
Software Requirements Specification

for

FTCS V2.0

Version 1.0 approved

Prepared by Zack Bunch, Erin Lorelle, James Poff, Blaise Onyiaike

East Tennessee State University

Fall 2018

Table of Contents

Table of Contents ii

1. Project Identification and Definition 1

1.1 Project Name 1

1.2 Contact information of Project sponsor(s)..... 1

1.3 Business Need 1

1.4 User Roles 1

1.5 User Functionalities 1

1.6 Expected Value of the system 2

1.7 Any special issues or considerations 2

1.8 Glossary of Terms 3

1.9 Priority List of functionalities..... 3

2. Application Wide Non-Functional Requirements..... 3

2.1 Product Perspective Product 3

2.2 Product Functions 3

2.3 User Classes and Characteristics 3

2.4 Operating Environment 4

2.5 Design and Implementation Constraints..... 4

3. System Architectural Diagram 4

3.1 Communications Interfaces 4

4. Glossary 5

5. Detailed User Stories..... 6

5.1 Admin Responsibilities..... 6

5.2 Dean Responsibilities 20

5.3 Credential Officer Responsibilities 23

5.4 General/Any User Responsibilities 26

6. Appendix..... 68

6.1 Sequence Diagrams 68

1. Project Identification and Definition

1.1 Project Name

FTCS V2.0

1.2 Contact information of Project sponsor(s)

Dr. Jeff Roach (roachj@etsu.edu)

1.3 Business Need

The legacy Faculty Teaching Credential System needs to be reengineered to current technologies to improve requested functionality and provide an intuitive interface for data management.

1.4 User Roles

- Administrator
- Dean
- Credential Officer
- General User

1.5 User Functionalities

Admin Responsibilities

1. Admin should be able to log in:
 - a. As a Dean
 - b. As a Credential Officer
2. Admin shall be able to manage the Credential Officers for each department.
3. Admin shall be able to update database using ITS data dump.

Dean Responsibilities

4. Dean shall be able to set the instructors in his/her college

Credential Officer Responsibilities

5. Credential Officer shall be able set the credentials of any instructor who teaches in his/her department.

General/Any User Responsibilities

6. Any user shall be able to view Instructor details: credentials, previous education
 - a. Search by department
 - b. Searcy by faculty name
 - c. Search by course
7. Any user shall be able to view and save reports:
 - a. Faculty roster
 - b. GA roster
 - c. Faculty credentials

- d. Course section / qualifications percentage
8. Any user shall be able to view:
 - a. Mission statement
 - b. ETSU's teaching credential standards
 - c. SACS credential guidelines
 - d. Graduate / Faculty appt
 - e. Instructions to chair
9. Any user shall be able to view a Help page
10. Any user shall be able to view a Contact page

1.6 Expected Value of the system

System needed to track credentials for each instructor and course taught by instructor – tracks if instructor is qualified to teach specific course. Also shows all instructors who are qualified to teach a course as well as course descriptions. System needed to maintain SACS accreditation. System will allow the admin to quickly import data every Friday using an efficient user interface.

1.7 Any special issues or considerations

- Website only accessible on ETSU campus.
- Data dump performed every Friday from Excel and text file.
- Marsh Grube is key person (silent manager) who oversees site and is main decision-maker.
- Marsh Grube adds new user – no user registration link online.
- Originally developed in ASP – old technology but doesn't need to be reengineered in ASP.
- We won't have access to all functionality – users with higher access (I.e., dept chair).
- Two aspects:
 - Data Acquisitions Model – end on Friday followed by data dump. Console pulls into database.
 - Web itself – currently in Excel and text file and read from application to database. Wants web interface.
- LDAP or active directory to authenticate username and password
- Core or .net preferred
- SACS (Southern Association of Colleges and Schools) accreditation every ten years. SACS pulls reports from this site; last used one/two years ago
- Previously engineered in ASP.net core and MVC
- C# preferred
- SQL Server for Database
- Functional, but revamp needed as soon as possible due to obsolete existing technology
- Originally developed in 2008-2009 capstone
- Develop an intuitive user interface, for uploading data files to the website for generating reports.
- Reengineer webpages to be updated asynchronously.

1.8 Glossary of Terms

ASP	Action Server Pages - Framework for building dynamic web pages
Asynchronously	Not existing or happening at the same time
C#	General purpose programming language
LDAP	Server that authenticates login username and password
MVC	Model View Controller – Framework for building dynamic web pages
SACS	Southern Associates of Colleges and Schools – accreditation every ten years
SQL SERVER	A relational database management system developed by Microsoft

1.9 Priority List of functionalities

4,7,10, 1, 2, 3, 5, 6, 8, 9

2. Application Wide Non-Functional Requirements

2.1 Product Perspective Product

FTCS V2.0 is a replacement for an existing system with improved requested functionality such as providing an intuitive interface for data management.

2.2 Product Functions

- *Site shall show updated data within five minutes after data dump is completed*
- *Faculty list shall be easily accessible from any page within the site*
- *Department list shall be easily accessible from any page within the site*
- *Course list shall be easily accessible from any page within the site*
- *Reports shall be easily accessible from any page within the site*
- *The search functions within the faculty, department, and course lists shall retrieve data within five seconds*
- *The filter functions in all reports shall retrieve filtered data within five seconds*
- *System shall be available on East Tennessee State University campus with no downtime*

2.3 User Classes and Characteristics

*Admin: Has login credentials that allow the administrator to emulate a dean or credential officer.
Admin login credentials has access to manage the credential officers for each department.
The admin login credentials can update the database using the ITS data dump.*

Dean: Has login credentials that allow access to faculty credentials within the credential officer's college. Login credentials allow the credential officer to update the credentials for faculty within his/her college.

Credential Officer: Has login credentials that allow access to faculty credentials within the credential officer's department. Login credentials allow the credential officer to update the credentials for faculty within his/her department.

User: No login credentials, but able to view faculty credentials and print all reports.

2.4 Operating Environment

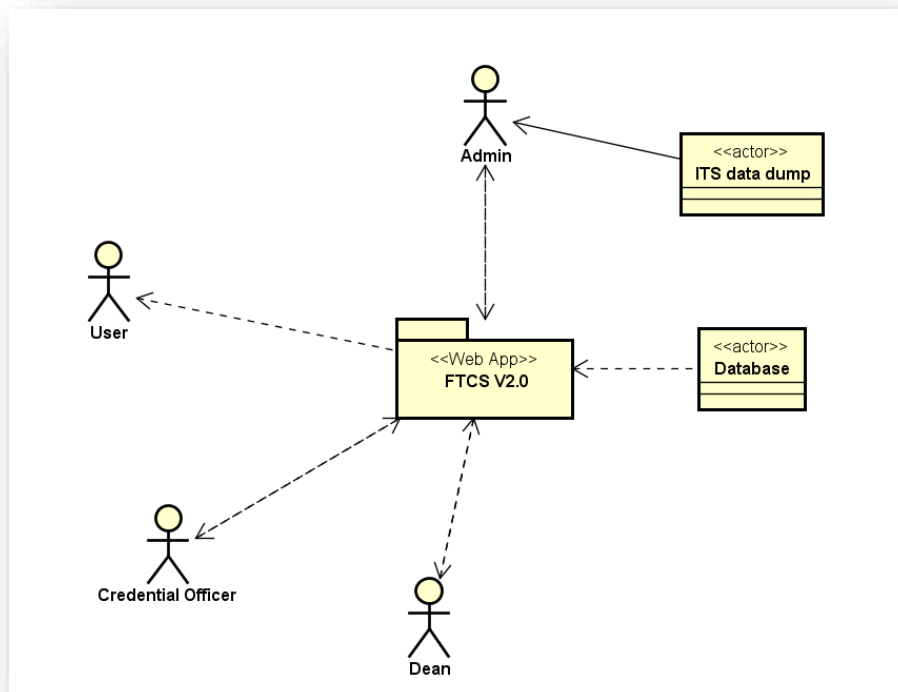
The FTCS V2.0 system shall be available on East Tennessee State University campus with no downtime.

2.5 Design and Implementation Constraints

The FTCS V2.0 system is only available on East Tennessee State University campus.

3. System Architectural Diagram

3.1 Communications Interfaces

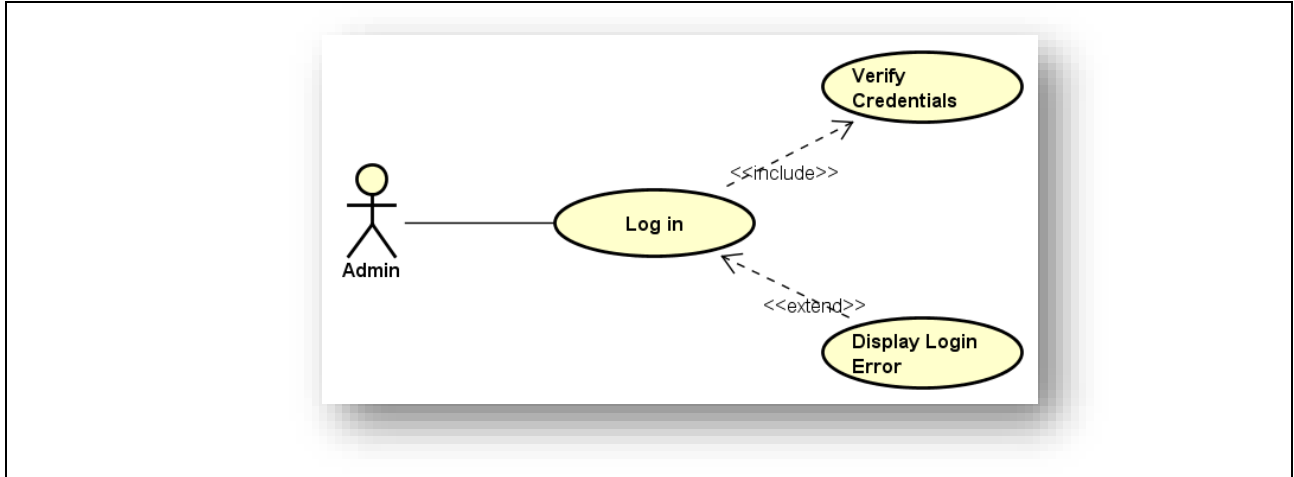


4. Glossary

Item	Definition
Academic Degree	Level of achievement in field of study
Admin	Administrator over the FTCS V2.0 System
ASP	Action Server Pages - Framework for building dynamic web pages
Asynchronously	Not existing or happening at the same time
C#	General purpose programming language
College	A general division of department within the university
Course	A class within a department taught by a faculty member
Course Code	A unique identifier applied to each course
Credential	Qualification for teaching a course
Credential Officer	Person assigned to a department to set credentials of instructors within that department
Dean	Person assigned to a college to set credentials of instructors within a college
Department	Division of study within a college that contains classes
Department Code	A unique identifier applied to each department
Faculty	Person who teaches a course
GUI	Graphical User Interface – Tool that allows the admin to interact with the Data Dump
LDAP	Server that authenticates login username and password
MVC	Model View Controller – Framework for building dynamic web pages
Password	Individually chosen identifier used to login and access profile
SACS	Southern Associates of Colleges and Schools – accreditation every ten years
SQL SERVER	A relational database management system developed by Microsoft
Start Year	Initial starting year of faculty
User	Any person viewing the website
Username	Identifier automatically assigned to a user account

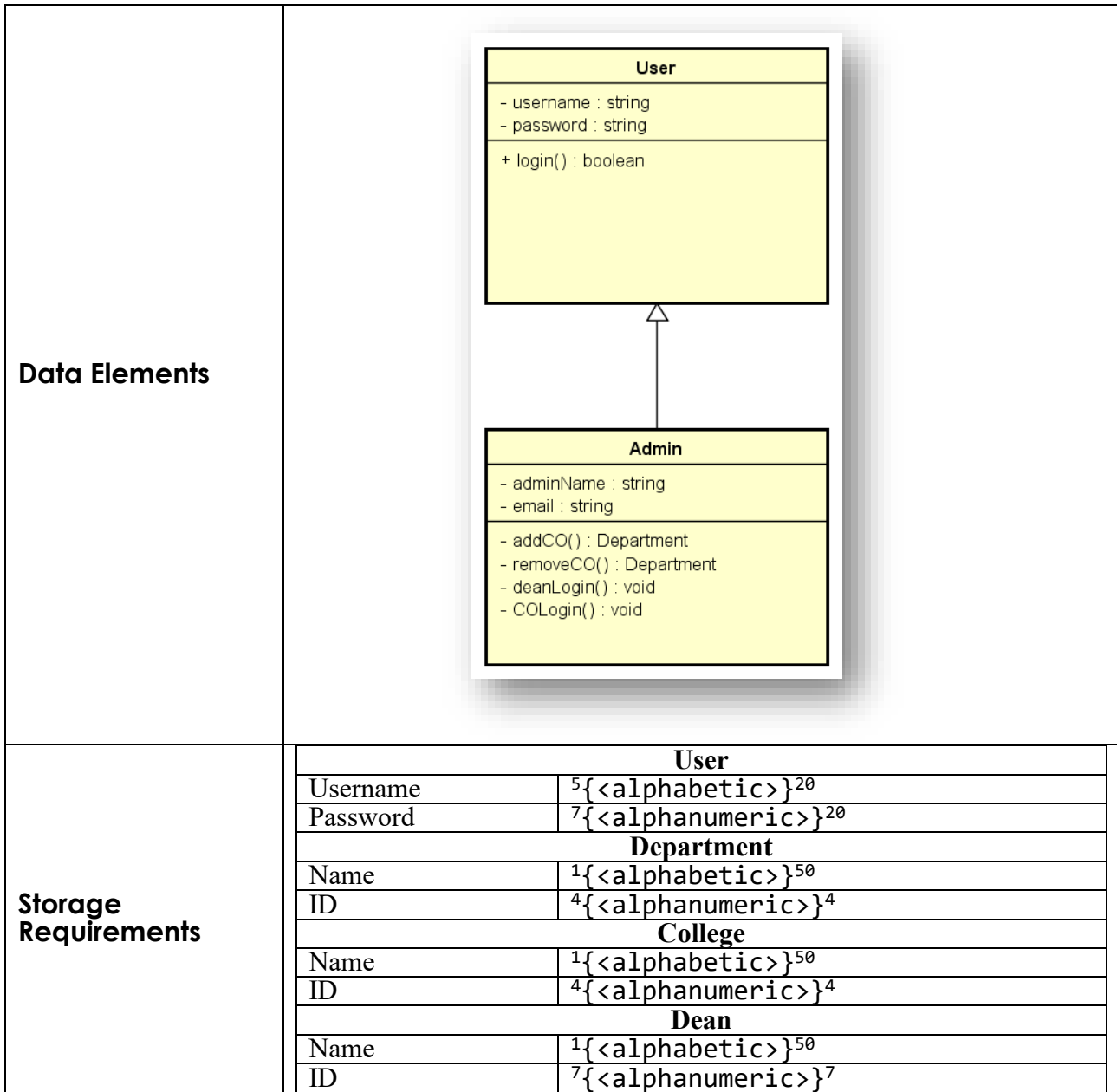
5. Detailed User Stories

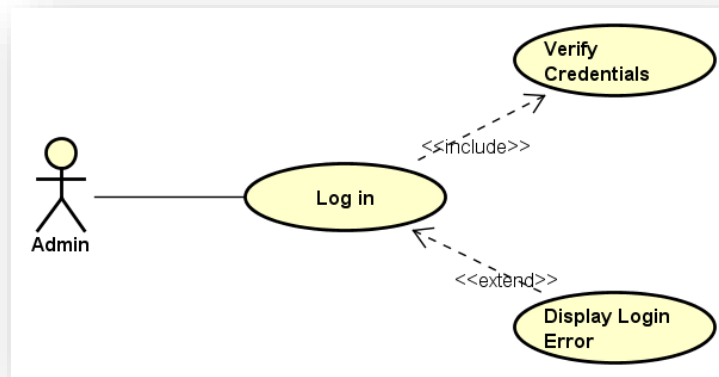
5.1 Admin Responsibilities



Requirements ID: REQ0001a-AdminLoginDean	
Primary Actors: Admin	
Use Case Name: Admin logs in as a Dean	Importance Level: High
Stakeholders:	Administrator
Requirement:	Admin should be able to log in: a. As a Dean
Story:	As the admin I would like to be able to login to the system to accomplish various tasks as myself or as a dean
Quality Requirements:	The admin should be able to login in under three minutes
Pre-Conditions:	I the admin, am on the homepage
Post-Conditions:	Success: 1. I am logged in
Relationships:	None
Trigger:	Trigger Type: External I select 'Sign in'

<p>Normal Flow of Events:</p>	<ol style="list-style-type: none"> 1. The system responds with the login screen (<host>/login/) 2. I enter my username <ol style="list-style-type: none"> 2.1. Username <ol style="list-style-type: none"> 2.1.1. <Username> ::= ⁵{< alphabetic >}²⁰ 3. I enter my password <ol style="list-style-type: none"> 3.1. Password <ol style="list-style-type: none"> 3.1.1. <Password> ::= ⁷{< alphanumeric >}²⁰ 4. I select 'Login' 5. The system responds with the admin homepage (<host>/adminIndex/) 6. I select the desired college 7. I select 'Enter as Dean' 8. The system responds with the dean homepage (<host>/deanIndex/) 9. I select 'Logout' 10. The system responds with the login page (<host>/login/)
<p>Alternative flow:</p>	<p>[Canceled]</p> <ol style="list-style-type: none"> 1. I issue the 'Cancel' command 2. The system responds with the login page (<host>/login/)
<p>Exception flow</p>	<p>[Username is incorrect]</p> <ol style="list-style-type: none"> 1. The system displays an error message <ol style="list-style-type: none"> 1.1. "Incorrect username or password." <p>[Password is incorrect]</p> <ol style="list-style-type: none"> 2. The system displays an error message <ol style="list-style-type: none"> 2.1. "Incorrect username or password."
<p>Behavioral Flow</p>	<pre> graph LR Start(()) --> LoggingIn[Logging in] LoggingIn -- "Enter Credentials" --> Decision{ } Decision -- "[Login Success]" --> LoggedIn[Logged in] LoggedIn -- "Trigger" --> End((())) Decision -- "[Login Failed]" --> LoginError[Login Error] LoginError --> LoggingIn </pre>

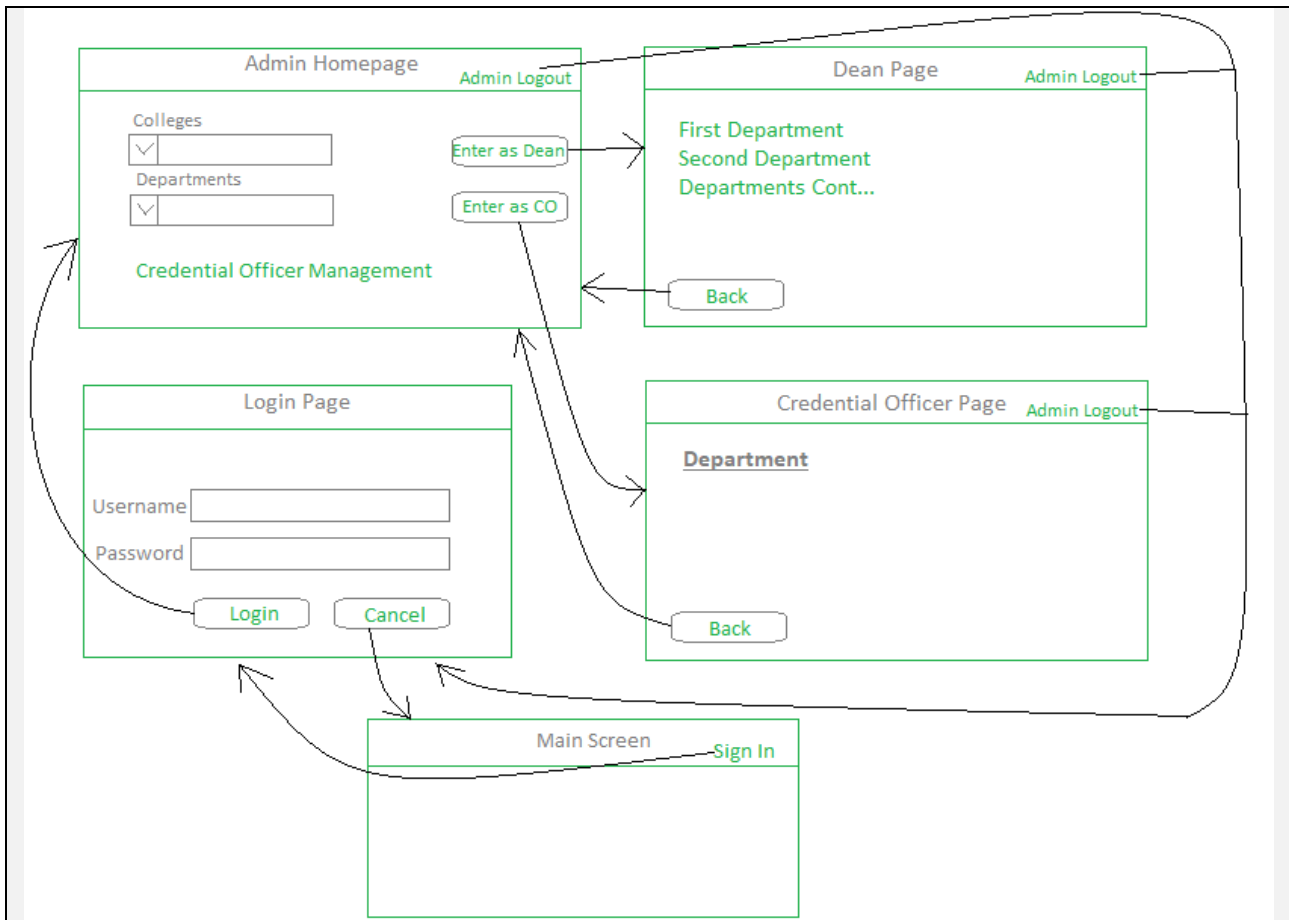


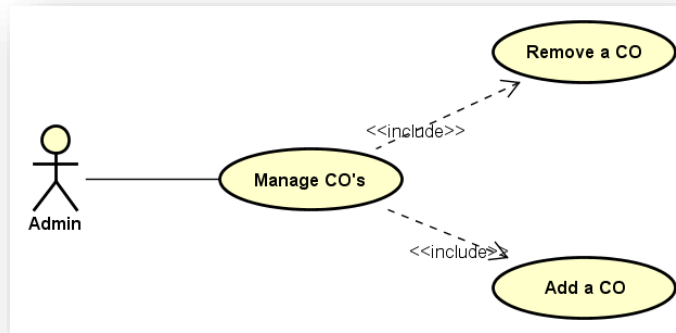


Requirements ID: REQ0001b-AdminLoginCO	
Primary Actors: Admin	
Use Case Name: Admin logs in as a CO	Importance Level: High
Stakeholders:	Administrator
Requirement:	Admin should be able to log in: b. As a Credential Officer
Story:	As the admin I would like to be able to login to the system to accomplish various tasks as myself or as a credential officer
Quality Requirements:	The admin should be able to login in under three minutes
Pre-Conditions:	I the admin, am on the homepage
Post-Conditions:	Success: 2. I am logged in
Relationships:	None
Trigger:	Trigger Type: External I select 'Sign in'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. The system responds with the login screen (<host>/login/) 2. I enter my username <ol style="list-style-type: none"> 2.1. Username <ol style="list-style-type: none"> 2.1.1. <Username> ::= ⁵{< alphabetic >}²⁰ 3. I enter my password <ol style="list-style-type: none"> 3.1. Password <ol style="list-style-type: none"> 3.1.1. <Password> ::= ⁷{< alphanumeric >}²⁰ 4. I select 'Login' 5. The system responds with the admin homepage (<host>/adminIndex/) 6. I select the desired department 7. I select 'Enter as CO' 8. The system responds with the CO homepage (<host>/coIndex/) 9. I select 'Logout' 10. The system responds with the login page (<host>/login/)

