

# Information Technology

Office of Information Technology

## Introduction

The purpose of the Information Technology Unit is to enhance the role of information technology on the McNeese State University Campus. Information technology is a broad term used to describe a multitude of uses of computing and communications technology in support of the institution's mission and activities. This area typically includes computers (servers, desktops, and workstations), networking equipment and infrastructure items, telephone, video distribution and transmission equipment, multimedia and similar computer-based audiovisual equipment, electronic or digital printing equipment, and other related hardware. Additionally, the term information technology may be used to include both the software that operates on this equipment and the data retained by these hardware and software mechanisms.

The Information Technology Unit focuses around four major areas: student computing laboratories; network access and electronic services; user support services; and instructional technology and curriculum support. In addition, the Information Technology Office coordinates proposals to and carries out the approved proposals of the Student Technology Assessment Committee. The Information Technology Division consists of the Information Technology Office, the Coordinator of Technological Advancement for Students (TASC) Operations, Technical Support and Networking Services, University Computing Services, Webmaster, and Telecommunications Technician.

## Performance Objective 1 Provide functional network to advance technology available to faculty/staff, students, community, and dorm residents.

### 1 Assessment and Benchmark

Benchmark: Maintain 99.99% (industry standard) uptime during peak academic seasons and hours for the campus network. Peak hours are defined as 7 days per week/24 hours per day during an academic term, except where scheduled maintenance of the network is planned. Uptime will be calculated by dividing the measured uptime by the available number of hours in a year (8760).

#### 1.1 Data

Academic Year	% of uptime	Hours of downtime
2016-2017	99.7%	20
2017-2018	100%	0

#### 1.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Expected level of achievement was satisfactory. 20 hours of unplanned downtime for the year was the result of fiber damage to Watkins Dorm by a contractor.

2017-2018:

Expected level of achievement was satisfactory. 17.5 hours of unplanned downtime (3/28/18 10:45AM to 4:15PM) for the year was a result of fiber damage outside of our control and therefore was not included in the data. This situation still caused inconvenience for all users and IT is currently working with LONI to prevent this situation from happening again. Items to be worked on for the following year:

- Install redundant Internet connection originating from Ryan St. The current connection enters campus from Common St.
- Integrate both connections into campus equipment for seamless failover should fiber damage occur in the future.

### 2 Assessment and Benchmark

Benchmark: Design and implement network upgrades to ensure state-of-the-art connectivity as funding becomes available.

#### 2.1 Data

2016-2017:

Network Improvements:

- New network switch installations
  - Frasch Hall
  - BBC 2<sup>nd</sup> floor labs
  - Ruston
- Fiber optic installations/upgrades
  - Dorms – 10GB
- Wireless installations/upgrades
  - Bel dorm
  - Frasch Hall

2017-2018:

Network Improvements:

- New network switch installations
  - Hardtner 4500X 10GB switch
  - BBC 4500X 10GB switch
  - SFA
  - KBYS (fanless model)
- Fiber optic installations/upgrades
  - Hardtner to Data Center
  - President's House
  - Field House to Library
  - SFA to Kaufman

- Bulber to Kaufman
- Dorm management office to Kirkman
- Wireless installations/upgrades
  - President's House
  - IT building

### 2.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

- Continue to expand/upgrade network hardware.
- Continue to expand/upgrade fiber optic infrastructure as needed.
- Continue to expand/upgrade wireless network.

2017-2018:

- Continue to expand/upgrade network hardware:
  - SEED center data room has become a management challenge because it is too accessible by non-McNeese workers. IT will work with Facilities to secure this room.
  - We have determined that our core routers will not support 100G connectivity as previously stated. We are currently working on an alternative solution to this.
  - We have determined that our closet series switches will not support software defined access. This security enhancement is a nice feature and will be considered in future upgrades.
  - The IT department is currently working with developers to design and implement technology in the H&HP Arena.
- Continue to expand/upgrade fiber optic infrastructure as needed
  - The IT department is currently working with developers to design and implement fiber optic cabling in H&HP Arena.
  - The IT department is currently working with LONI to provide 100G Internet connectivity.
  - The following buildings are scheduled for 10G upgrades:
    - Police
    - Drew Hall
    - Gayle Hall
    - Farrar Hall
    - Field House
    - Alumni
- Continue to expand/upgrade wireless network
  - H&HP Arena

## Performance Objective 2 Provide technical support services for faculty/staff and students in a timely and complete manner.

### 1 Assessment and Benchmark

Benchmark: Keep the quality of the Help Desk Survey above 4.0 out of 5 on questions.

