I am satisfied with the technology in the classroom(s) I have been assigned. (Very dissatisfied; Dissatisfied; Somewhat dissatisfied; Neither satisfied nor dissatisfied; Somewhat satisfied; Satisfied; Very satisfied)
- Q6. Overall, how satisfied are you with the services specifically offered by your academic unit (college/department specific)? (Very dissatisfied; Somewhat dissatisfied; Neither satisfied nor dissatisfied; Somewhat satisfied)
- Q7. Overall, how satisfied are you with the services specifically offered by the Division of IT (examples: software availability, networking, research clusters)? (Very dissatisfied; Somewhat dissatisfied; Neither satisfied nor dissatisfied; Somewhat satisfied; Very satisfied)
- Q8. Please rate your level of agreement with the following statement: "When I have an IT problem or need, I know where to go for a solution." (Strongly disagree; Somewhat disagree; Neither agree nor disagree; Somewhat agree; Strongly agree)
- Q10. How satisfied are you with DoIT's Knowledge Base? (Very dissatisfied; Somewhat dissatisfied; Neither satisfied nor dissatisfied; Somewhat satisfied; Very satisfied)

## Appendix 2: 2020 vs 2019 comparison

In general, ratings were more positive this year. However, changes to this year's questions to shorten and disambiguate the survey, and the erroneous inclusion of extra categories in question 5, allow the direct comparison of only two questions.





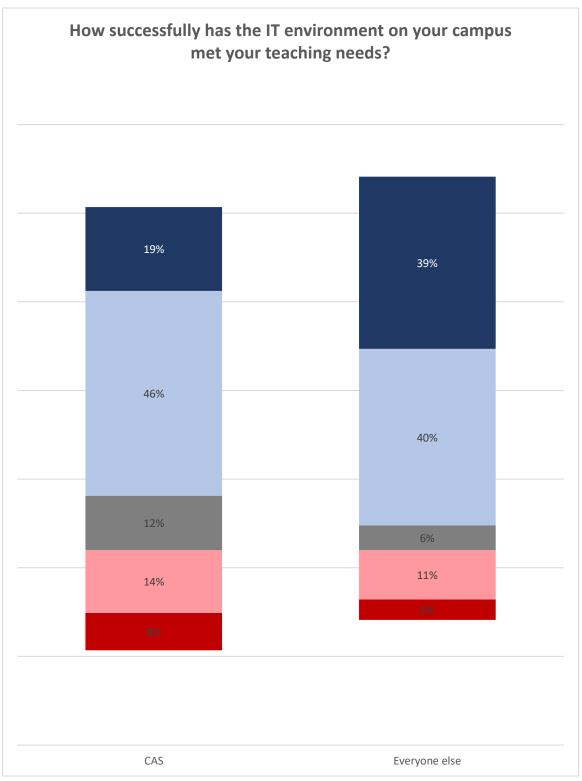
The lower proportion of "Somewhat unsuccessfully" & "Very unsuccessfully" and "Somewhat agree" & "Strongly agree" responses, respectively, might be attributable to the increase in respondents from 228 to 357. The absolute number of negative responses trended down (with one exception), but the size of the change was small:

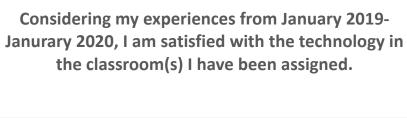
How successfully has the IT environment on your campus met your teaching needs?			
Response	2019	2020	Change
Somewhat unsuccessfully	43	39	-4
Very unsuccessfully	23	19	-4
Total	66	58	-8

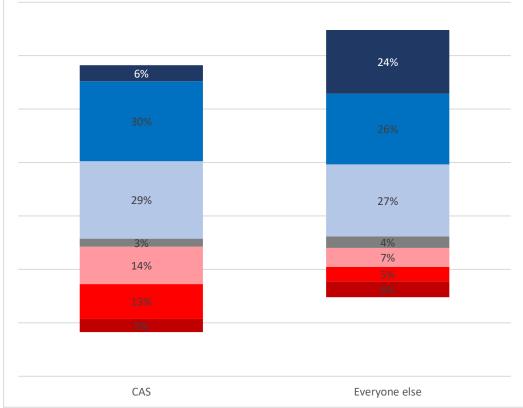
Please rate your level of agreement with the following statement: "When I have an IT problem or need, I know where to go for a solution"			
Response	2019	2020	Change
Somewhat disagree	21	35	+14
Strongly disagree	28	18	-10
Total	49	53	+4

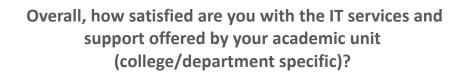
## Appendix 3: College of Arts and Sciences comparison