<p>Alternative flow:</p>	<p>[Canceled]</p> <ol style="list-style-type: none"> 1. I issue the 'Cancel' command 2. The system responds with the login page (<host>/login/)
<p>Exception flow</p>	<p>[Username is incorrect]</p> <ol style="list-style-type: none"> 1. The system displays an error message <ol style="list-style-type: none"> 1.1. "Incorrect username or password." <p>[Password is incorrect]</p> <ol style="list-style-type: none"> 2. The system displays an error message <ol style="list-style-type: none"> 2.1. "Incorrect username or password."
<p>Behavioral Flow</p>	<pre> graph LR Start(()) --> LoggingIn[Logging in] LoggingIn -- "Enter Credentials" --> Decision{ } Decision -- "[Login Success]" --> LoggedIn[Logged in] LoggedIn -- "Trigger" --> End((())) Decision -- "[Login Failed]" --> LoginError[Login Error] LoginError --> LoggingIn </pre>
<p>Data Elements</p>	<pre> classDiagram class User { - username : string - password : string + login() : boolean } class Admin { - adminName : string - email : string - addCO() : Department - removeCO() : Department - deanLogin() : void - COLogin() : void } User < -- Admin </pre>

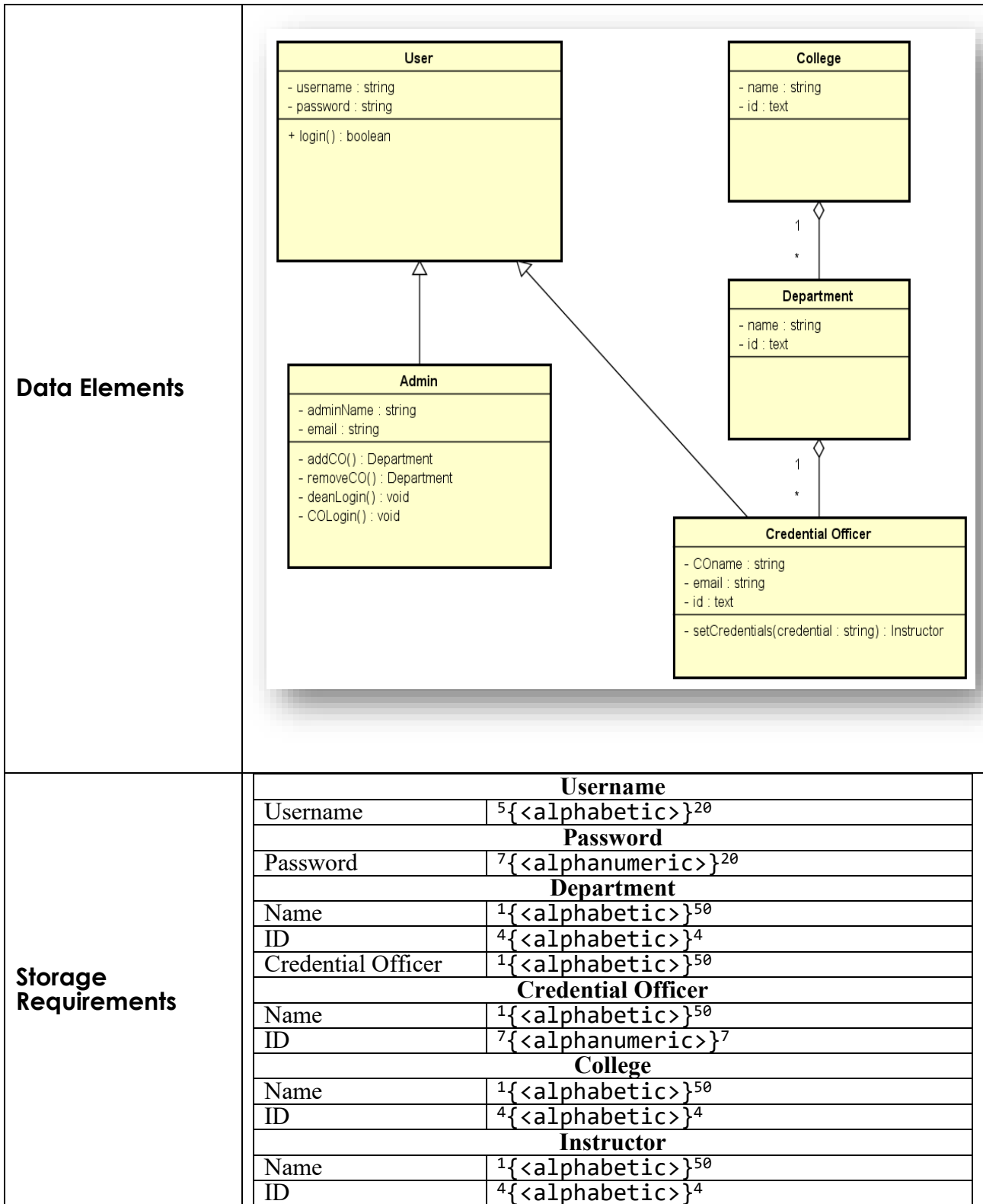
Storage Requirements	User	
	Username	5{<alphanumeric>}20
	Password	7{<alphanumeric>}20
	Department	
	Name	1{<alphanumeric>}50
	ID	4{<alphanumeric>}4
	College	
	Name	1{<alphanumeric>}50
	ID	4{<alphanumeric>}4
	Credential Officer	
Name	1{<alphanumeric>}50	
ID	7{<alphanumeric>}7	

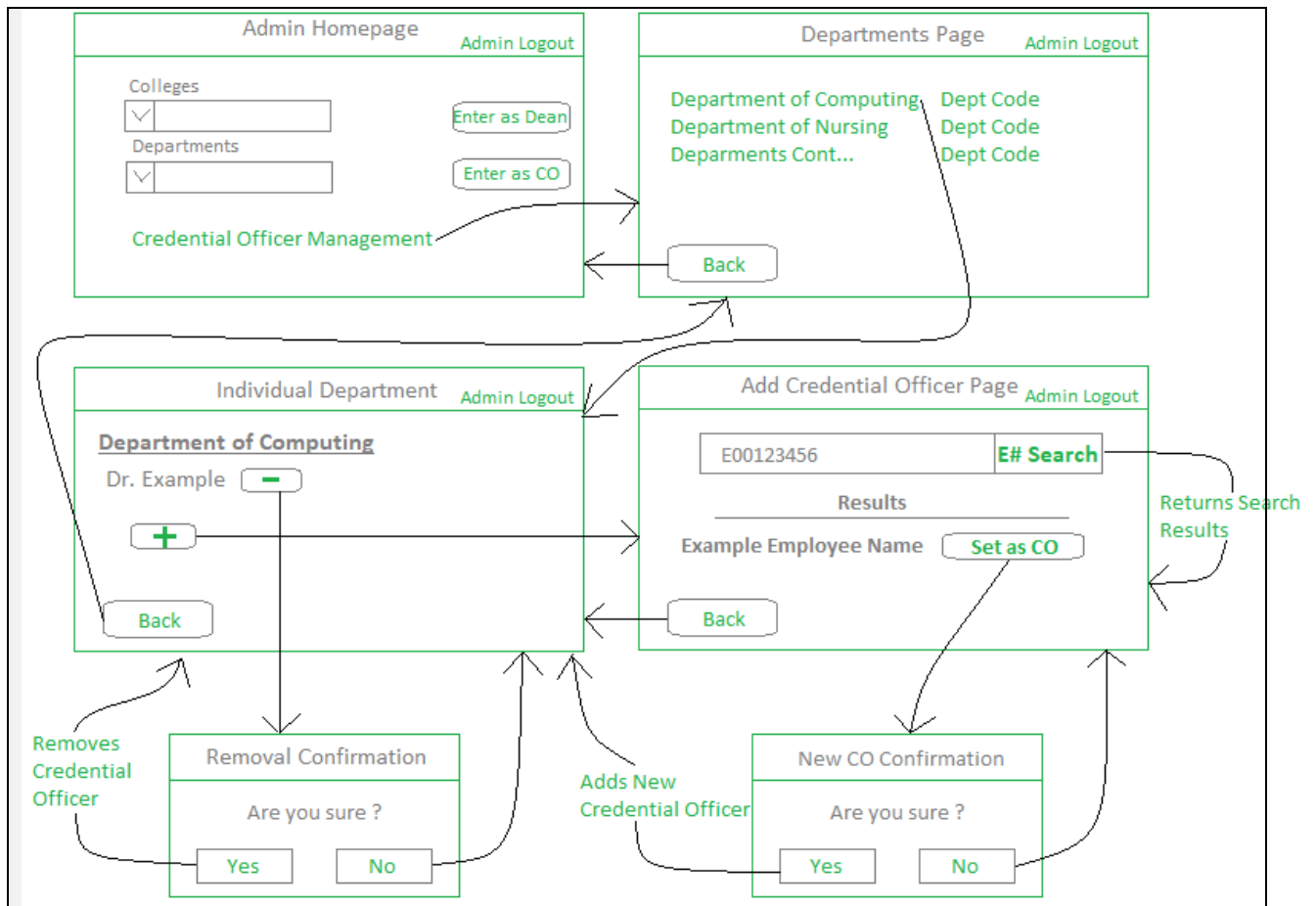


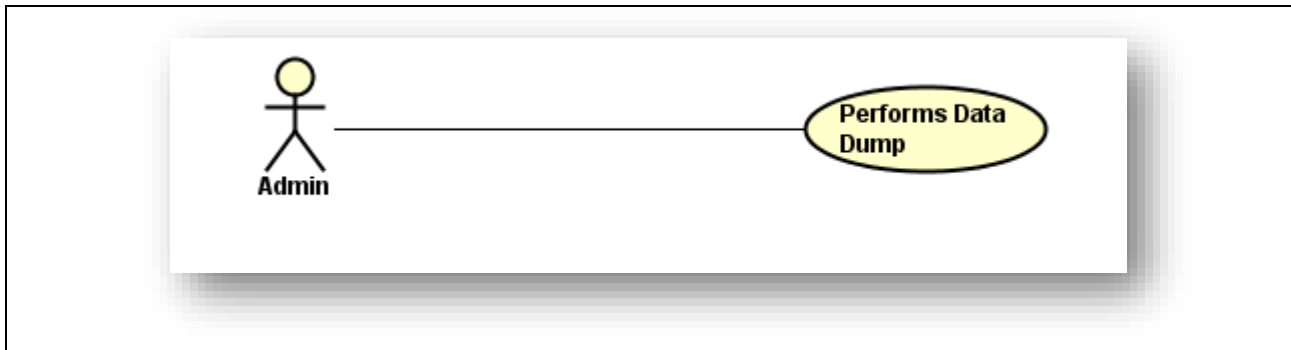


Requirements ID: REQ0002-AdminCredManage	
Primary Actors: Admin	
Use Case Name: Admin Manages Credential Officers	Importance Level: High
Stakeholders:	Admin, Credential Officers
Requirement:	Admin shall be able to manage the credential officers for each department
Story:	As the admin I need to be able to set credential officers for all departments in the institution.
Quality Requirements:	The admin should be able to add or remove credential officers in under five minutes
Pre-Conditions:	I am logged in as the admin
Post-Conditions:	Success: 1. I have added a credential officer to a department 2. I have removed a credential officer from a department
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	1. The system responds with the CO Departments page (<host>/credOff/departments) 2. I select a department 3. The system responds with the Current Officers page for that department (<host>/credOff/departments/{index}) 4. I select 'Add' 5. The system responds with the Instructors page (<host>/credOff/faculty) 6. I select 'Set as CO' 7. The system responds with a confirmation message defaulting to 'No' 8. I select 'Yes' 9. The system adds that instructor as a credential officer for that department 10. The system responds with the department CO listing page (<host>/credOff/departments)

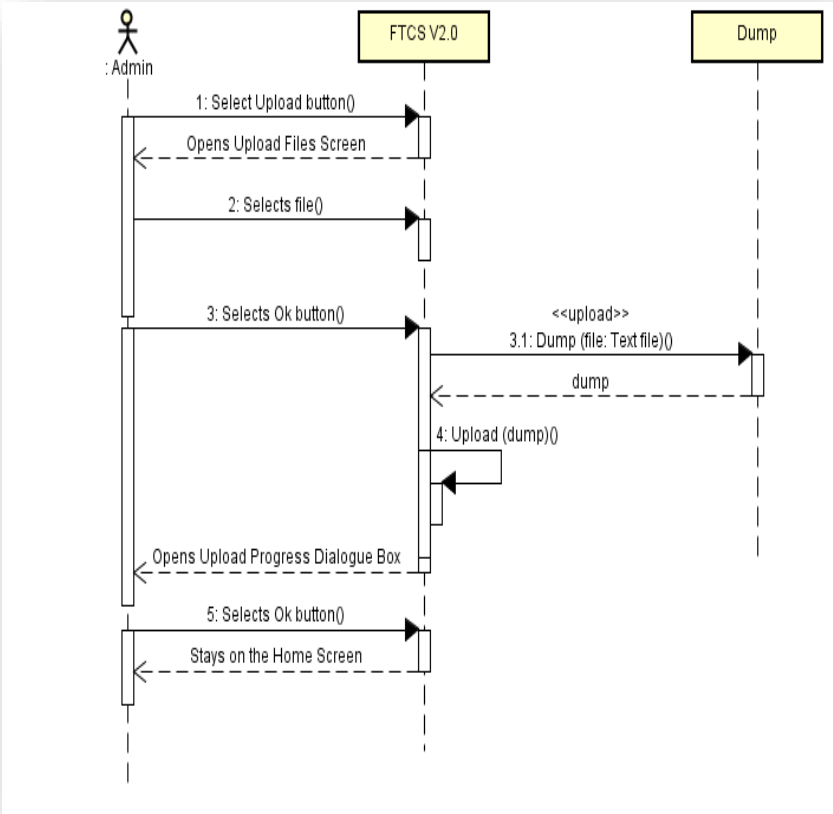
<p>Alternative flow:</p>	<p>[Remove a CO] [Include: steps 1-3 of normal flow] 4. I select 'Remove' 5. The system responds with a confirmation message defaulting to 'No' 6. I select 'Yes' 7. The system removes the CO from that department 8. The system responds with the department CO listing page (<host>/cred0ff/departments)</p> <p>[Canceled] 1. I issue the 'Back' command 2. The system responds with the admin home page (<host>/adminHome/)</p>
<p>Behavioral Flow</p>	<pre> graph LR Start(()) --> AdminHome[Admin Home] AdminHome -- "Selects CO Management" --> DeptSel[Department Selection Page] DeptSel -- "Selects Return" --> AdminHome DeptSel -- "Selects a Department" --> COList[CO Listing Page] COList -- "Selects Return" --> DeptSel COList -- "Selects Add" --> AddCOPage[Add CO Page] AddCOPage -- "Selects Return" --> COList AddCOPage -- "[Cancel]" --> End((())) AddCOPage -- "Selects Set as CO" --> AddCO[Adds CO to Department] AddCO -- "Redirected" --> COList AddCO -- "[Yes]" --> AddCOPage AddCO -- "[Cancel]" --> End COList -- "Selects Remove" --> Conf{ } Conf -- "[Cancel]" --> End Conf -- "[Yes]" --> RemoveCO[Removes CO from Department] RemoveCO -- "Redirected" --> COList RemoveCO -- "Selects Return" --> End </pre>





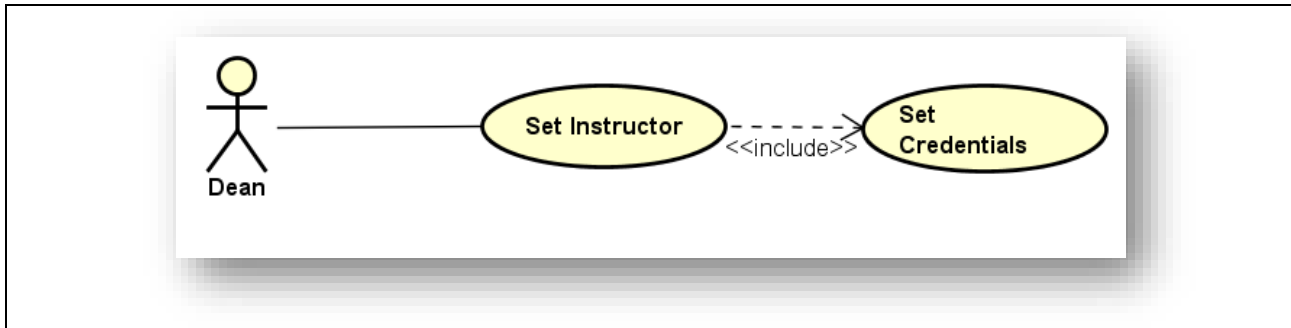


Requirements ID: REQ0003-AdminPerformsDataDump	
Primary Actors: Admin	
Use Case Name: Admin shall be able to perform data dump	Importance level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement Id:	REQ-AdminPerformsDataDump
Requirement:	The system shall allow Admin to use UI to perform ITS data dump.
Quality Requirements:	The Admin shall be able to use UI to perform ITS data dump in less than 15 minutes.
Story:	As an Admin, I want to use UI to perform ITS data dump, so that I can update the database
Pre-Conditions:	I am logged into the system as an Admin and I am on the "Home" screen
Post-Conditions:	Success 1. I have dumped the data of a text file into the database Alternative 1: 2. I do not dump the data of a text file into the database
Relationships:	None
Trigger:	Trigger Type: External I click on the "upload" button
Normal Flow of Events:	1. The system responds with the "Upload Files" screen with list of files to upload (<host>/upload) 2. I select a file(s) 3. I select "ok" button 4. The system dumps data of file into the database 5. The system responds with the "Upload Progress" dialogue box showing the upload progress of the file 6. The system displays a success message 7. I select "ok" button 8. The system stays on the "Home" screen (<host>/adminIndex)