#### 1.1 Data

Academic Year	Survey Ranking
2013-2014	4.33/5
2014-2015	4.44/5
2015-2016	N/A
2016-2017	4.14/5
2017-2018	4.46/5

### 1.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Continue to monitor satisfaction levels.

2017-2018:

The lowest scoring item on the survey was timeliness. IT will investigate the following to help address this issue:

- Identify additional self-help features for student processes.
- Have the help desk number roll to additional IT staff members during peak call times or when Susan is unavailable.

## 2 Assessment and Benchmark

Benchmark: Keep the quality of the Tech Support Service Survey above 4.0 out of 5 on questions.

### 2.1 Data

Academic Year	Survey Ranking
2013-2014	4.34/5
2014-2015	4.42/5
2015-2016	N/A
2016-2017	4.51/5
2017-2018	4.48/5

#### 2.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Continue to monitor satisfaction levels.

2017-2018:

Although levels are satisfactory, the lowest scoring items on the survey involve timeliness and efficiency. Demand continues to increase for support. IT staff has acquired additional work load from TASC Coordinator dealing with severe medical issues. The following will be done to help with this issue:

- Starting in the fall semester, IT will utilize a student technician to assist with additional work load.
- Changes to the online request form will be made for efficiency. For example, the user will no longer need to provide their department.

## Performance Objective 3 Provide functional phone system for all faculty/staff and students.

### 1 Assessment and Benchmark

Benchmark: Maintain 99.99% (industry standard) uptime during peak academic seasons and hours for the campus phone system. Peak hours are defined as 7 days per week/24 hours per day during an academic term, except where scheduled maintenance of the network is planned. Uptime will be calculated by dividing the measured uptime by the available number of hours in a year (8760).

#### 1.1 Data

Academic Year	% of Uptime	Downtime (hours)
2016-2017	100%	0
2017-2018	100%	0

#### 1.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

- Expected level of achievement was satisfactory. Continue to assess and monitor phone system for potential problems. Continue implementation of VoIP (Voice over IP) system to supplement/replace aging traditional phone system.
- Currently over 300 directory numbers have been migrated to the VoIP system

2017-2018

Expected level of uptime was satisfactory. The redundant systems allow IT staff to perform upgrades without loss of service. The primary problem observed is users locking out their voice mail Pin.

Items to be worked on for the following year:

- Finish migration of all directory numbers, by December 2018.
- Investigate options for self-help Pin reset on voice mail system.

## 2 Assessment and Benchmark

Benchmark: Keep the quality of the phone system technician opinion survey above 4.0 out of 5 on questions.

### 2.1 Data

Academic Year	Survey Ranking
2013-2014	3.60/5
2014-2015	3.84/5
2015-2016	4/5
2016-2017	4.39/5
2017-2018	4.34/5

#### 2.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Continue to monitor satisfaction levels.

2017-2018:

Transition to new phone system continues to be successful with minimal issues. This is the primary factor for the survey results improving. The new phone system is easier to maintain and all IT staff members can now provide assistance rather than just one appointed phone technician. Based on survey results, IT will continue migration efforts onto the new system.

## Performance Objective 4 Provide radio station (KBYS) as a means of self-promotion and community engagement.

### 1 Assessment and Benchmark

Benchmark: Work with Director of University Events to promote all McNeese related affairs.

#### 1.1 Data

2016-2017:

KBYS made numerous announcements on the air and on social media about McNeese related events. These include, but are not limited to, the following:

- McNeese registration periods
- Leisure Learning programs
- Alumni Phonathon
- McNeese Professor lectures
- Lake Charles Symphony
- SAGE Series
- Small Business seminars
- Career Fairs
- Season ticket sales for Athletics
- McNeese Preview Days
- Heart 5k run for Christus Foundation
- McNeese Grad Fest
- Live at the Lakefront community concerts
- McNeese Banners Series
- 1000 trees in 1000 days event
- MusicMakers2U instrument drive
- Sesquicentennial of the City of Lake Charles
- McNeese Band London trip fundraiser
- SEED Center pitch competition

2017-2018:

KBYS made numerous announcements on the air and on social media about McNeese related events. These include, but are not limited to, the following:

- Governor's Program for Gifted Children
- Ward 3 Recreation programs

- Ad & press Club fundraiser for McNeese scholarships
- McNeese Homecoming events
- MusicMakers2U musical instrument donations
- McNeese Chamber Singers concert
- McNeese Faculty Senate public meeting on higher ed funding
- McNeese Pre-Vet society fundraiser
- McNeese Ducks Unlimited
- McNeese Ag tree-planting program
- Student Art Sale
- Lake Charles Community Band concerts
- Avenue of Flags
- McNeese Job Fair
- MLK Foundation - MLK Day events
- Families Helping Families - IEP workshop
- McNeese Theatre performances
- McNeese Autism program
- McNeese Education Dept. Geaux Teach program
- McNeese Book Store - Personal touch account
- McNeese Baseball/Softball tickets
- McNeese Faculty recital
- McNeese Visual Arts Gumbowl fundraiser
- Engineering Week events
- McNeese Wind Symphony concert
- Greek Week activities
- Gradfest
- Sage Program events
- Israeli Project
- McNeese Chorus concert
- Banners 2018 events
- Alpha Delta Phi volleyball tournament
- McNeese summer/fall Registration
- McNeese Leisure Learning courses
- La. Small Business Development workshops
- McNeese Summer Reading Clinic
- McNeese Alumni Association crawfish boil
- McNeese orientation sessions
- McNeese football season tickets
- Cowgirl Basketball camps
- SLC softball tournament
- McNeese RNs honored
- McNeese Soccer Camp
- Phi Mu Alpha gaming fundraiser
- Cowgirl Kicker Kuties Camp
- McNeese Harp Camp
- McNeese Basketball Camps - Heath Schroyer
- Cowboy Up Football Camp
- McNeese Band Summer Academy
- Cowboy Camp for freshmen

### **1.1.1 Analysis of Data and Plan for Continuous Improvement**

2016-2017:

Continue working with Director of University Events to promote McNeese-related affairs.

2017-2018

Very pleased with the increase in event coverage from last year. The process of getting information to KBYS and then on-air has become more streamlined. Staff will strive to maintain this process and focus on increasing listenership by doing the following this year:

- Complete transmitter and antenna upgrade to extend our coverage area.
- Begin fundraising efforts to purchase a radio station trailer to attend local events.

**Performance Objective 5 Provide state-of-the-art technology solely for the purpose of supporting and improving student life and learning (TASC).**

**1 Assessment and Benchmark**

Benchmark: Fund projects that meet the three focus areas of TASC:

1. Student computing laboratories;
2. Network access & electronic services; and
3. Instructional technology & curriculum support

**1.1 Data**

2016-2017:

Funded projects for Focus Area 1:

- 10 new computers for College of Education labs
- 50 new computers for College of Business labs
- 16 new computers for piano lab
- Various instrumentation & software enhancements to engineering labs
- Various instrumentation enhancements for ag science, biology & chemistry

Funded projects for Focus Area 2:

- \$25k set aside for network/electronic services in proposed new Student Union

Funded projects for Focus Area 3:

- Laptops for Autism Program
- 9 computers for classroom instruction in Farrar
- 88" interactive learning system for College of Education
- CAPSIM, QuickBooks, & Palisade software for Business
- Simulation models, trainers, & tablets for Nursing
- Smart classroom for College of Liberal Arts

2017-2018:

Funded projects for Focus Area 1:

- 54 computers for College of Nursing lab
- 22 computers for English and Foreign Languages lab
- 2 iMacs for music practice rooms
- 27 computers and 2 printers for ACLC in College of Science and Agriculture
- 35 computers for Computer Science lab in Drew Hall
- 20 computers for biology lab
- 22 iMacs for visual art lab

Funded projects for Focus Area 2:

- Mobile projectors, flatbed, and microfilm scanners for use in the Library
- Broadcast console equipment for KBYS

Funded projects for Focus Area 3:

- 11 computers for College of Business lecture rooms
- 2 laptops for training and assistance with Volunteer Income Tax Assistance Program
- Smart classroom for College of Business (BBC 119)
- Classroom management software for College of Liberal Arts
- 8 computers for College of Science lecture rooms in Kirkman Hall
- A real time PCR machine for Biology & Health Sciences
- 2 smart classrooms for Ag Sciences in Gayle Hall (212 & 301)
- 5 computers and software for the training of student interns in Masters of Psychology
- 5 computers in McNeese Autism Program for student observation
- Various types of STEM equipment for Department of Education Professions
- Recording cameras for student teaching review



- 3 laptops in Health & Human Performance for American Red Cross First Aid courses
- 5 computers for Health & Human Performance lecture rooms
- Microscope camera attachments for microbiology

### 1.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Continue to fund projects within focus areas with the most impact for student success.