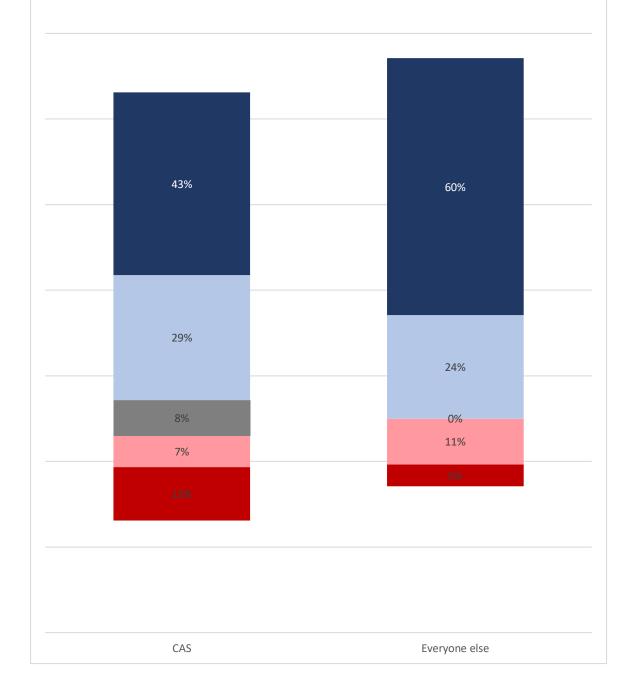
As was the case in 2019, satisfaction ratings were relatively lower in the College of Arts and Sciences (CAS) than in other academic units. We received 108 responses from CAS, accounting for approximately 30% of all responses.