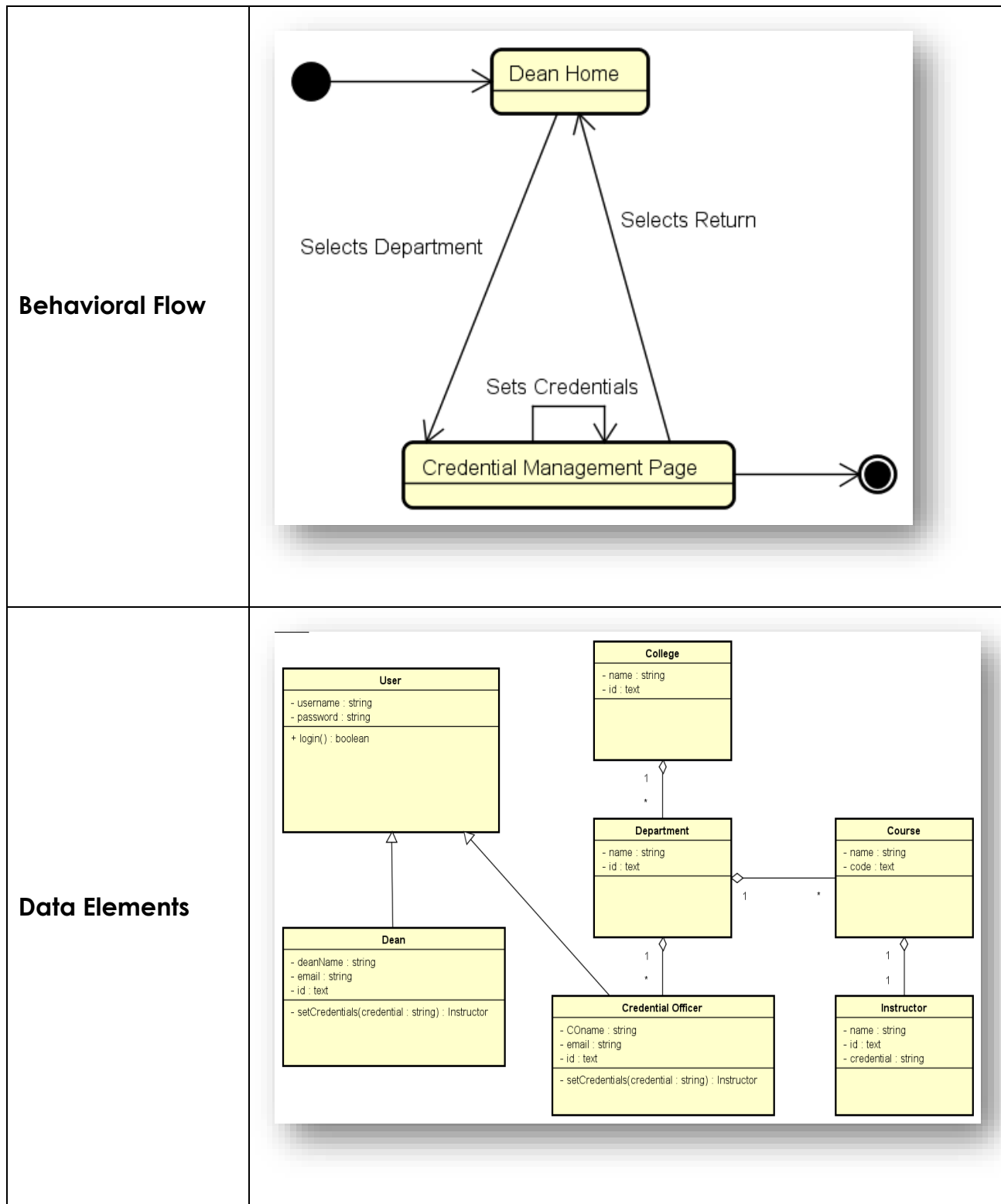
<p>Sub/Alternative/Exception flows:</p>	<p>Alternative 1: 1. I select "cancel" button 2. The system responds with the "Home" screen (<host>/adminIndex)</p> <p>Exception 1: Invalid file type 1. The system displays an error message 2. The System responds with the Home screen (<host>/adminIndex)</p>
	 <pre> sequenceDiagram actor Admin as :Admin participant FTCS as FTCS V2.0 participant Dump as Dump Admin->>FTCS: 1: Select Upload button() activate FTCS FTCS-->>Admin: Opens Upload Files Screen deactivate FTCS Admin->>FTCS: 2: Selects file() activate FTCS Admin->>FTCS: 3: Selects Ok button() activate FTCS FTCS->>Dump: <<upload>> 3.1: Dump (file: Text file)() activate Dump Dump-->>FTCS: dump deactivate Dump FTCS->>FTCS: 4: Upload (dump)() deactivate FTCS FTCS-->>Admin: Opens Upload Progress Dialogue Box deactivate FTCS Admin->>FTCS: 5: Selects Ok button() activate FTCS FTCS-->>Admin: Stays on the Home Screen deactivate FTCS </pre>

<p>Behavioral Flow</p>	<pre> graph TD Start(()) --> HomeScreen[<<UI>> Home Screen] HomeScreen -- "Select Upload button" --> UploadFilesScreen[<<UI>> Upload Files Screen do / Accepting text file] UploadFilesScreen -- "Select Cancel button" --> HomeScreen UploadFilesScreen -- "Select Ok button [File type is invalid]" --> HomeScreen UploadFilesScreen -- "Select Ok button [File type is valid]" --> UploadProgress[<<UI>> Upload Progress] UploadProgress -- "Select Ok button [Data dump completed]" --> HomeScreen </pre>
<p>Data Elements</p>	<pre> classDiagram class Dump { - File : Text file } </pre>
<p>Storage Requirements</p>	<p>None</p>

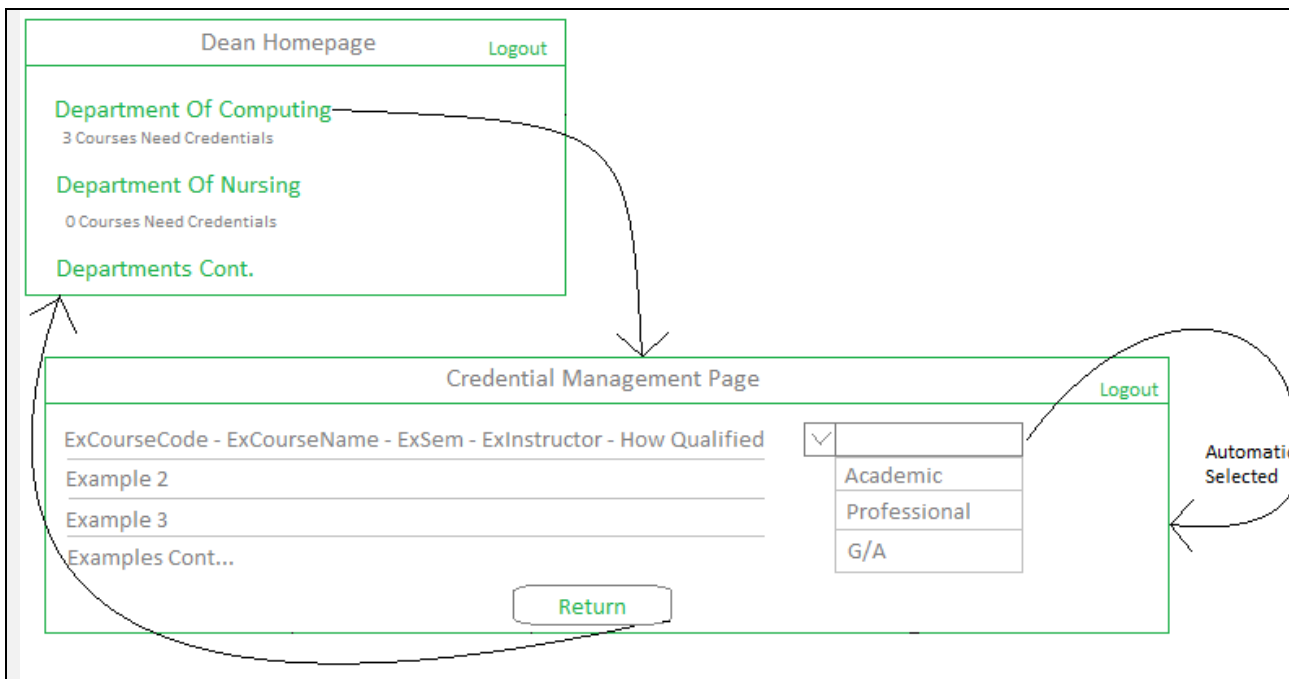
5.2 Dean Responsibilities



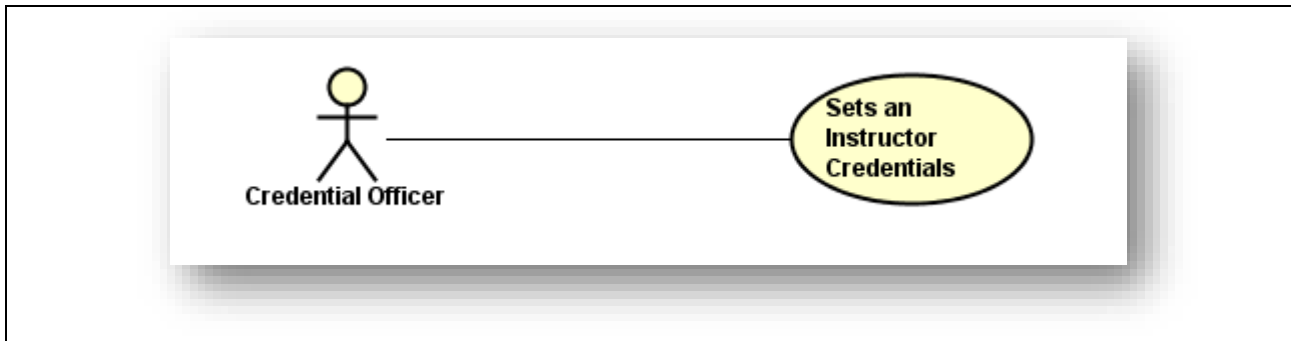
Requirements ID: REQ0004-DeanSetsCreds	
Primary Actors: Dean	
Use Case Name: Dean Sets Credentials	Importance Level: High
Stakeholders:	Dean, Instructors
Requirement:	Dean shall be able to set the credentials for any instructor teaching in his/her college
Story:	As the dean I need to be able to set credentials for instructors teaching in my college if they aren't already set
Quality Requirements:	Dean should be able to set credentials in under 5 minutes
Pre-Conditions:	I am logged in as a dean.
Post-Conditions:	Success: 1. I have set the credentials for an instructor
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	1. I select a department to set credentials within 2. The system responds with the department page (<host>/cred0ff/departments) 3. I select the desired level of qualification for a given instructor/course 4. The system updates the credentials automatically 5. The system remains on the department page (<host>/cred0ff/departments)
Alternative flow:	[Canceled] 1. I issue the 'Return' command 2. The system responds with the dean home page (<host>/deanHome/)



Storage Requirements	Username	
	Username	5{<alphanumeric>}20
	Password	
	Password	7{<alphanumeric>}20
	Department	
	Name	1{<alphanumeric>}50
	ID	4{<alphanumeric>}4
	Credential Officer	1{<alphanumeric>}50
	Credential Officer	
	Name	1{<alphanumeric>}50
	ID	7{<alphanumeric>}7
	Dean	
	Name	1{<alphanumeric>}50
	ID	7{<alphanumeric>}7
	College	1{<alphanumeric>}50
	College	
	Name	1{<alphanumeric>}50
	ID	4{<alphanumeric>}4
	Dean	1{<alphanumeric>}50
	Instructor	
	Name	1{<alphanumeric>}50
	Qualification	1{<alphanumeric>}50
	Course	
	Name	1{<alphanumeric>}50
Code	9{<alphanumeric>}9	
Credential	1{<alphanumeric>}50	
Teacher	1{<alphanumeric>}50	



5.3 Credential Officer Responsibilities

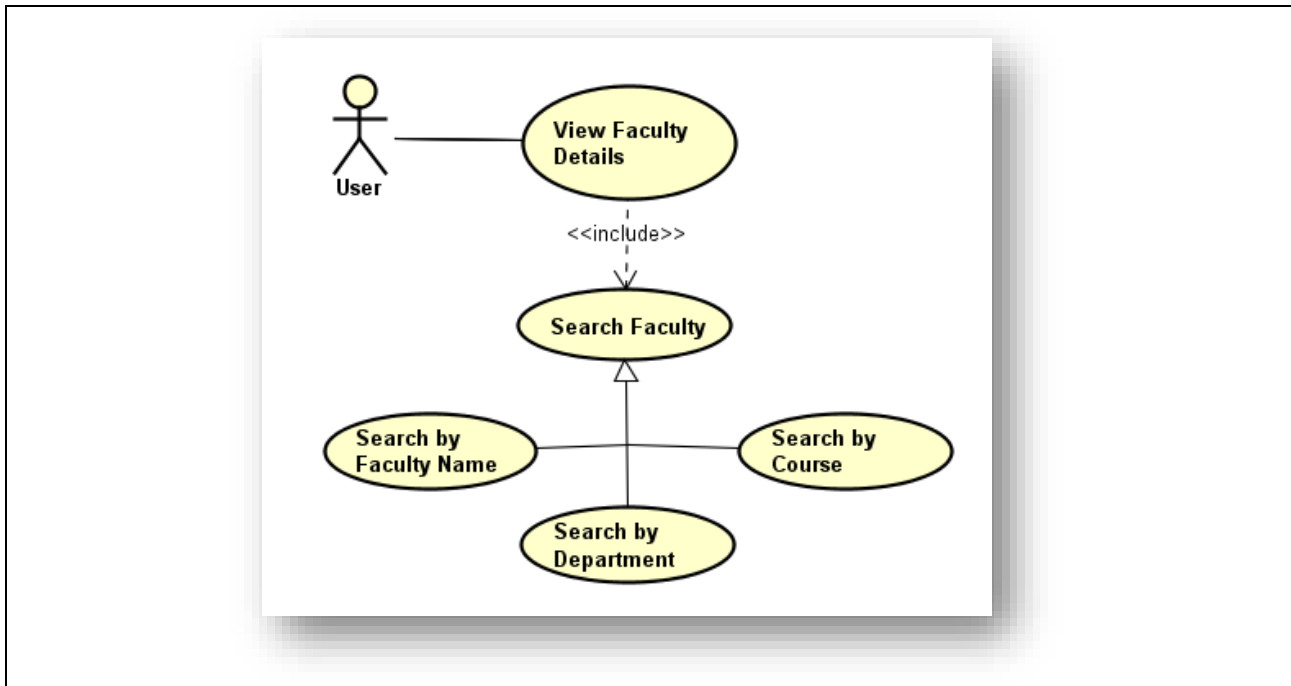


Requirements ID: REQ0005-CredentialOfficerSetInstructorCredentials	
Primary Actors: Credential Officer	
Use Case Name: Credential officer shall be able to set an instructor credentials	Importance level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow Credential officer to set the credentials of an instructor who teaches in his/her department.
Quality Requirements:	The credential official shall be able to set the credentials of an instructor who teaches in his/her department.
Story:	As a credential officer, I want to set the credentials of an instructor who teaches in my department, so that I can determine if the instructor is qualified to instruct a specific course within my department
Pre-Conditions:	I am logged into the system as a Credential officer and I am on the "Home" screen.
Post-Conditions:	Success 1. I have set the credentials of an instructor in my department Alternative 1: 2. I do not set the credentials of an instructor within my department
Relationships:	None
Trigger:	Trigger Type: External I select "Set Faculty Credentials"

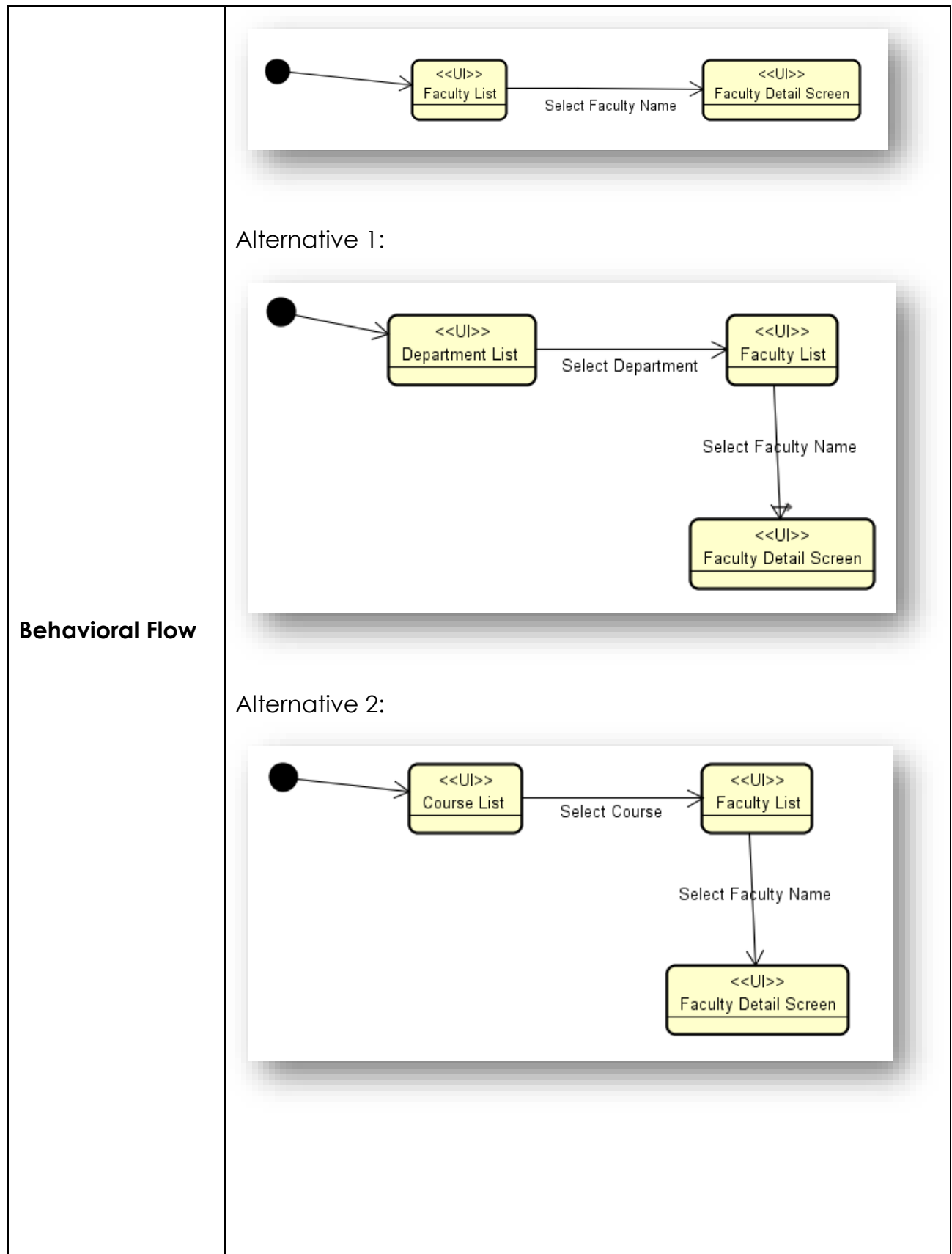
<p>Normal Flow of Events:</p>	<ol style="list-style-type: none"> 1. The system responds with the "University Department List" screen with a list of departments (<host>/credOff/departments) 2. I select my department from the displayed list 3. The system responds with "My Department Teaching Faculty List" screen with a list of faculty members in my department (<host>/credOff/departments/faculty) 4. I select instructor credentials <ol style="list-style-type: none"> 4.1 Instructor <ol style="list-style-type: none"> 4.1.1. <credentials>: = s{<alphanumeric>}³⁰ 5. The system saves the instructor credentials 6. The system displays success message 10. The system stays on the "My Department Teaching Faculty List" screen (<host>/credOff/departments)
<p>Sub/Alternative/Exception flows:</p>	<p>Alternative 1:</p> <ol style="list-style-type: none"> 1. I select my department from the displayed list 2. The system responds with "My Department Teaching Faculty List" screen with a list of faculty members in my department (<host>/credOff/departments/faculty) 5. I select "close" button 6. The system responds with the "University Department List" screen (<host>/credOff/departments)
<p>Sequence Diagram</p>	<pre> sequenceDiagram actor CO as :Credential Officer participant FTCS as FTCS V2.0 participant Instructor CO->>FTCS: 1: Select Set Faculty Credentials() FTCS-->>CO: Opens University Department List Screen CO->>FTCS: 2: Selects My Department() FTCS-->>CO: Opens My Department Teaching Faculty List Screen CO->>FTCS: 3: Selects instructor credentials() FTCS->>Instructor: 3.1: Instructor (credentials:Text()) Instructor-->>FTCS: Instructor FTCS->>FTCS: 4: Saves (Instructor credentials()) FTCS-->>CO: Stays on My Department Teaching Faculty List Screen </pre>