2017-2018:

The primary problem observed is IT continues to see work orders for failing equipment in labs and classrooms. These issues, however, are not being addressed through technology proposals. The following will be done before and during technology proposal periods:

- Meet with department heads and/or deans and provide data, via work tickets submitted, on equipment that is having frequent failures.
- Have colleges focus on maintaining/replacing existing equipment before submitting for new technology.
- Assist with quotes and proposal writing as necessary.

## 2 Assessment and Benchmark

Benchmark: Keep the quality of TASC coordinator opinion survey above 4.0 out of 5 on questions.

### 2.1 Data

Academic Year	Survey Ranking
2013-2014	4.13/5
2014-2015	4.14/5
2015-2016	3.60/5
2016-2017	3.71/5
2017-2018	3.48/5

### 2.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Decrease from last year. Survey will be suspended until health conditions for TASC coordinator improve.

2017-2018:

Opinion survey continues to decline as the TASC coordinator continues to have health issues. The following will be implemented to improve support for TASC funded projects and equipment:

- Move TASC personnel into IT building for efficient communication with other IT staff.
- Bring all TASC functions under IT Tech Support services. This will provide faster response for support issues and project implementation.
- Continue educating campus community that TASC should be viewed as a funding source and not a separate branch of IT.

## Performance Objective 6 Provide reliable services that ensure student success and efficient operations for all University departments.

### 1 Assessment and Benchmark

Benchmark: Ensure that critical services (Banner, Moodle, email, BDMS, etc.) stay up-to-date and maintain 99.99% (industry standard) uptime during peak academic seasons and hours.

### 1.1 Data

Academic Year	% of uptime	Hours of downtime
2016-2017	100%	0
2017-2018	99.95%	4

2016-2017 upgrades performed:

- Moodle – 2.9 to 3.2.3
- Banner

- Student – 8.8.4 to 8.13.1
- General – 8.8.4 to 8.13.1
- Financial Aid – 8.26.1 to 8.29
- Payroll – 8.12.2 to 8.13
- Finance – No change
- Accts Receivable – 8.4.1 to 8.5.2
- Moved Degree Works from test to production
- Installed new virtualization servers for campus and disaster recovery site in Ruston

2017-2018 upgrades performed:

- Moodle - no change
- Banner 8
  - Student - 8.13.1 to 8.15
  - General - 8.13.1 to 8.10.1
  - Financial Aid - 8.29 to 8.32.0.2
  - HR/Payroll - 8.13 to 8.14.1.6
  - Position Control - 8.14
  - Finance - 8.11.1.9
  - Accts Receivable - 8.5.2 to 8.5.3.1
- Banner 9 in TEST
  - Student - 9.3.10.0.6
  - General - 9.3.9.0.4
  - Financial Aid - 9.3.8.0.3
  - HR/Payroll - 9.3.6.0.3
  - Position Control - 9.3.6.0.3
  - Finance - 9.3.7.0.2
  - Accts Receivable - 9.3.6.1.2
- Performed technical integration of Hobson's with Banner
- Configured SSN masking in TEST INB
- Configured new HOLDS processing in TEST INB

### 1.1.1 Analysis of Data and Plan for Continuous Improvement

2016-2017:

Expected level of achievement was satisfactory. Continue to monitor uptime levels and perform upgrades as necessary.

2017-2018:

Downtime was caused by Oracle database issue. Issue was identified and resolved.

Planned upgrades for Banner system by the end of December 2018:

- Banner 9 in PROD
- SSN masking in PROD
- HOLDS processing in PROD
- BDM - 8.6 to 16.3
- Workflow - 8.3 to 8.5
- DegreeWorks - 4.1.4 to 5.0

## 2 Assessment and Benchmark

Benchmark: Keep the quality of the University Computing Services Survey above 4.0 out of 5 on questions.

### 2.1 Data

Academic Year	Survey Ranking
2013-2014	4.17/5
2014-2015	4.17/5
2015-2016	N/A
2016-2017	4.38/5
2017-2018	4.28/5

### **2.1.1 Analysis of Data and Plan for Continuous Improvement**

2016-2017:

Continue to monitor satisfaction levels.

2017-2018:

Survey shows satisfactory results for efficiency, timeliness, and professionalism. UCS staff will continue efforts during the transition to Banner 9.

The two lowest survey results involved the Portal (MyMcNeese) and email (Zimbra). The following items to be worked on to improve these results:

- Renew efforts to bring Ellucian portal into production.
- Migrate faculty/staff email to Microsoft Office 365 solution. This system will provide additional features, improved user interface, and easier integration with end-user devices.