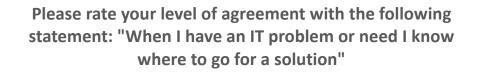


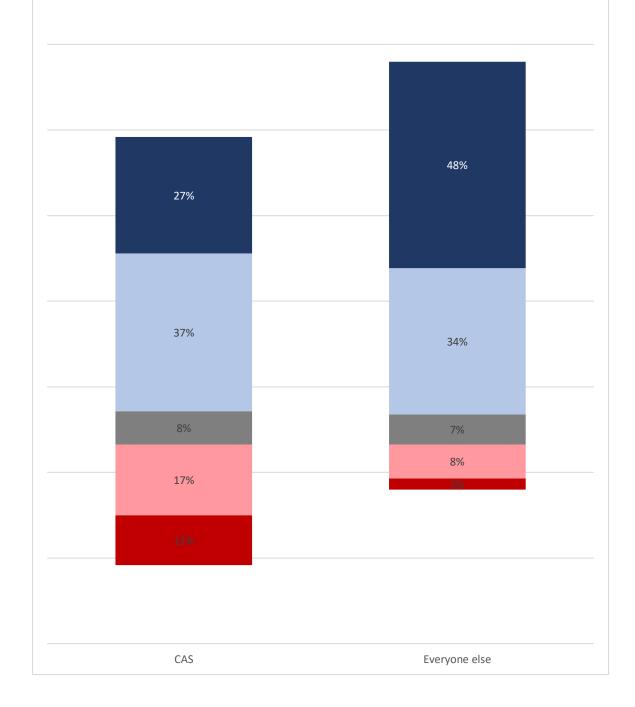


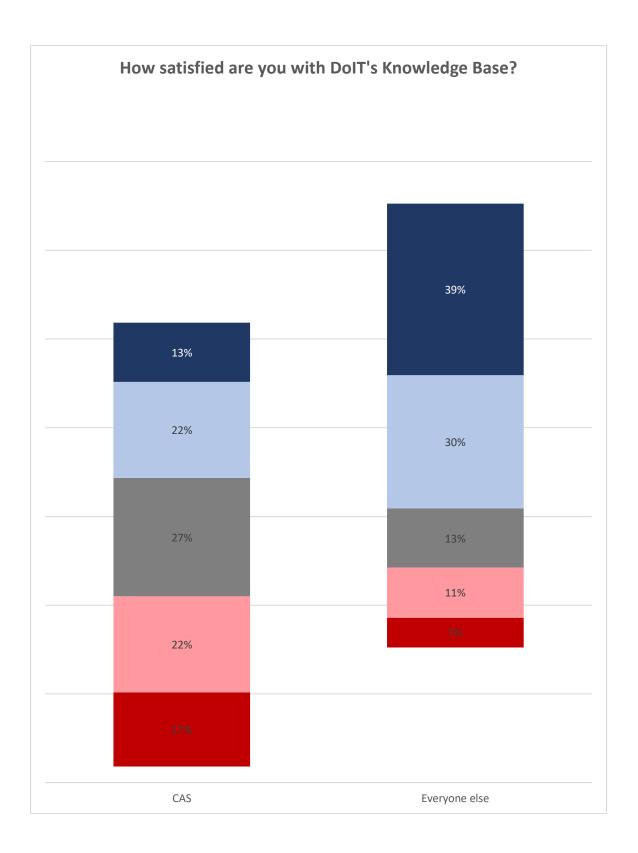








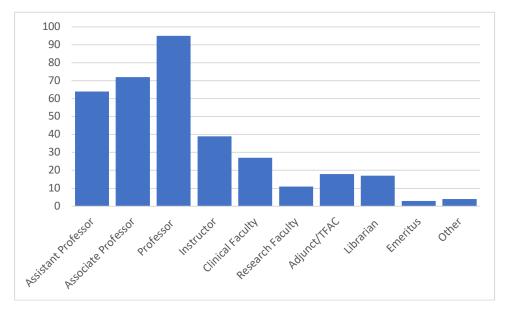




## Appendix 4: Results

## Q1. Which of the following best describes your position? (n=352)

Response	Count
Assistant Professor	64
Associate Professor	72
Professor	95
Instructor	39
Clinical Faculty	27
Research Faculty	11
Adjunct/TFAC	18
Librarian	17
Emeritus	3
Other	4

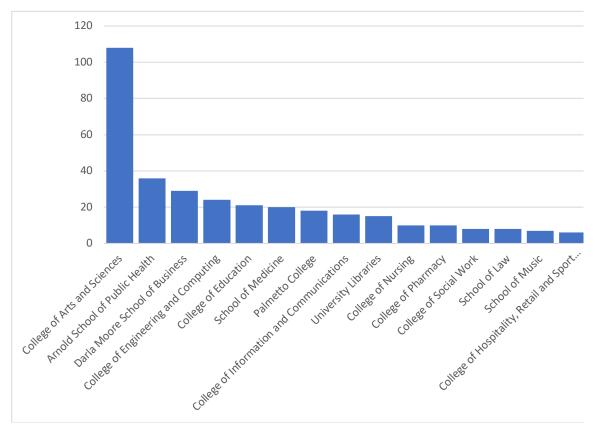


Descriptions of "Other" may be available upon request.

## Q2. Please enter the department or school you are in (aggregated by college; n=341)

College	Count
College of Arts and Sciences	108
Arnold School of Public Health	36
Darla Moore School of Business	29
College of Engineering and Computing	24
College of Education	21
School of Medicine	20
Palmetto College	18
College of Information and Communications	16

University Libraries	15
College of Nursing	10
College of Pharmacy	10
College of Social Work	8
School of Law	8
School of Music	7
College of Hospitality, Retail and Sport Management	6
Other	5



Descriptions of "Other" may be available upon request.

# Q3. How successfully has the IT environment on your campus met your teaching needs? (n=337)

Response	Count
Very successfully	104
Somewhat successfully	135
Neither successfully nor unsuccessfully	25
Somewhat unsuccessfully	39
Very unsuccessfully	19
I don't know	1
I don't teach	14

**Q4. Please explain** (for somewhat or very unsatisfied responses to Q3; n=51) Responses may be made available upon request.

# Q5. Considering my experiences from January 2019-January 2020, I am satisfied with the technology in the classroom(s) I have been assigned. (n=335)

Response	Count
Strongly agree	50
Agree	92
Somewhat agree	79
Neither agree nor disagree	11
Somewhat disagree	27
Disagree	23
Strongly disagree	16
I did not teach in the classroom during this period	37

# Q6. Overall, how satisfied are you with the services specifically offered by your academic unit (college/department specific)? (n=333)

Response	Count
Very satisfied	170
Somewhat satisfied	80
Neither satisfied nor dissatisfied	18
Somewhat dissatisfied	30
Very dissatisfied	23
I don't know	4
My unit does not provide IT services	8

# Q7. Overall, how satisfied are you with the services specifically offered by the Division of IT (examples: software availability, networking, research clusters)? (n=331)

Response	Count
Very satisfied	84
Somewhat dissatisfied	44
Neither satisfied nor dissatisfied	39
Somewhat satisfied	121
Very dissatisfied	22
I don't know	21

# Q8. Please rate your level of agreement with the following statement: "When I have an IT problem or need, I know where to go for a solution" (n=331)

Response	Count
Strongly agree	138
Somewhat agree	116

Neither agree nor disagree	24
Somewhat disagree	35
Strongly disagree	18

# **Q9. Where do you go for IT solutions? Check all that apply.** (n=330; responses sum to more than 100%)

College/department/academic unit IT staff	275
DoIT Service Desk	198
Faculty Senate	8
Other	36

Descriptions of "Other" may be made available upon request.

### Q10. How satisfied are you with DolT's Knowledge Base? (n=329)

Responses	Count
Very satisfied	66
Somewhat satisfied	58
Neither satisfied nor dissatisfied	36
Somewhat dissatisfied	30
Very dissatisfied	20
I have never used DoIT's Knowledge Base	119

# Q11. How can the IT environment on your campus be improved to better serve faculty, staff and students? (n=245)

Responses may be made available upon request.

## Q12. Please offer any additional comments or suggestions. (n=104)

Responses may be made available upon request.