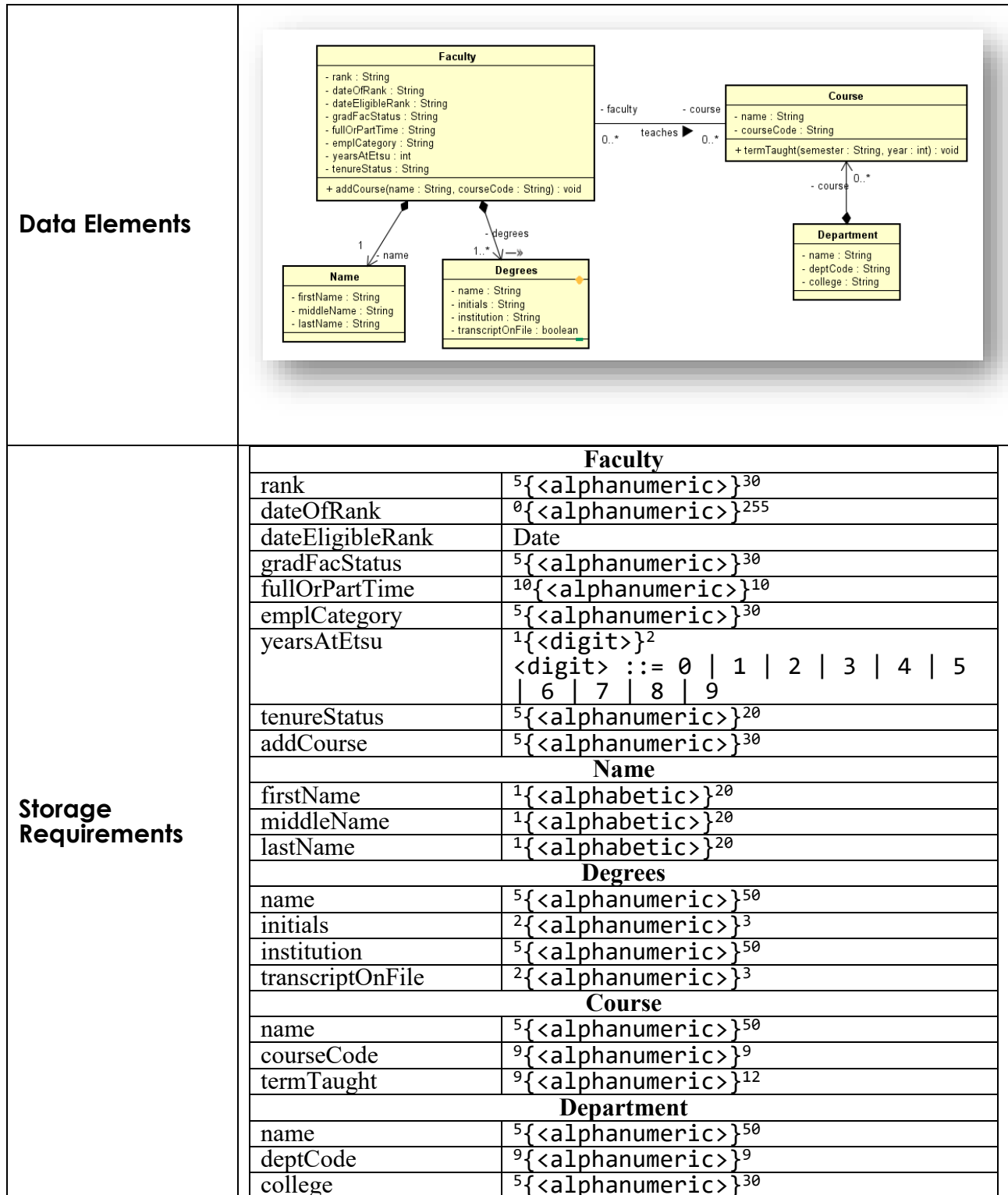
<p>Behavioral Flow</p>	<pre> graph TD Start(()) --> HomeScreen[<<UI>> Home Screen] HomeScreen -- "Select Set Faculty Credentials" --> UniversityScreen[<<UI>> University Department List Screen] UniversityScreen -- "Select My Department" --> MyDepartmentScreen[<<UI>> My Department Teaching Faculty List Screen] MyDepartmentScreen -- "Select Instructor Credentials" --> HomeScreen MyDepartmentScreen -- "Select Close button" --> UniversityScreen </pre>				
<p>Data Elements</p>	<pre> classDiagram class Instructor { - Credentials : Text } </pre>				
<p>Storage Requirements</p>	<table border="1"> <thead> <tr> <th colspan="2">Instructor</th> </tr> </thead> <tbody> <tr> <td>Credentials</td> <td>⁵{<alphanumeric>}³⁰</td> </tr> </tbody> </table>	Instructor		Credentials	⁵ {<alphanumeric>} ³⁰
Instructor					
Credentials	⁵ {<alphanumeric>} ³⁰				

5.4 General/Any User Responsibilities



Requirements ID: REQ0006-ViewFacultyDetails	
Primary Actors: User	
Use Case Name: Any user shall be able to view faculty details	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view faculty details: credentials, previous education
Story:	As a registered user, I want to create to-do items, so that I can track them.
Quality Requirements:	The system shall allow any user to view faculty name details: credentials, previous education within five minutes
Pre-Conditions:	None
Post-Conditions:	Success: 3. I am viewing faculty details
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	1. Include: 'Search by Faculty Name' (Alternative 1) (Alternative 2) 2. The system responds with the screen showing the faculty details (<host>/faculty/)
Alternative flow:	Alternative 1: [Include: 'Search by Department'] Alternative 2: [Include: 'Search by Course']





ETSU University's Teaching Faculty List

Search for Faculty

Faculty Name	Department	College
Jones, Bob	Appalachian Studies	Arts & Sciences
Popcorn, Kathy	Accounting	Business & Technology
Bunny, Bugs	Accounting	Arts & Sciences
Burns, George	Biostatistics & Epidemiology	Public Health
McFly, Marty	Audio & Spch-Lang Pathology	Clinical & Rehab Health Science
Lincoln, Abraham	Counseling and Human Services	Clemmer College

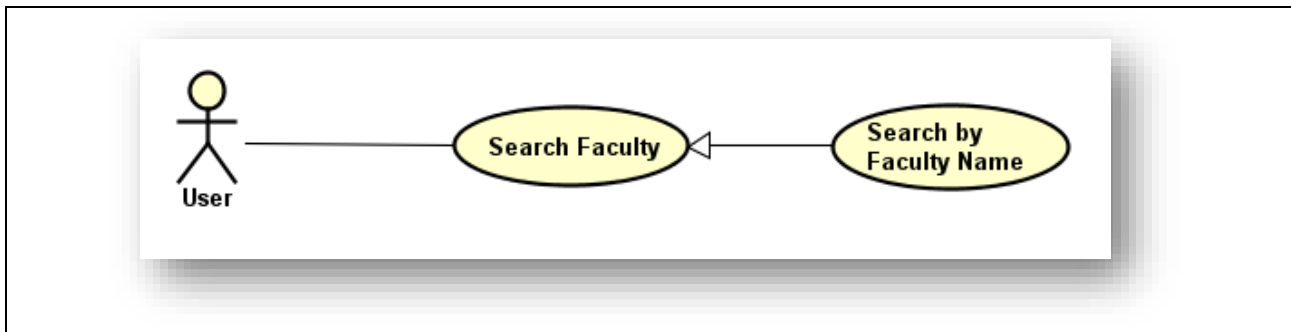
Bob Jones

(Ast Dean Student for Stud Eng)
JonesB@mail.etsu.edu

Academic Qualifications		Courses Taught	
Rank	Graduate Faculty Member	Employment Status:	Graduate Faculty Member
Date of Rank	August 2017	Employment Category:	Professional
Date Eligible for Next Rank:	August 2022	Years at ETSU:	22
Graduate Faculty Status:	Graduate Faculty Member	Tenure Status:	Tenured

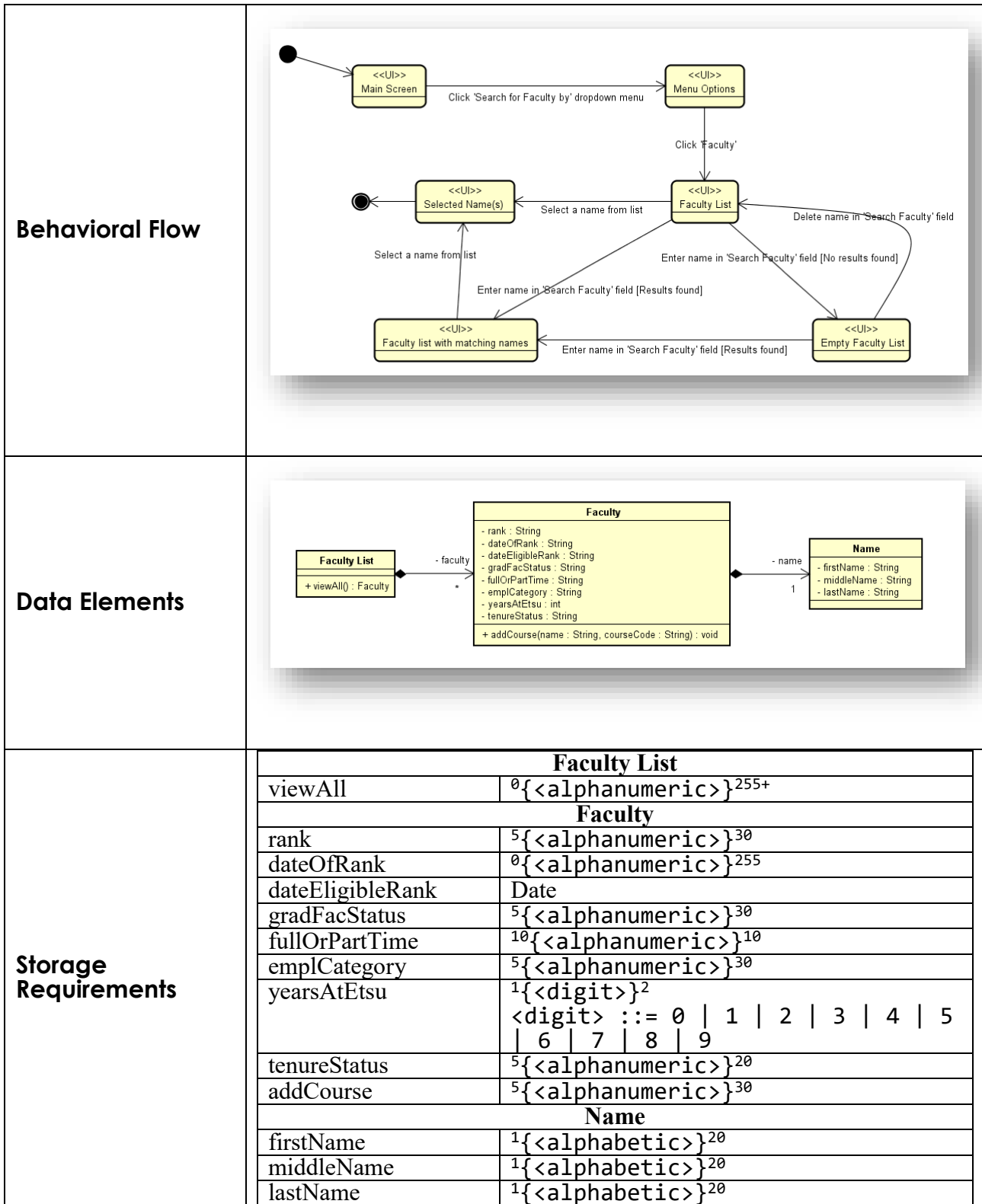
Academic Degrees

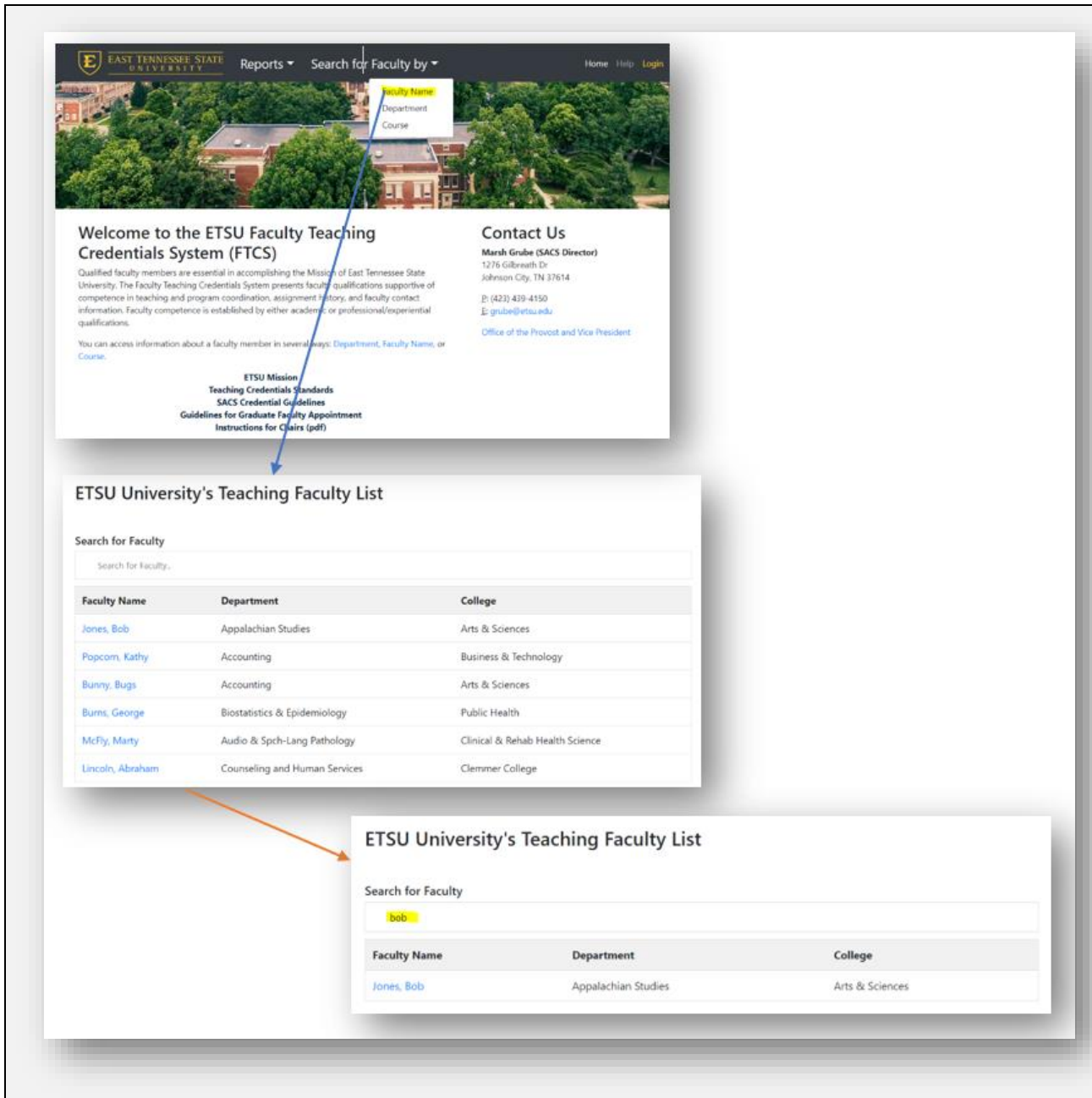
Degree	Initials	Discipline	Institution	Transcript On File
MBA Master of Business Admin	EDD	Educational Leadership	East Tennessee State University	Yes

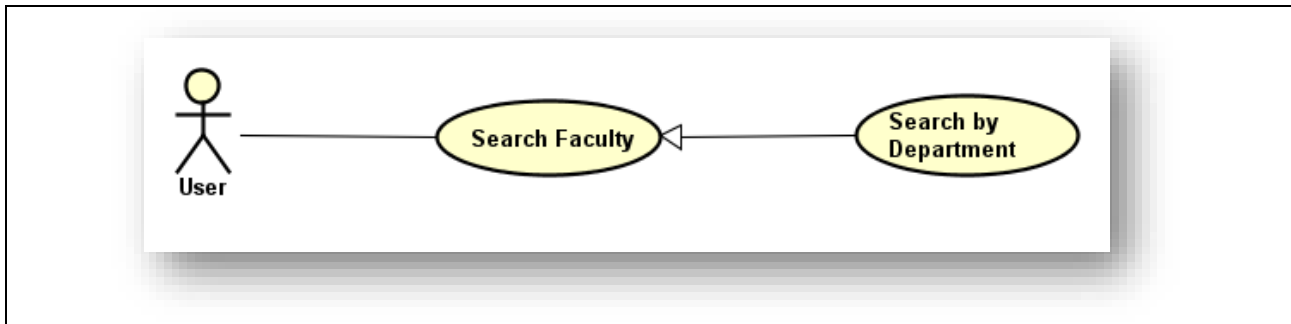


Requirements ID: REQ0006a-SearchFacultyName	
Primary Actors: User	
Use Case Name: Search by faculty name	Importance Level: High

Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to search for a faculty name
Story:	As a user, I want to be able to search a faculty by name
Quality Requirements:	The user shall be able to search for a faculty name in less than five minutes
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I have browsed a faculty name
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Faculty Name' 3. The system responds with the 'University's Teaching Faculty List' screen showing list of all faculty (<host>/home/faculty) 4. I scroll and select a faculty name (Alternative: Search 'Faculty Name')
Alternative flow:	<p>[Search 'Faculty Name']</p> <ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Faculty Name' 3. The system responds with the 'University's Teaching Faculty List' screen showing list of all faculty (<host>/home/faculty) 4. I enter a name in the 'Search for Faculty' field. <ol style="list-style-type: none"> 2.1 Faculty <ol style="list-style-type: none"> 2.1.1. <Faculty name> := ¹{alphanumeric}⁵⁰ 5. I click on 'Search' 6. The system responds with a screen showing only faculty names that match my search (see Exception 1) (<host>/home/faculty{search}) 7. I select a faculty name
Exception flow	<p>[No Results]</p> <ol style="list-style-type: none"> 1. The system responds with a screen with no faculty names (<host>/home/faculty{search}) 2. I delete the faculty in 'Search for Faculty' field revealing 'ETSU University's Teaching Faculty List' screen showing list of all faculty. (<host>/home/faculty)



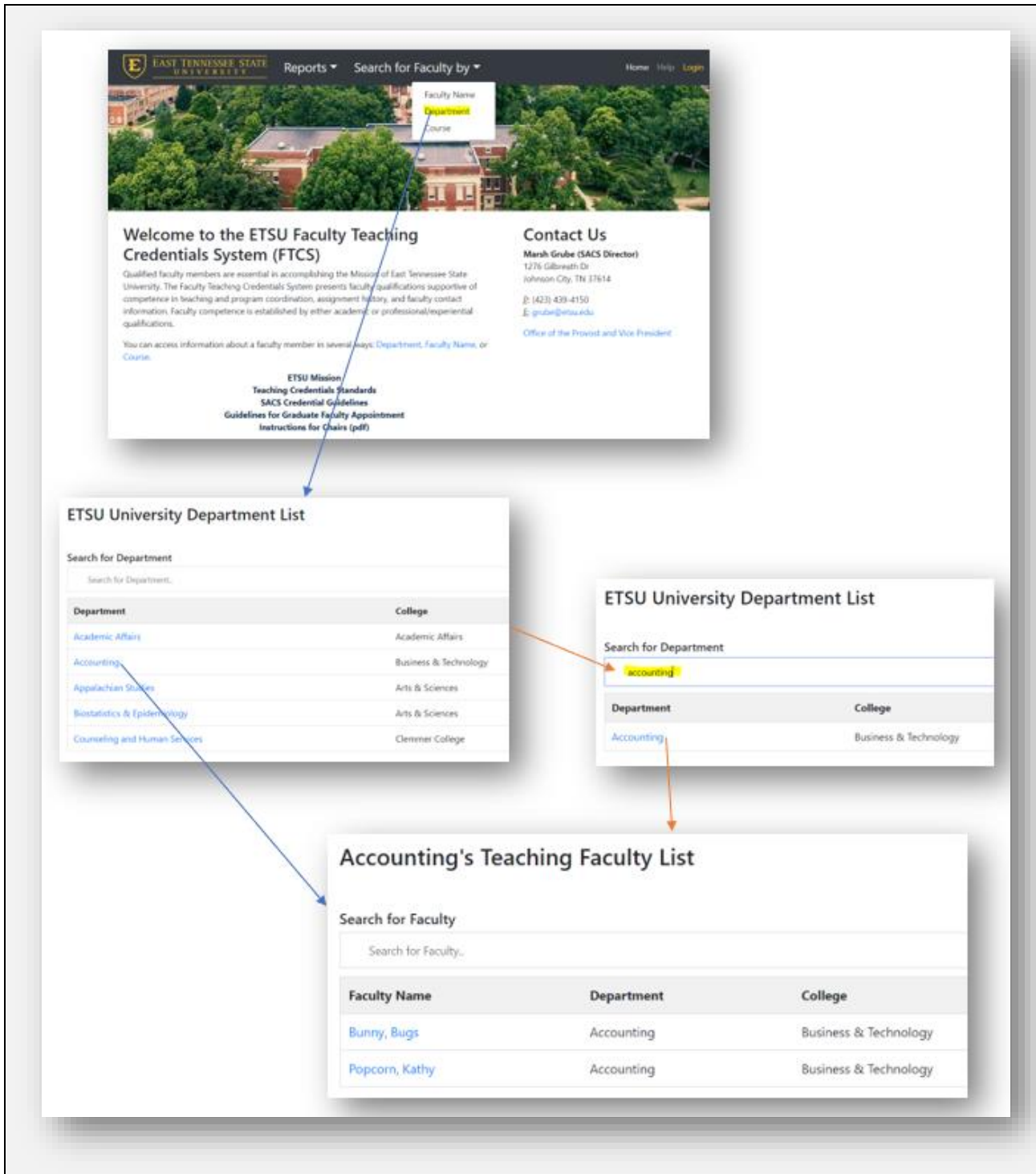




Requirements ID: REQ0006b-SearchDepartment	
Primary Actors: User	
Use Case Name: Search by department Importance Level: High	
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to search for a faculty name by department
Story:	As a user, I want to be able to search a faculty by name by department
Quality Requirements:	The user shall be able to search for a faculty name by department in less than five minutes
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I have searched a faculty name by browsing departments
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Department' 3. The system responds with the screen showing list of all departments (<host>/home/department) 4. I scroll down and select a department from the list (Alternative: Search 'Department') 5. The system responds with the names of faculty names in the selected department (<host>/home/department{search}) 6. I select a faculty name
Alternative flow:	<p>[Search 'Department']</p> <ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Department' 3. The system responds with the 'University's Teaching Department List' screen showing list of all faculty (<host>/home/department) 4. I enter a name in the 'Search for department' field. <ol style="list-style-type: none"> 2.1 Faculty <ol style="list-style-type: none"> 2.1.1. <Department> := ¹{alphanumeric}⁵⁰ 5. I click on 'Search' 6. The system responds with a screen showing only faculty names that match my search (see Exception 1) (<host>/home/department{search}) 7. I click on a department 8. The system responds with faculty names in the selected department (<host>/home/faculty{search})

<p>Exception flow</p>	<p>[No Results] 1. The system responds with a screen with no departments (<host>/home/department{search}) 2. I delete the department in 'Search for Department' field revealing 'ETSU University's Department List' screen showing list of all departments. (<host>/home/department)</p>
<p>Behavioral Flow</p>	
<p>Data Elements</p>	<pre> classDiagram class DepartmentList { +viewAll() : Department } class Department { -name : String -deptCode : String -college : String } class FacultyList { +viewAll() : Faculty } class Faculty { -rank : String -dateOfRank : String -dateEligibleRank : String -gradFacStatus : String -fullOrPartTime : String -emplCategory : String -yearsAtEtsu : int -tenureStatus : String +addCourse(name : String, courseCode : String) : void } class Name { -firstName : String -middleName : String -lastName : String } DepartmentList "1" *-- "*" Department FacultyList "1" *-- "*" Faculty Faculty "1" *-- "1" Name </pre>

Storage Requirements	Department List	
	viewAll	0{<alphanumeric>} ²⁵⁵⁺
	Department	
	UserName	6{<alphanumeric>} ²⁰
	FirstName	1{<alphanumeric>} ²⁰
	LastName	1{<alphanumeric>} ²⁰
	Faculty	
	rank	5{<alphanumeric>} ³⁰
	dateOfRank	0{<alphanumeric>} ²⁵⁵
	dateEligibleRank	Date
	gradFacStatus	5{<alphanumeric>} ³⁰
	fullOrPartTime	10{<alphanumeric>} ¹⁰
	emplCategory	5{<alphanumeric>} ³⁰
	yearsAtEtsu	1{<digit>} ² <digit> ::= 0 1 2 3 4 5 6 7 8 9
	tenureStatus	5{<alphanumeric>} ²⁰
	addCourse	5{<alphanumeric>} ³⁰
	Faculty List	
	viewAll	0{<alphanumeric>} ²⁵⁵⁺
	Name	
	firstName	1{<alphanumeric>} ²⁰
	middleName	1{<alphanumeric>} ²⁰
	lastName	1{<alphanumeric>} ²⁰

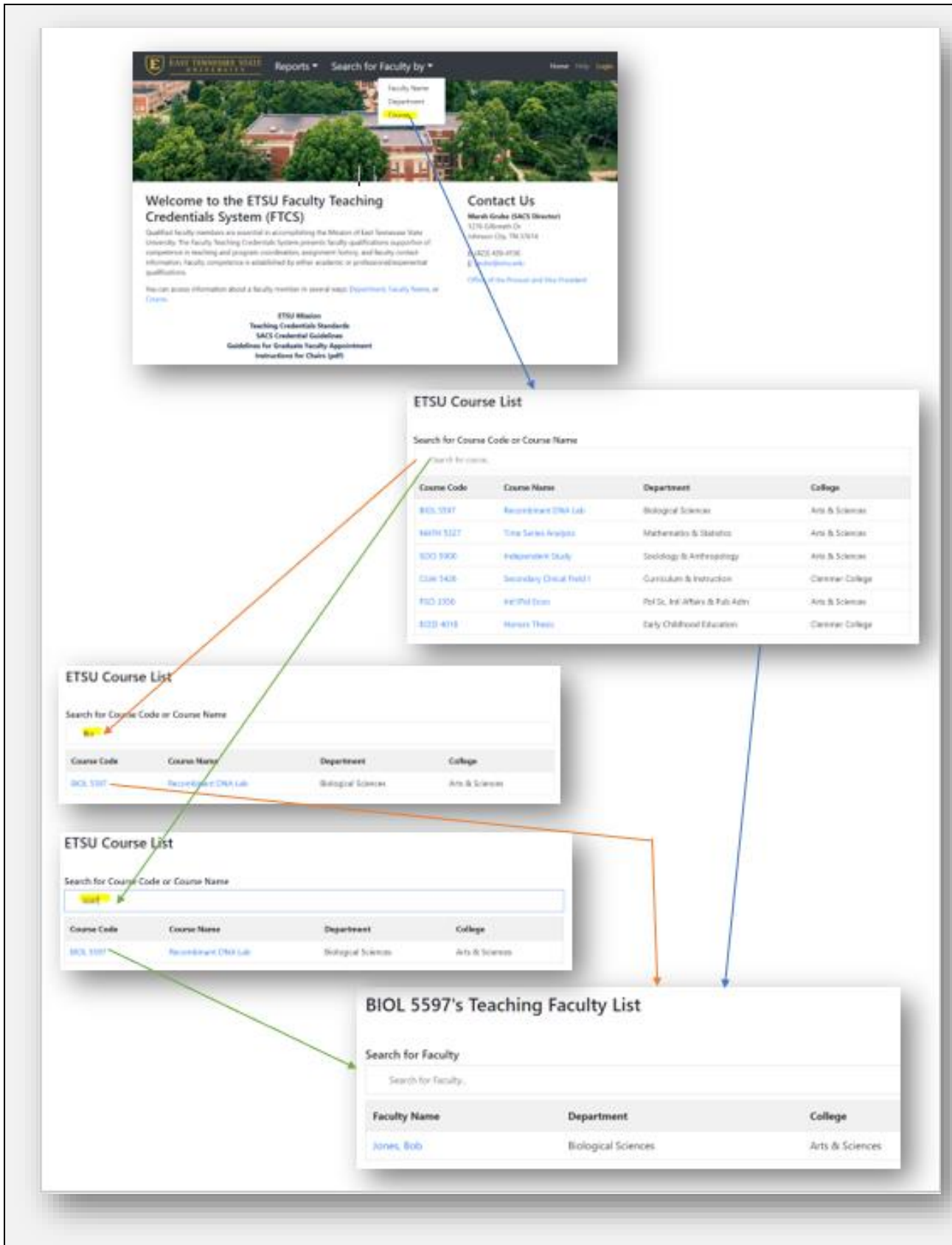


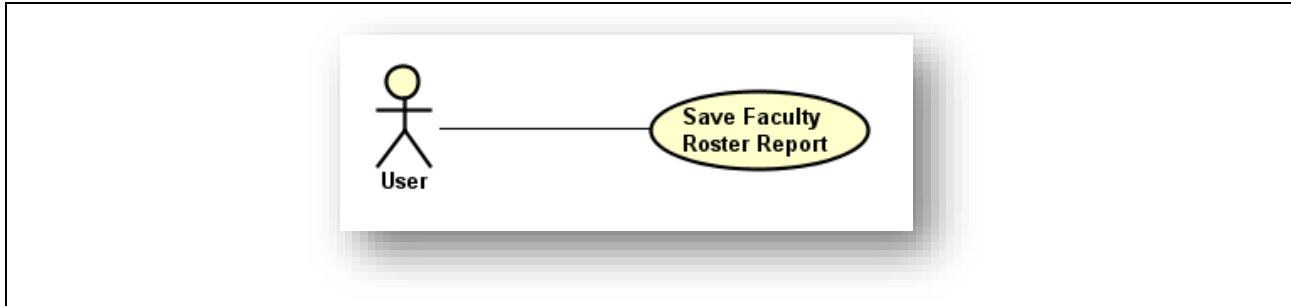


Requirements ID: REQ0006c-SearchCourse	
Primary Actors: User	
Use Case Name: Search by course Importance Level: High	
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to search for a faculty name by course
Story:	As a user, I want to be able to search a faculty by name by course
Quality Requirements:	The user shall be able to search for a faculty name by course in less than five minutes
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I have searched a faculty name by browsing courses
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Course' 3. The system responds with the screen showing list of all courses(<host>/home/course) 4. I scroll down and select a course from the list (Alternative: Search 'Course') 5. The system responds with the names of faculty names in the selected course (<host>/home/course{search}) 6. I select a faculty name
Alternative flow:	<p>[Search 'Course']</p> <ol style="list-style-type: none"> 1. I click on the 'Search for Faculty by' dropdown menu 2. I click on 'Course' 3. The system responds with the 'University's Teaching Course List' screen showing list of all faculty (<host>/home/course) 4. I enter a name in the 'Search for Course Name or Course Code' field. <ol style="list-style-type: none"> 2.1 Faculty <ol style="list-style-type: none"> 2.1.1. <Course> := 1{alphanumeric}⁵⁰ 5. I click on 'Search' 6. The system responds with a screen showing only faculty names that match my search (see Exception 1) (<host>/home/course{search}) 7. I click on a course 8. The system responds with faculty names in the selected course(<host>/home/faculty{search})

<p>Exception flow</p>	<p>[No Results]</p> <ol style="list-style-type: none"> 1. The system responds with a screen with no courses (<host>/home/course{search}) 2. I delete the course in 'Search for Course Name or Course Code' field revealing 'ETSU University's Course List' screen showing list of all courses. (<host>/home/course)
<p>Behavioral Flow</p>	
<p>Data Elements</p>	

Storage Requirements	Faculty List	
	viewAll	0{<alphanumeric>} ²⁵⁵⁺
	Name	
	firstName	1{<alphabetic>} ²⁰
	middleName	1{<alphabetic>} ²⁰
	lastName	1{<alphabetic>} ²⁰
	Faculty	
	rank	5{<alphanumeric>} ³⁰
	dateOfRank	0{<alphanumeric>} ²⁵⁵
	dateEligibleRank	Date
	gradFacStatus	5{<alphanumeric>} ³⁰
	fullOrPartTime	10{<alphanumeric>} ¹⁰
	emplCategory	5{<alphanumeric>} ³⁰
	yearsAtEtsu	1{<digit>} ² <digit> ::= 0 1 2 3 4 5 6 7 8 9
	tenureStatus	5{<alphanumeric>} ²⁰
	addCourse	5{<alphanumeric>} ³⁰
	Course List	
	viewAll	0{<alphanumeric>} ²⁵⁵⁺
	Course	
	name	5{<alphanumeric>} ⁵⁰
	courseCode	9{<alphanumeric>} ⁹
	termTaught	9{<alphanumeric>} ¹²



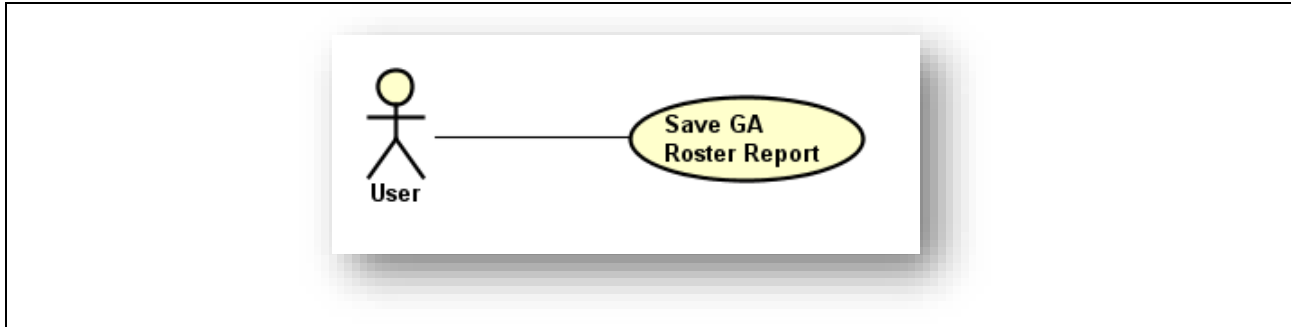


Requirements ID: REQ0007a-SaveFacultyRoster	
Primary Actors: User	
Use Case Name: Any user shall be able to view and save the Faculty roster	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view and save the Faculty Roster Report
Story:	As a user, I want to be able to view and save the Faculty Roster Report
Quality Requirements:	The user shall be able to view and save the Faculty Roster Report within five minutes.
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I am viewing the Faculty Roster Report
Relationships:	None
Trigger:	Trigger Type: External I select 'Faculty Roster Report'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Roster Report 4. The system responds with a screen showing the Faculty Roster Report (<host>/home/facultyRoster) <ul style="list-style-type: none"> (Alternative: Save to PDF) (Alternative: Filter by Department) (Alternative: Filter by Faculty Type) (Alternative: Filter by Start Year)

<p>Alternative flow:</p>	<p>[Save to PDF]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Roster Report 4. The system responds with a screen showing the Faculty Roster Report (<host>/home/facultyRoster) 5. I click on the 'Save to PDF' button at the top right of the screen 6. The system responds with a window to select save file location (<host>/home/facultyRoster/save) <p>[Filter by Department]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Roster Report 4. The system responds with a screen showing the Faculty Roster Report (<host>/home/facultyRoster) 5. I click the department filter dropdown 6. I select a department from the dropdown 7. The system responds with the filtered results of the selected department (<host>/home/facultyRoster{department}) <p>[Filter by Faculty Type]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Roster Report 4. The system responds with a screen showing the Faculty Roster Report (<host>/home/facultyRoster) 5. I click the faculty type filter dropdown 6. I select a faculty type from the dropdown 7. The system responds with the filtered results of the selected faculty type(<host>/home/facultyRoster{facultyType}) <p>[Filter by Start Year]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Roster Report 4. The system responds with a screen showing the Faculty Roster Report (<host>/home/facultyRoster) 5. I click the start year filter dropdown 6. I select a start year from the dropdown 7. The system responds with the filtered results of the selected start year(<host>/home/facultyRoster{startYear})
---------------------------------	---

<p>Behavioral Flow</p>	<pre> graph LR Start(()) --> MainScreen[<<UJ>> Main Screen] MainScreen -- "Click 'Reports' from dropdown menu" --> MenuOptions[<<UJ>> Menu Options] MenuOptions -- "Click Faculty Roster Report" --> FacultyRosterReport[<<UJ>> Faculty Roster Report] FacultyRosterReport -- "Filter by department" --> FilteredResults[<<UJ>> Filtered Results] FacultyRosterReport -- "Filter by faculty type" --> FilteredResults FacultyRosterReport -- "Filter by start year" --> FilteredResults FacultyRosterReport -- "Click 'Save to PDF' button" --> SaveToPDFWindow[<<UJ>> Save to PDF Window] FilteredResults -- "Click 'Save to PDF' button" --> SaveToPDFWindow FilteredResults -- "View only" --> End(()) SaveToPDFWindow -- "PDF saved" --> End </pre>								
<p>Data Elements</p>	<div style="border: 1px solid black; padding: 5px; width: fit-content; margin: auto;"> <p style="text-align: center;">Faculty Roster Report</p> <ul style="list-style-type: none"> - department : String - facultyType : String - startYear : int </div>								
<p>Storage Requirements</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th colspan="2" style="text-align: center;">Faculty Roster Report</th> </tr> </thead> <tbody> <tr> <td style="padding: 2px;">department</td> <td style="padding: 2px;">5{<alphanumeric>}50</td> </tr> <tr> <td style="padding: 2px;">facultyType</td> <td style="padding: 2px;">1{<alphanumeric>}20</td> </tr> <tr> <td style="padding: 2px;">startYear</td> <td style="padding: 2px;">1{<alphanumeric>}15</td> </tr> </tbody> </table>	Faculty Roster Report		department	5{<alphanumeric>}50	facultyType	1{<alphanumeric>}20	startYear	1{<alphanumeric>}15
Faculty Roster Report									
department	5{<alphanumeric>}50								
facultyType	1{<alphanumeric>}20								
startYear	1{<alphanumeric>}15								

The image illustrates the user workflow for generating and saving a faculty roster report in the ETSU FTCS system. The process begins on the main homepage, where users can navigate to the 'Reports' section. The workflow then moves through three sequential reports, each with specific filters applied: 'All Faculty', 'Graduate Assistant', and 'Full-time'. Finally, the 'Print' dialog box is used to save the report as a PDF, resulting in a 'Successfully Saved' confirmation.



Requirements ID: REQ0007b-SaveGARoster	
Primary Actors: User	
Use Case Name: Any user shall be able to view and save the GA roster	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view and save the Graduate Assistant Roster Report
Story:	As a user, I want to be able to view and save the Graduate Assistant Roster Report
Quality Requirements:	The user shall be able to view and save the Graduate Assistant Roster Report within five minutes.
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I am viewing the Graduate Assistant Roster Report
Relationships:	None
Trigger:	Trigger Type: External I select 'Graduate Assistant Roster Report'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Graduate Assistant Roster Report 4. The system responds with a screen showing the Graduate Assistant Roster Report (<host>/home/gaRoster) (Alternative: Save to PDF) (Alternative: Filter by Start Year)

<p>Alternative flow:</p>	<p>[Save to PDF]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Graduate Assistant Roster Report 4. The system responds with a screen showing the Graduate Assistant Roster Report (<host>/home/gaRoster) 5. I click on the 'Save to PDF' button at the top right of the screen 6. The system responds with a window to select save file location (<host>/home/gaRoster/save) <p>[Filter by Start Year]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Graduate Assistant Roster Report 4. The system responds with a screen showing the Graduate Assistant Roster Report (<host>/home/gaRoster) 5. I click the start year filter dropdown 6. I select a start year from the dropdown 7. The system responds with the filtered results of the selected start year(<host>/home/gaRoster{startYear}) 				
<p>Behavioral Flow</p>	<pre> graph LR Start(()) --> MainScreen[<<UJ>> Main Screen] MainScreen -- "Click 'Reports' from dropdown menu" --> MenuOptions[<<UJ>> Menu Options] MenuOptions -- "Click 'GA Roster Report'" --> GARosterReport[<<UJ>> GA Roster Report] GARosterReport -- "Filter by start year" --> FilteredResults[<<UJ>> Filtered Results] GARosterReport -- "Click 'Save to PDF' button" --> SaveToPDFWindow[<<UJ>> Save to PDF Window] FilteredResults -- "Click 'Save to PDF' button" --> SaveToPDFWindow FilteredResults -- "View only" --> End(()) SaveToPDFWindow -- "PDF saved" --> End </pre>				
<p>Data Elements</p>	<pre> classDiagram class GA_Roster_Report { - startYear : int } </pre>				
<p>Storage Requirements</p>	<table border="1"> <thead> <tr> <th colspan="2">GA Roster Report</th> </tr> </thead> <tbody> <tr> <td>startYear</td> <td>1{<alphanumeric>}15</td> </tr> </tbody> </table>	GA Roster Report		startYear	1{<alphanumeric>}15
GA Roster Report					
startYear	1{<alphanumeric>}15				

The image shows a sequence of screenshots from the ETSU Faculty Teaching Credentials System (FTCS) website. The top screenshot displays the main navigation menu with options like 'Reports' and 'Search for Faculty by'. A dropdown menu is open, highlighting 'Graduate Assistant Roster Report'. Below this, the main content area includes a welcome message, contact information for Marsh Grube (SACS Director), and a list of documents such as 'ETSU Mission Teaching Credentials Standards' and 'SACS Credential Guidelines'. A blue arrow points from the highlighted menu item to a second screenshot showing the 'ETSU Graduate Assistant Roster Report' page. This page features a table with columns for Department, Faculty Name, Courses Taught, Academic Degree, and Professional Qualifications. A 'Save as PDF' button is visible in the top right corner. A blue arrow points from this button to a third screenshot showing a 'Print' dialog box with 'Microsoft Print to PDF' selected. A blue arrow points from the 'OK' button in the dialog to a final green box labeled 'Successfully Saved'.

ETSU Graduate Assistant Roster Report

Department	Faculty Name	Courses Taught	Academic Degree	Professional Qualifications
Appalachian Studies	Jones, Bob	<ul style="list-style-type: none"> Fall 2018 ETSU1020 Foundations of Student Success 	MBA Master of Business Admin	None Required
Accounting	Popcorn, Kathy	<ul style="list-style-type: none"> Fall 2017 ETSU1020 Foundations of Student Success 	MA Master of Arts	None Required
Accounting	Berry, Betsy	<ul style="list-style-type: none"> Spring 2018 ETSU1020 Foundations of Student Success 	EDD Doctor of Education	None Required

ETSU Graduate Assistant Roster Report

Start Year: 2017

Department	Faculty Name	Courses Taught	Academic Degree	Professional Qualifications
Accounting	Popcorn, Kathy	<ul style="list-style-type: none"> Fall 2017 ETSU1020 Foundations of Student Success 	MA Master of Arts	None Required
Audio & Speech-Language Pathology	Muffy, Marty	<ul style="list-style-type: none"> Spring 2017 ETSU1020 Foundations of Student Success 	MBA Master of Business Admin	None Required

Print

Printer: Microsoft Print to PDF

Status: Ready

Type: Microsoft Print To PDF

Where: PORTFINGWPE

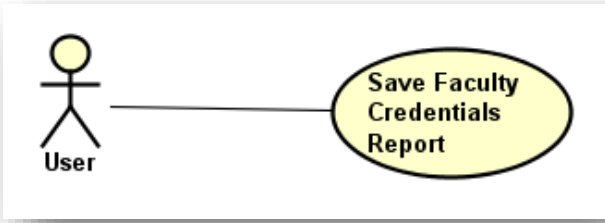
Comment: Print as file

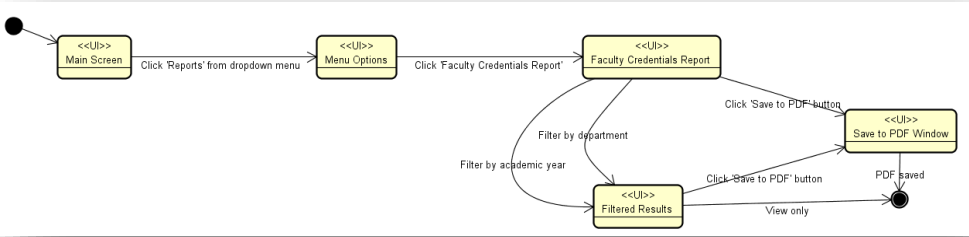
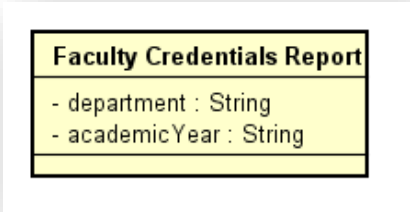
Print range: All Pages from 1 to 1 Selection

Copies: Number of copies: 1

Buttons:

Successfully Saved

	
Requirements ID: REQ0007c-SaveFacultyCredentials	
Primary Actors: User	
Use Case Name: Any user shall be able to view and save the Faculty credentials	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view and save the Faculty Credentials Report
Story:	As a user, I want to be able to view and save the Faculty Credentials Report
Quality Requirements:	The user shall be able to view and save the Faculty Credentials Report within five minutes.
Pre-Conditions:	I am on the main screen
Post-Conditions:	Success: 1. I am viewing the Faculty Credentials Report
Relationships:	None
Trigger:	Trigger Type: External I select 'Faculty Credentials Report'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Credentials Report 4. The system responds with a screen showing the Faculty Credentials Report (<host>/home/facultyCred) <ul style="list-style-type: none"> (Alternative: Save to PDF) (Alternative: Filter by Department) (Alternative: Filter by Academic Year)

<p>Alternative flow:</p>	<p>[Save to PDF]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Credentials Report 4. The system responds with a screen showing the Faculty Credentials Report (<host>/home/facultyCred) 5. I click on the 'Save to PDF' button at the top right of the screen 6. The system responds with a window to select save file location (<host>/home/facultyCred/save) <p>[Filter by Department]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Credentials Report 4. The system responds with a screen showing the Faculty Credentials Report (<host>/home/facultyCred) 5. I click the department filter dropdown 6. I select a department from the dropdown 7. The system responds with the filtered results of the selected department (<host>/home/facultyCred{department}) <p>[Filter by Academic Year]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Faculty Credentials Report 4. The system responds with a screen showing the Faculty Credentials Report (<host>/home/facultyCred) 5. I click the academic year filter dropdown 6. I select an academic year from the dropdown 7. The system responds with the filtered results of the selected academic year (<host>/home/facultyCred{academicYear})
<p>Behavioral Flow</p>	 <pre> graph TD Start(()) --> MainScreen[<<UI>> Main Screen] MainScreen -- "Click 'Reports' from dropdown menu" --> MenuOptions[<<UI>> Menu Options] MenuOptions -- "Click 'Faculty Credentials Report'" --> FacultyReport[<<UI>> Faculty Credentials Report] FacultyReport -- "Click 'Save to PDF' button" --> SavePDFWindow[<<UI>> Save to PDF Window] FacultyReport -- "Filter by department" --> FilteredResults[<<UI>> Filtered Results] FacultyReport -- "Filter by academic year" --> FilteredResults FilteredResults -- "Click 'Save to PDF' button" --> SavePDFWindow SavePDFWindow -- "PDF saved" --> End(()) FilteredResults -- "View only" --> End </pre>
<p>Data Elements</p>	 <div style="border: 1px solid black; padding: 5px; width: fit-content; margin: auto;"> <p>Faculty Credentials Report</p> <ul style="list-style-type: none"> - department : String - academicYear : String </div>

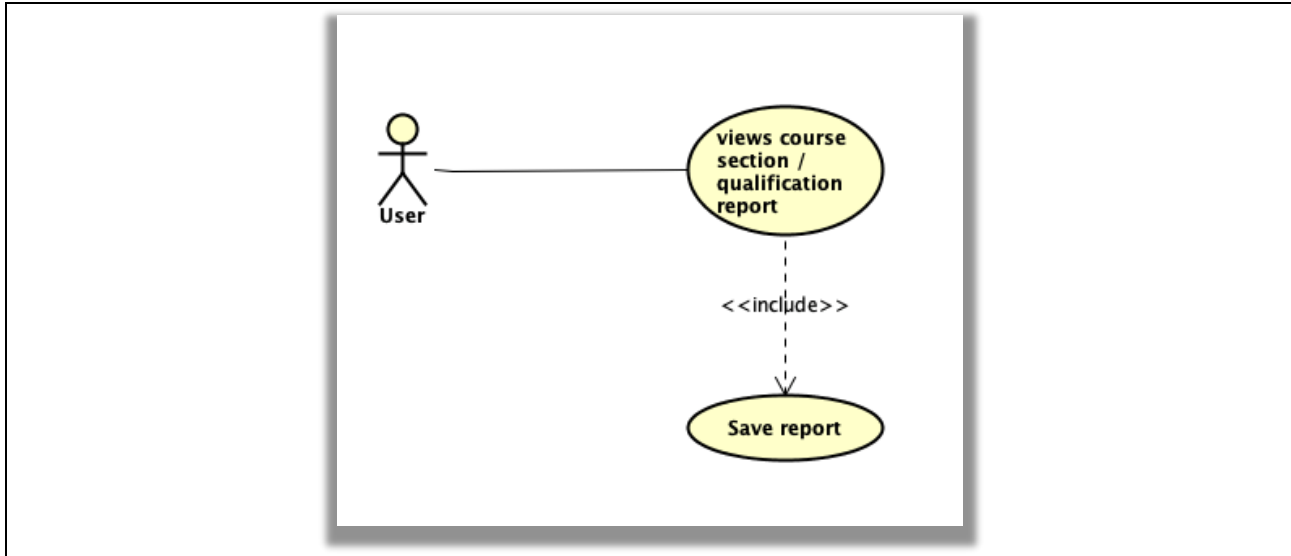
Storage Requirements	Faculty Credentials Report	
	department	5{<alphanumeric>} ⁵⁰
	academicYear	1{<alphanumeric>} ¹⁵

The screenshots illustrate the workflow for generating and saving a Faculty Credentials Report:

- Home Page:** Shows the ETSU Faculty Teaching Credentials System (FTCS) interface with a navigation menu and contact information.
- Report Generation:** The user selects 'Faculty Credentials Report' from the menu. The report screen shows filters for Department (Accounting) and Academic Year (All).
- Report Table:** A table displays faculty credentials for the selected department and year.

Faculty Name	Semester	Course	Credential
Popcorn, Kathy (Part-Time)	Fall 2017	ETSU1020 Foundations of Student Success	Academic
Burns, Bage (Full-Time)	Spring 2018	ETSU1020 Foundations of Student Success	Professional
- Filter Change:** The user changes the Academic Year filter to 'Fall 2017 - Summer 2018'.
- Filtered Report Table:** The table now shows only records for the selected academic year.

Faculty Name	Semester	Course	Credential
Popcorn, Kathy (Part-Time)	Fall 2017	ETSU1020 Foundations of Student Success	Academic
M/Fly, Mary (Graduate Associate)	Spring 2017	ETSU1020 Foundations of Student Success	Academic
- Print Dialog:** The user clicks 'Print to PDF', opening a print dialog box with 'Microsoft Print to PDF' selected.
- Save Confirmation:** A 'Successfully Saved' message box appears after the report is generated as a PDF.



Requirements ID: REQ0007D- Course section / qualifications percentage report	
Primary Actors: User	
Use Case Name: Any user shall be able to view Course section / qualifications percentage	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view course section and qualifications for specific courses. Any user shall be able to save report.
Story:	As a user, I want to create view course section qualification report
Quality Requirements:	The system shall allow any user to view course section / qualification report within five minutes
Pre-Conditions:	None
Post-Conditions:	Success: 1. I am viewing course section qualifications report
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	1. Include: 'Save Report' 2. The system responds with the course section / qualifications report (Alternative: Save to PDF) (Alternative: Filter by Academic Year)

<p>Alternative flow:</p>	<p>[Save to PDF]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on the Course Section / Qualifications Report 4. The system responds with a screen showing the Course Section / Qualifications Report (<host>/home/courseSecQual) 5. I click on the 'Save to PDF' button at the top right of the screen 6. The system responds with a window to select save file location (<host>/home/ courseSecQual /save) <p>[Filter by Academic Year]</p> <ol style="list-style-type: none"> 1. I click on the reports tab in the menu bar 2. The system responds with a dropdown list of reports 3. I click on Course Section / Qualifications Report 4. The system responds with a screen showing the Course Section / Qualifications Report (<host>/home/ courseSecQual) 5. I click the academic year filter dropdown 6. I select an academic year from the dropdown 7. The system responds with the filtered results of the selected academic year (<host>/home/ courseSecQual {academicYear})
<p>Behavioral Flow</p>	<pre> graph TD Start(()) --> MainScreen[<<UI>> Main Screen] MainScreen -- "Click 'Reports' from dropdown menu" --> MenuOptions[<<UI>> Menu Options] MenuOptions -- "Click 'Course Section / Qualifications Report'" --> CourseSection[<<UI>> Course Section / Qualifications Report] CourseSection -- "Click 'Save to PDF' button" --> SavePDFWindow[<<UI>> Save to PDF Window] CourseSection -- "Filter by academic year" --> FilteredResults[<<UI>> Filtered Results] FilteredResults -- "Click 'Save to PDF' button" --> SavePDFWindow FilteredResults -- "View Only" --> End(()) SavePDFWindow -- "PDF Saved" --> End </pre>

<p>Data Elements</p>	<div style="border: 1px solid black; padding: 10px; background-color: #ffffcc; margin: 10px auto; width: fit-content;"> <p style="text-align: center;">Course Section / Qualifications Report</p> <ul style="list-style-type: none"> - Department : Text - Total Course Sections : int - Percent : float - Number Academically Qualified : float - Professionally Qualified : int - graduate assistants : int - Missing transcripts : int - academicYear : int <hr/> <ul style="list-style-type: none"> + updateyear() : void + savePDF() : void </div>																		
<p>Storage Requirements</p>	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th colspan="2" style="text-align: center;">Faculty</th> </tr> </thead> <tbody> <tr> <td>Department</td> <td>5{<alphanumeric>}²⁵⁵</td> </tr> <tr> <td>totalCourseSections</td> <td>0{<alphanumeric>}²⁵⁵</td> </tr> <tr> <td>percent</td> <td>0{<alphanumeric>}²⁵⁵</td> </tr> <tr> <td>numberAcademicallyQualified</td> <td>5{<alphanumeric>}³⁰</td> </tr> <tr> <td>professionallyQualified</td> <td>10{<alphanumeric>}¹⁰</td> </tr> <tr> <td>graduateAssistants</td> <td>5{<alphanumeric>}³⁰</td> </tr> <tr> <td>missingTranscripts</td> <td>0{<alphanumeric>}²⁵⁵</td> </tr> <tr> <td>academicYear</td> <td>0{<alphanumeric>}¹⁵</td> </tr> </tbody> </table>	Faculty		Department	5{<alphanumeric>} ²⁵⁵	totalCourseSections	0{<alphanumeric>} ²⁵⁵	percent	0{<alphanumeric>} ²⁵⁵	numberAcademicallyQualified	5{<alphanumeric>} ³⁰	professionallyQualified	10{<alphanumeric>} ¹⁰	graduateAssistants	5{<alphanumeric>} ³⁰	missingTranscripts	0{<alphanumeric>} ²⁵⁵	academicYear	0{<alphanumeric>} ¹⁵
Faculty																			
Department	5{<alphanumeric>} ²⁵⁵																		
totalCourseSections	0{<alphanumeric>} ²⁵⁵																		
percent	0{<alphanumeric>} ²⁵⁵																		
numberAcademicallyQualified	5{<alphanumeric>} ³⁰																		
professionallyQualified	10{<alphanumeric>} ¹⁰																		
graduateAssistants	5{<alphanumeric>} ³⁰																		
missingTranscripts	0{<alphanumeric>} ²⁵⁵																		
academicYear	0{<alphanumeric>} ¹⁵																		

Welcome to the ETSU Faculty Teaching Credentials System (FTCS)

Qualified faculty members are essential in accomplishing the Mission of East Tennessee State University. The Faculty Teaching Credentials System presents faculty qualifications supportive of competence in teaching and program coordination, assignment history, and faculty contact information. Faculty competence is established by either academic or professional/experiential qualifications.

You can access information about a faculty member in several ways: [Department](#), [Faculty Name](#), or [Course](#).

ETSU Mission
Teaching Credentials Standards
SACS-Credentialed Guidelines
Guidelines for Graduate Faculty Appointment
Instructions for Chairs (pdf)

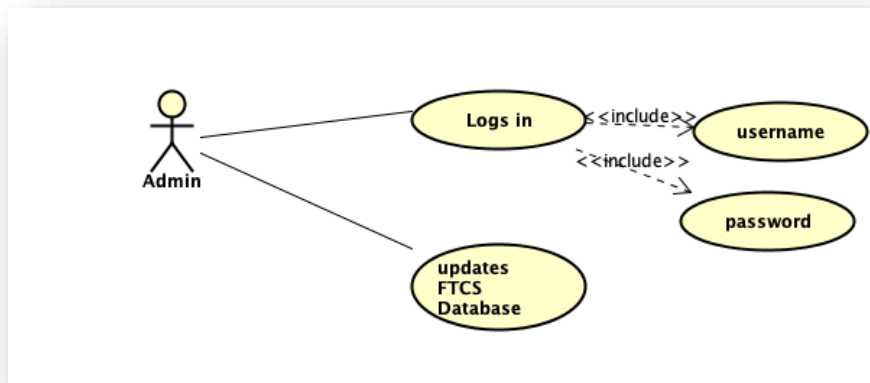
Contact Us
 Marsh Grube (SACS Director)
 1276 Gilbreath Dr
 Johnson City, TN 37614
 P: (423) 439-4150
 E: mgrube@etsu.edu
 Office of the Provost and Vice President

ETSU Course Section Qualifications Percentage Report

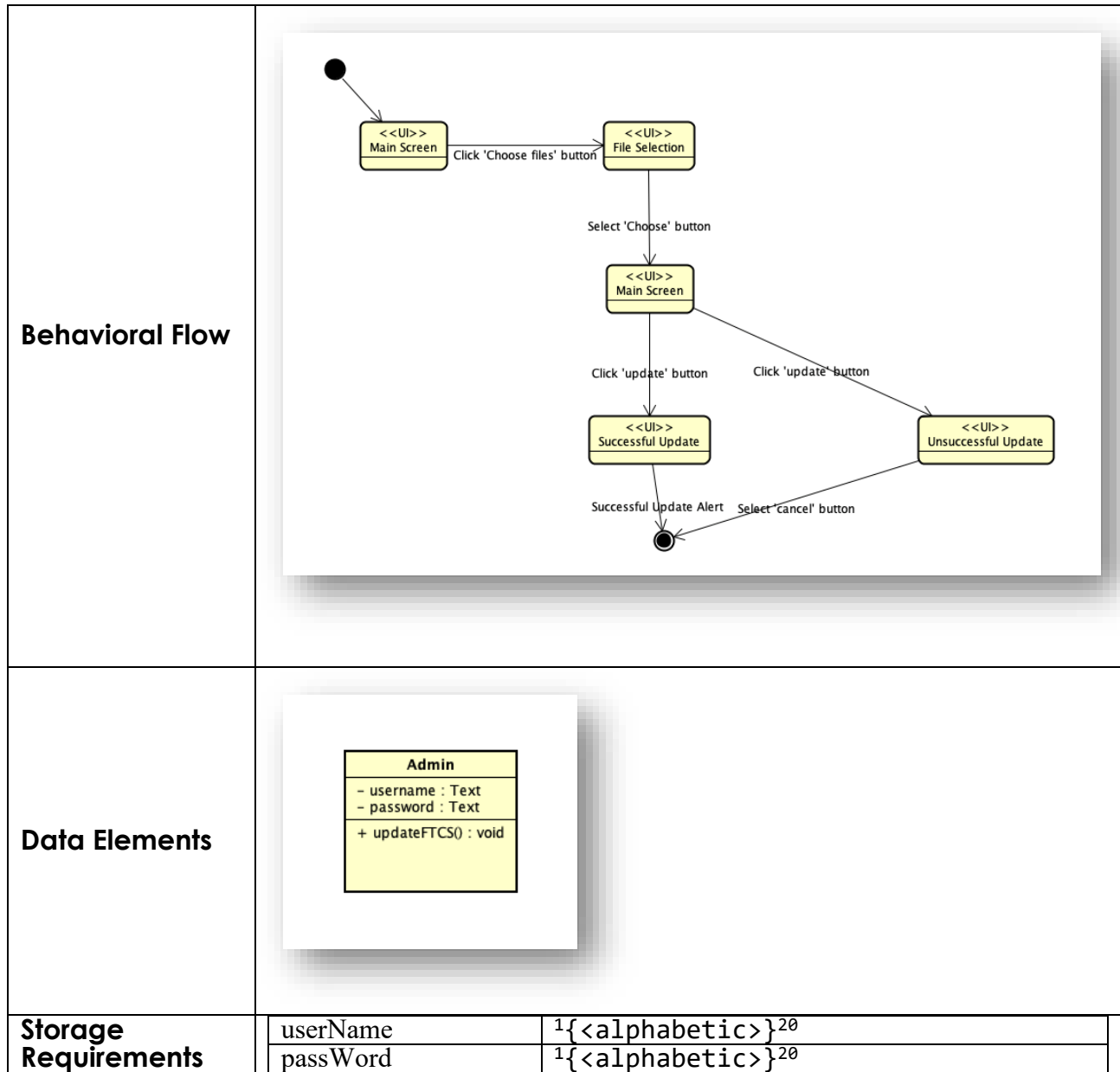
Department	Total Course Sections	%	Number Academically Qualified	%	Number Professionally Qualified	%	Number Graduate Assistants	%	Missing Transcripts
Appalachian Studies)	23	100%	91%	2	9	0	0%	2	
Accounting)	23	100%	91%	2	9	0	0%	2	
Accounting)	23	100%	91%	2	9	0	0%	2	
Biostatistics & Epidemiology)	23	100%	91%	2	9	0	0%	2	
Audio & Spch-Lang Pathology)	23	100%	91%	2	9	0	0%	2	
Counseling and Human Services)	23	100%	91%	2	9	0	0%	2	

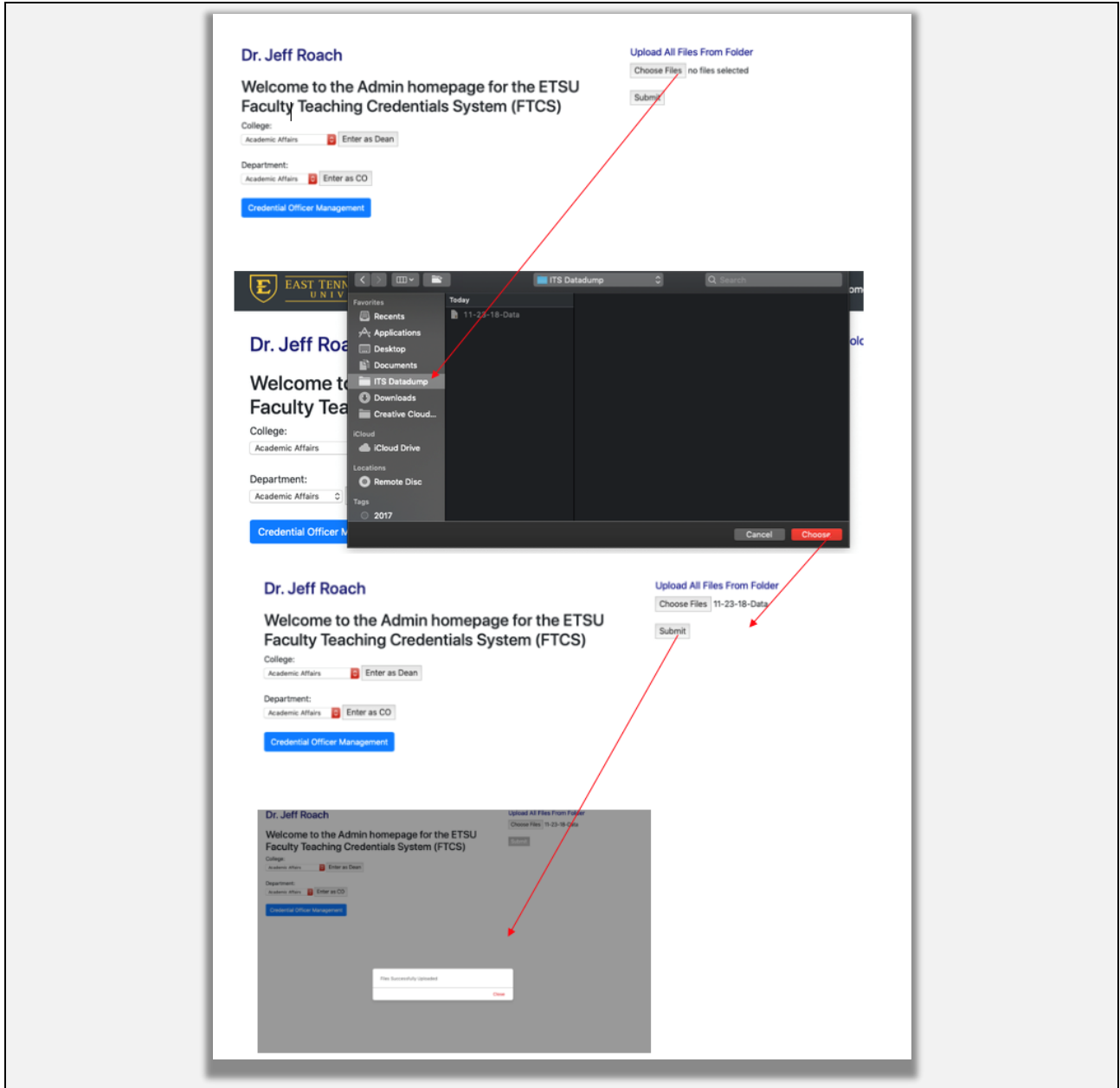
ETSU Course Section Q

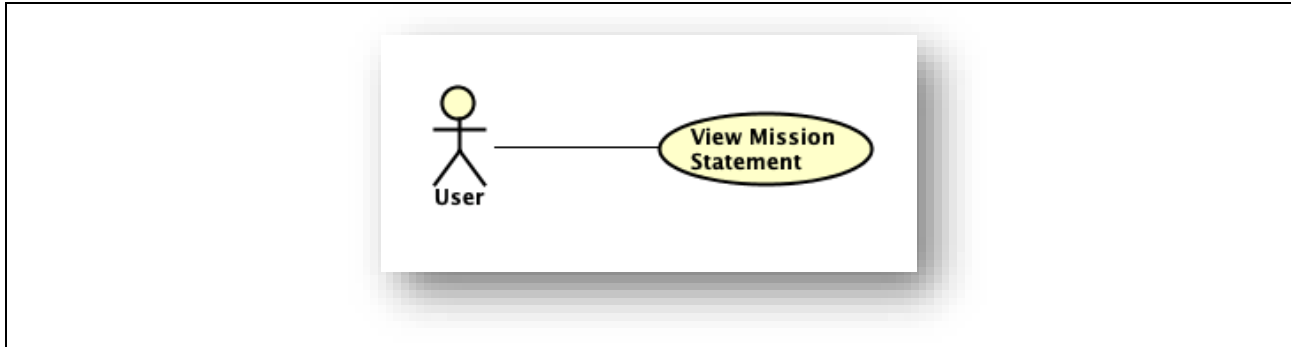
Department	Total Course Sections	%	Number Graduate Assistants	%	Missing Transcripts			
Appalachian Studies)	23	100%	91%	2	9	0	0%	2
Accounting)	23	100%	91%	2	9	0	0%	2
Accounting)	23	100%	91%	2	9	0	0%	2
Biostatistics & Epidemiology)	23	100%	91%	2	9	0	0%	2
Audio & Spch-Lang Pathology)	23	100%	91%	2	9	0	0%	2
Counseling and Human Services)	23	100%	91%	2	9	0	0%	2



Requirements ID: REQ0003-Update database from ITS Data Dump	
Primary Actors: Admin	
Use Case Name: Update FTCS Database Importance Level: High	
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The Administrator shall be able to update FTCS database through a GUI
Story:	As an admin, I want to update the FTCS database
Quality Requirements:	The admin shall be able to update the FTCS database in less than five minutes
Pre-Conditions:	I am logged in as an administrator
Post-Conditions:	Success: 1. I have successfully updated the FTCS database
Relationships:	None
Trigger:	Trigger Type: External 1. I select 'update'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I am on the log in screen 2. I click on 'choose files' 3. The system responds with the 'File path selection' screen showing list of all files (<host>/home/ITS_DataDump) 4. I scroll and select the files 5. I scroll and select 'choose' 6. I click 'update' 7. The system writes to a log file 8. The system logs status messages 9. The system responds with a 'success' alert 10. The system successfully updates database
Exception flow	[Unsuccessful update] 3. The system responds with a screen with failure to update alert







Requirements ID: REQ0008A- Mission Statement	
Primary Actors: User	
Use Case Name: Any user shall be able to view mission statement	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view Mission Statement
Story:	As a user, I want to create view mission statement
Quality Requirements:	The system shall allow any user to view mission statement in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view the mission statement
Relationships:	None
Trigger:	Trigger Type: External I select 'View Mission Statement'
Normal Flow of Events:	1. I am on the home screen 2. I select 'view mission statement' 3. The system responds with the mission statements page

Welcome to the ETSU Faculty Teaching Credentials System (FTCS)

Qualified faculty members are essential in accomplishing the Mission of East Tennessee State University. The Faculty Teaching Credentials System presents faculty qualifications supportive of competence in teaching and program coordination, assignment history, and faculty contact information. Faculty competence is established by either academic or professional/experiential qualifications.

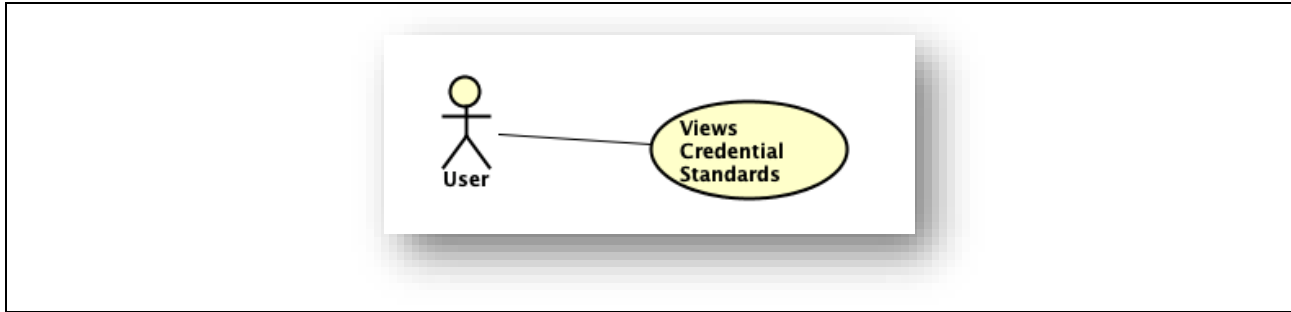
You can access information about a faculty member in several ways: Department, Faculty Name, or Course.

ETSU Mission
Teaching Credentials Standards
SACS Credential Guidelines
Guidelines for Graduate Faculty Appointment
Instructions for Chairs (pdf)

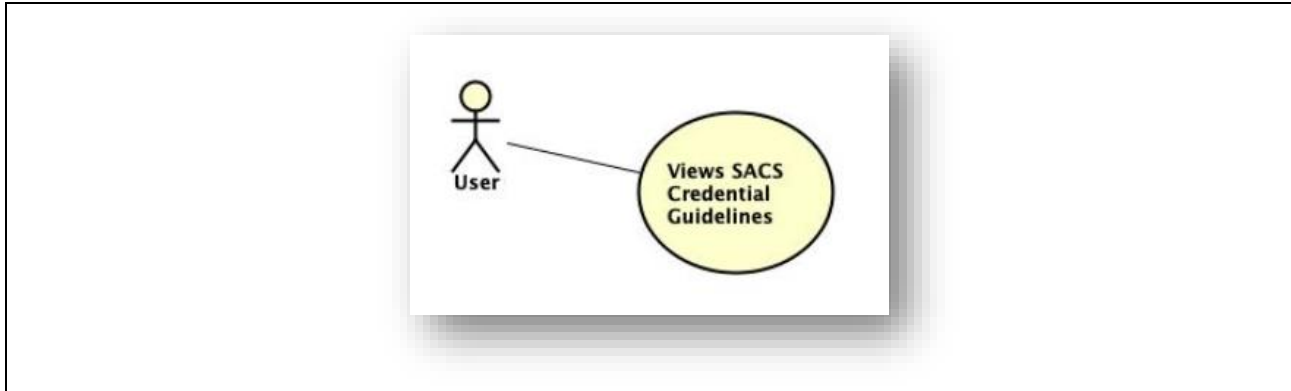
Contact Us
Marsh Grube (SACS Director)
1276 Gilbreath Dr
Johnson City, TN 37614
P: (423) 439-4150
E: grube@etsu.edu
Office of the Provost and Vice President

ETSU Vision
Developing a world-class environment to enhance student success
and improve the quality of life in the region and beyond.

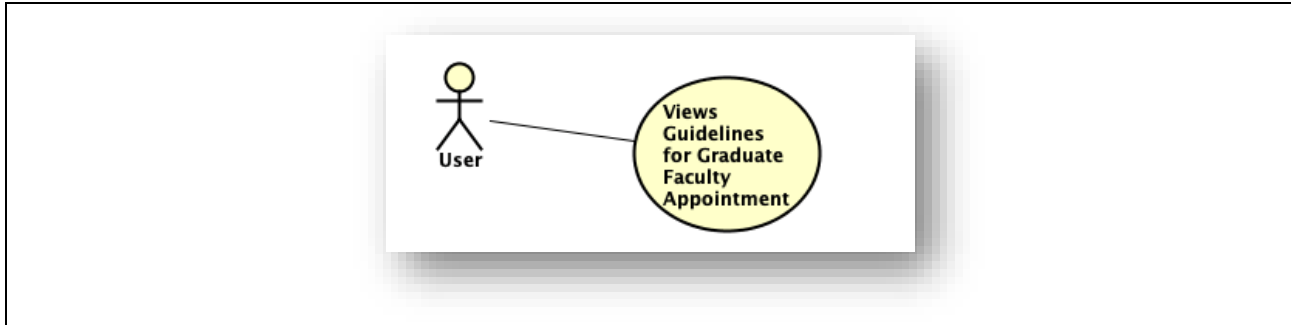
ETSU Mission & Values
ETSU provides a student-centered community of learning, reflecting high standards and promoting a balance of liberal arts and professional preparation, and continuous improvement. The university conducts a wide array of educational and research programs and clinical services including a comprehensive Academic Health Sciences Center. Education is the university's highest priority, and the institution is committed to increasing the level of educational attainment in the state and region based on core values where:
PEOPLE come first, are treated with dignity and respect, and are encouraged to achieve their full potential.
RELATIONSHIPS are built on honesty, integrity, and trust. **DIVERSITY** of people and thought is required.
EXCELLENCE is achieved through teamwork, leadership, creativity, and a strong work ethic. **EFFICIENCY** is achieved through wise use of human and financial resources, and **COMMITMENT** to intellectual achievement is embraced.
ETSU endorses the value of liberal education and provides enriching experiences in honors education, student research and creative activity, study abroad, service learning, and community-based education.
ETSU honors and preserves the rich heritage of Southern Appalachia through distinctive education, research, and service programs and is actively engaged in regional stewardship.
ETSU affirms the contributions of diverse people, cultures, and thought to intellectual, social, and economic development.
ETSU offers students a total university experience that includes cultural and artistic programs, diverse student activities, a variety of residential opportunities, and outstanding recreational and intercollegiate athletic programs.
ETSU awards degrees in over one hundred baccalaureate, master, and doctoral programs, including distinctive interdisciplinary programs and distance education offerings that serve students from the region and beyond.
(Approved by the ETSU Board of Trustees 3/24/17)



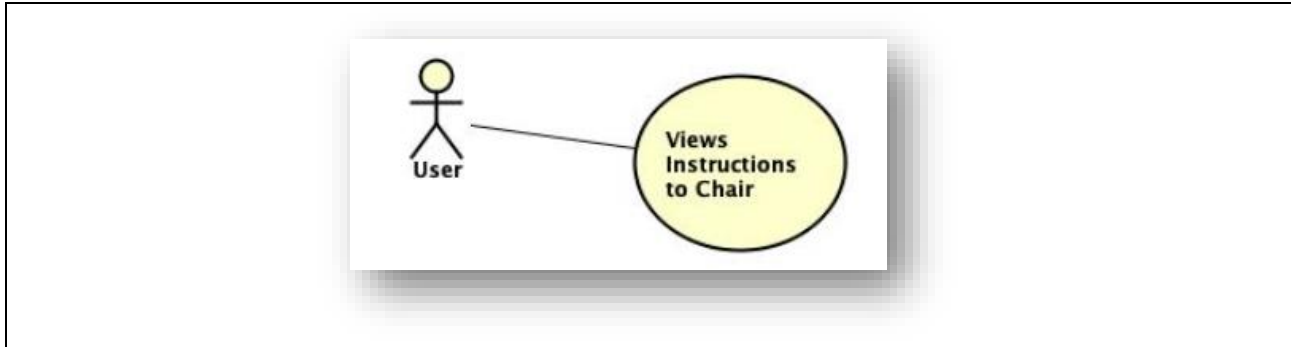
Requirements ID: REQ0008B- ETSU’s Teaching Credential Standards	
Primary Actors: User	
Use Case Name: Any user shall be able to view ETSU's Teaching Credential Standards	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view ETSU's Teaching Credential Standards
Story:	As a user, I want to create view ETSU's Teaching Credential Standards
Quality Requirements:	The system shall allow any user to view ETSU's Teaching Credential Standards in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view ETSU's Teaching Credential Standards
Relationships:	None
Trigger:	Trigger Type: External I select 'Teaching Credential Standards'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I am on the home screen 2. I select 'Teaching Credential Standards' 3. The system responds with 'Teaching Credential Standards' page



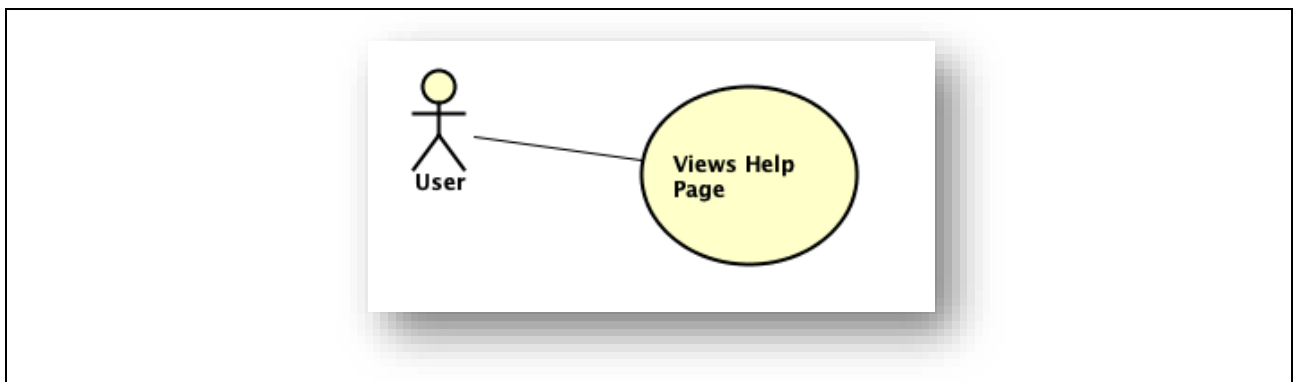
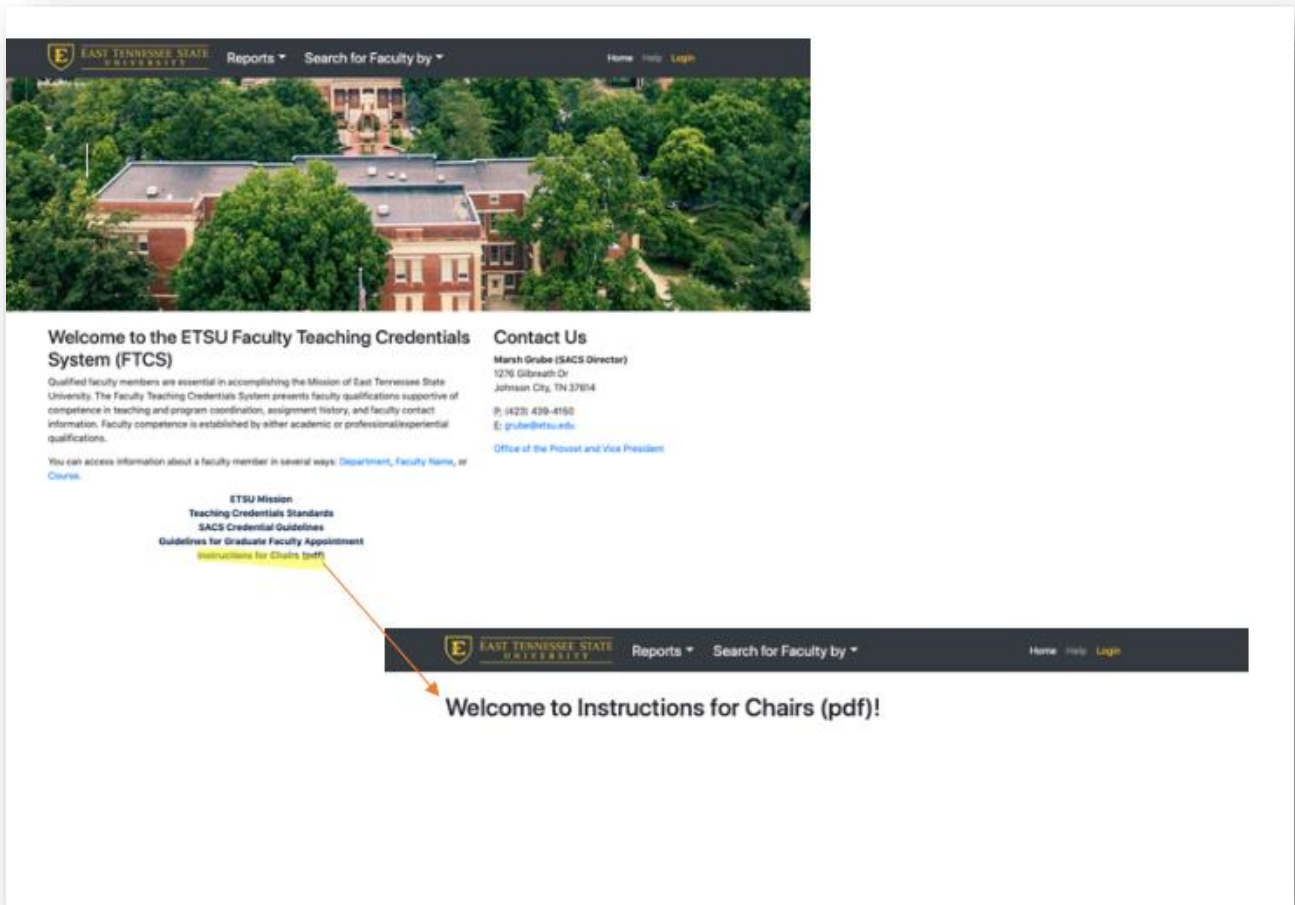
Requirements ID: REQ0008C- SACS Credential Guidelines	
Primary Actors: User	
Use Case Name: Any user shall be able to view SACS Credential Guidelines	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view SACS Credential Guidelines
Story:	As a user, I want to create view SACS Credential Guidelines
Quality Requirements:	The system shall allow any user to view SACS Credential Guidelines in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view SACS Credential Guidelines
Relationships:	None
Trigger:	Trigger Type: External I select 'SACS Credential Guidelines'
Normal Flow of Events:	4. I am on the home screen 5. I select 'SACS Credential Guidelines' 6. The system responds with 'SACS Credential Guidelines' page



Requirements ID: REQ0008D- Guidelines for Graduate Faculty Appointment	
Primary Actors: User	
Use Case Name: Any user shall be able to view Guidelines for Graduate Faculty Appointment	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view Guidelines for Graduate Faculty Appointment
Story:	As a user, I want to view Guidelines for Graduate Faculty Appointment
Quality Requirements:	The system shall allow any user to view Guidelines for Graduate Faculty Appointment in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view Guidelines for Graduate Faculty Appointment
Relationships:	None
Trigger:	Trigger Type: External I select 'Guidelines for Graduate Faculty Appointment'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I am on the home screen 2. I select 'Guidelines for Graduate Faculty Appointment' 3. The system responds with 'Guidelines for Graduate Faculty Appointment'

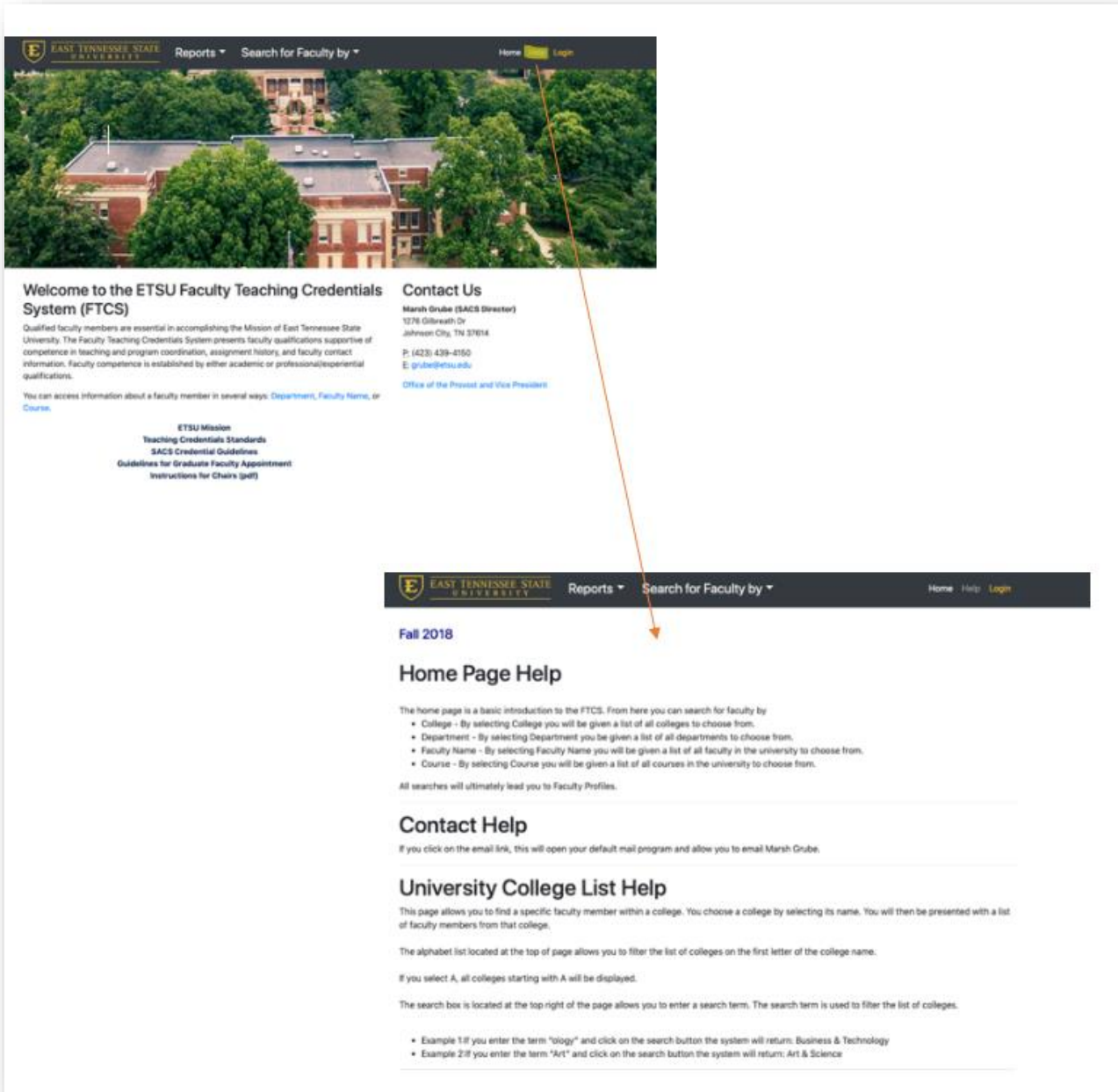


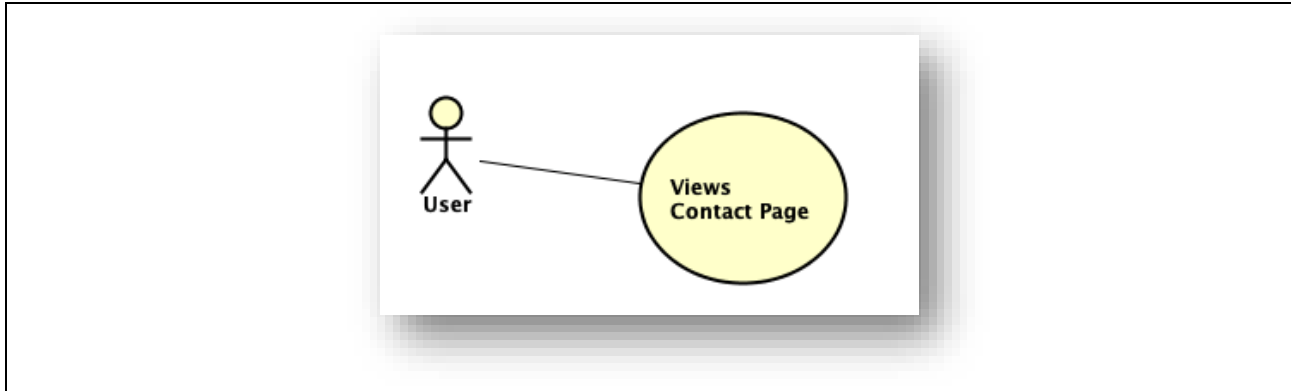
Requirements ID: REQ0008E- Instructions for Chair (PDF)	
Primary Actors: User	
Use Case Name: Any user shall be able to Instructions for Chair	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view Instructions for Chair
Story:	As a user, I want to view Instructions for Chair
Quality Requirements:	The system shall allow any user to view Instructions for Chair in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view Instructions for Chair
Relationships:	None
Trigger:	Trigger Type: External I select 'Instructions for Chair'
Normal Flow of Events:	<ol style="list-style-type: none"> 1. I am on the home screen 2. I select 'Instructions for Chair' 3. The system responds with 'Instructions for Chair' page



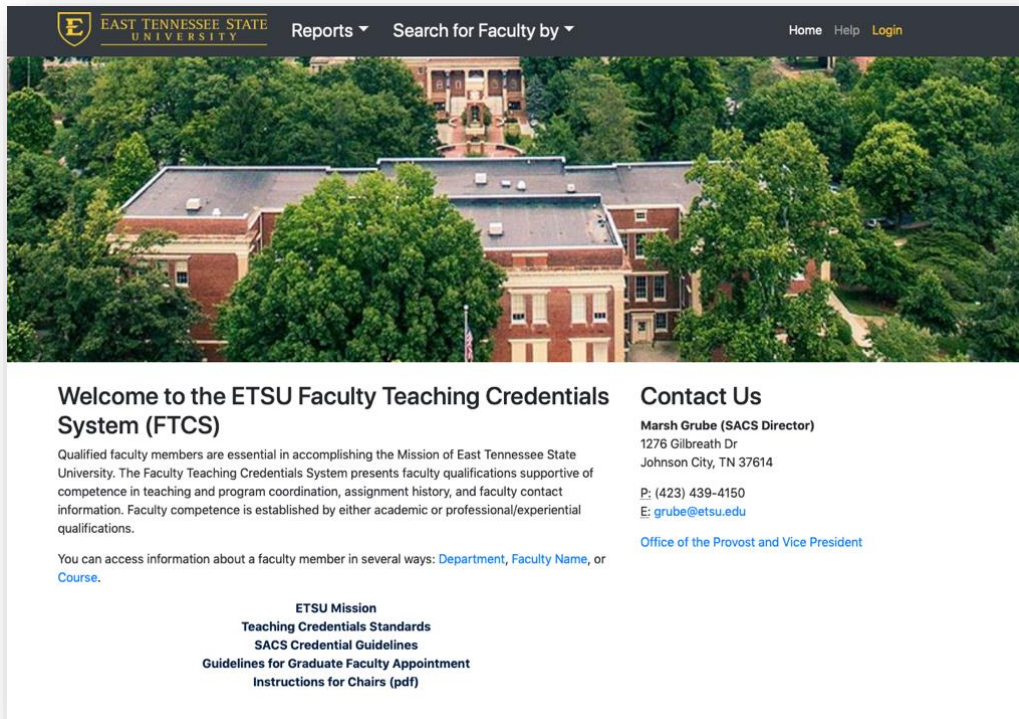
Requirements ID: REQ0009- View Help Page	
Primary Actors: User	
Use Case Name: Any user shall be able to view Help Page	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view Help Page
Story:	As a user, I want to view Help Page

Quality Requirements:	The system shall allow any user to view Help Page in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view Help Page
Relationships:	None
Trigger:	Trigger Type: External I select 'Help Page'
Normal Flow of Events:	1. I am on the home screen 2. I select 'Help Page' 3. The system responds with 'Help Page'





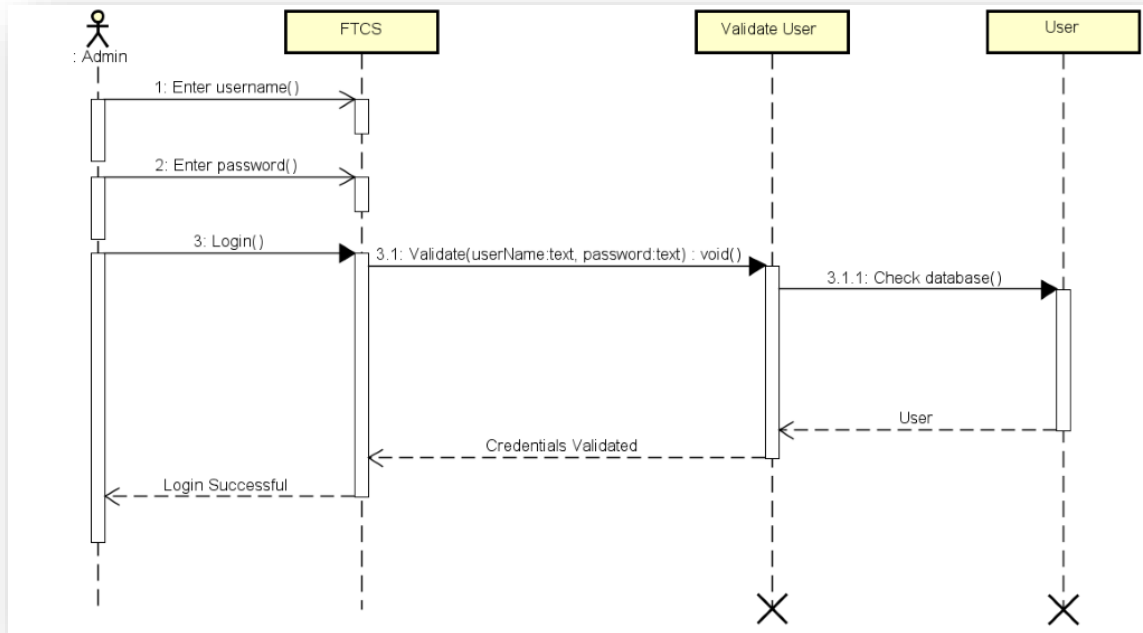
Requirements ID: REQ0009- View Contact Information	
Primary Actors: User	
Use Case Name: Any user shall be able to view Contact Page	Importance Level: High
Stakeholders:	Dr. Jeff Roach, Administrator, Dean, Credential Officer, General User, SACS
Requirement:	The system shall allow any user to view Contact Page
Story:	As a user, I want to view Contact Page
Quality Requirements:	The system shall allow any user to view Contact Page in no more than five seconds
Pre-Conditions:	I am on the home page
Post-Conditions:	Success: 1. I view Contact Information
Relationships:	None
Trigger:	Trigger Type: None
Normal Flow of Events:	1. I am on the home screen 2. I view 'Contact Information'



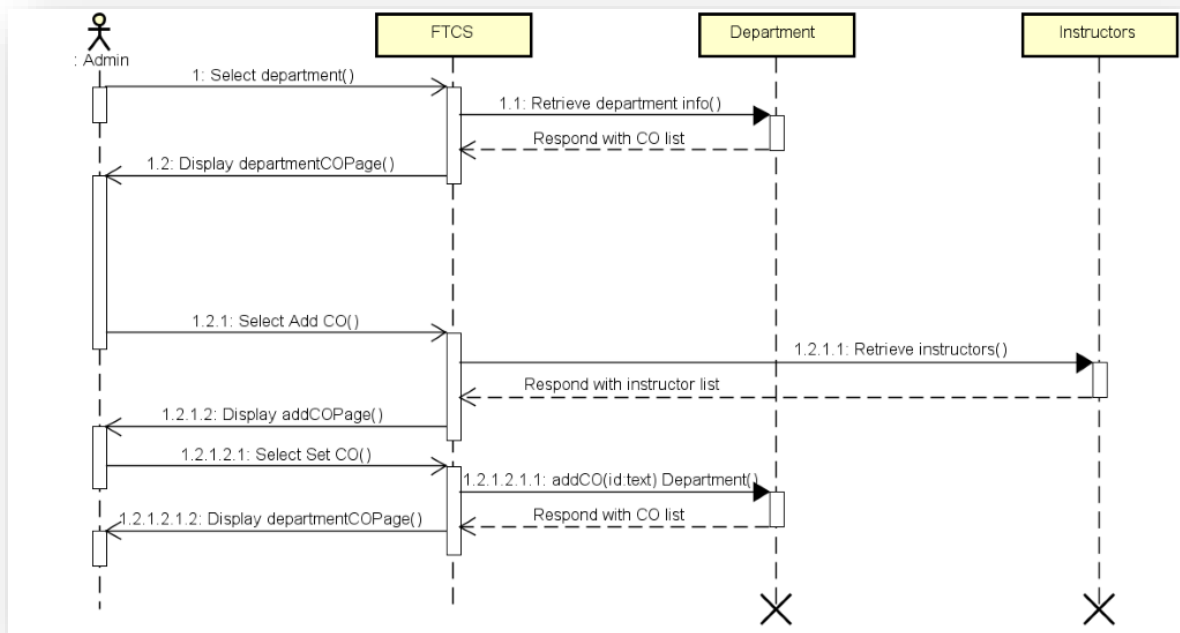
6. Appendix

6.1 Sequence Diagrams

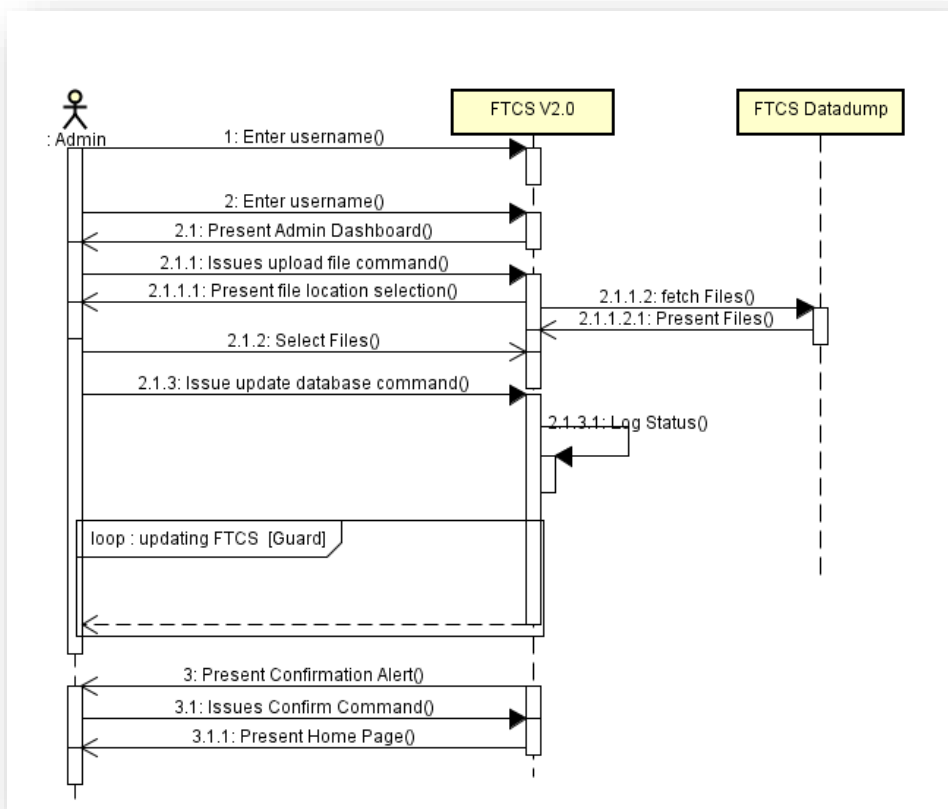
1. Admin Login



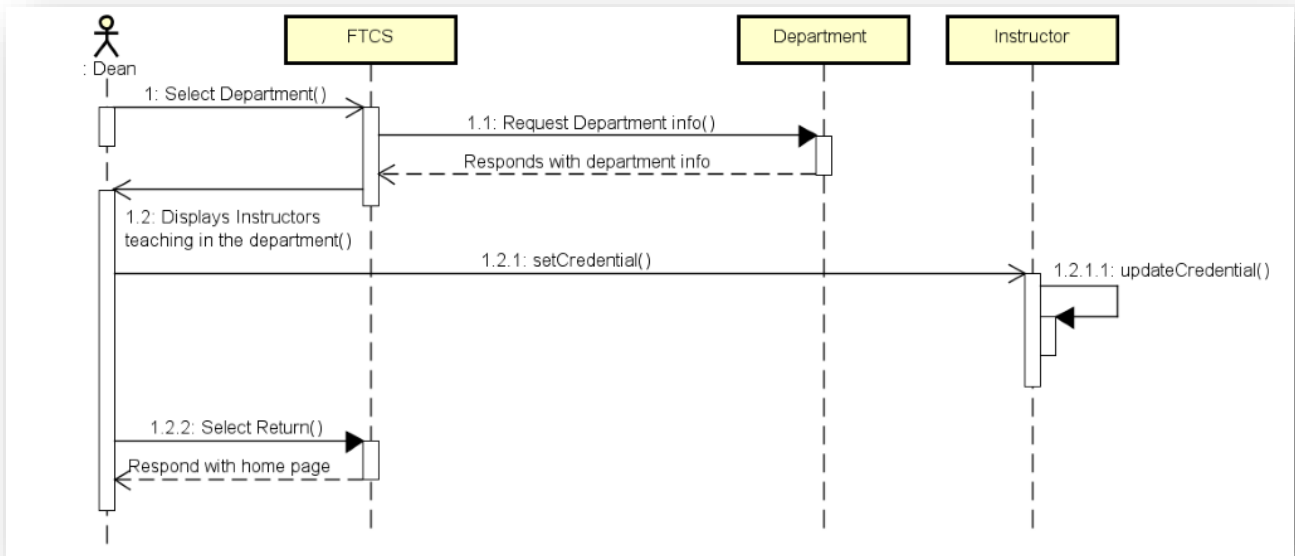
2. Admin Manages Credential Officers



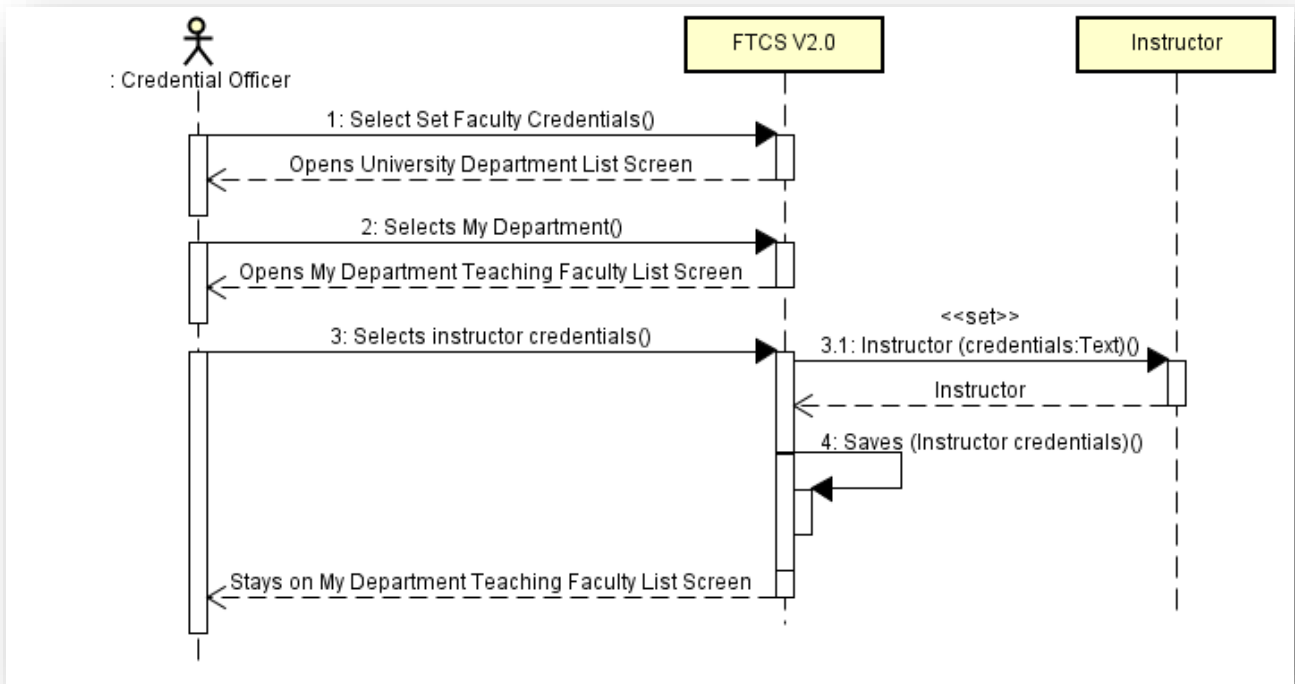
3. ITS Data Dump GUI



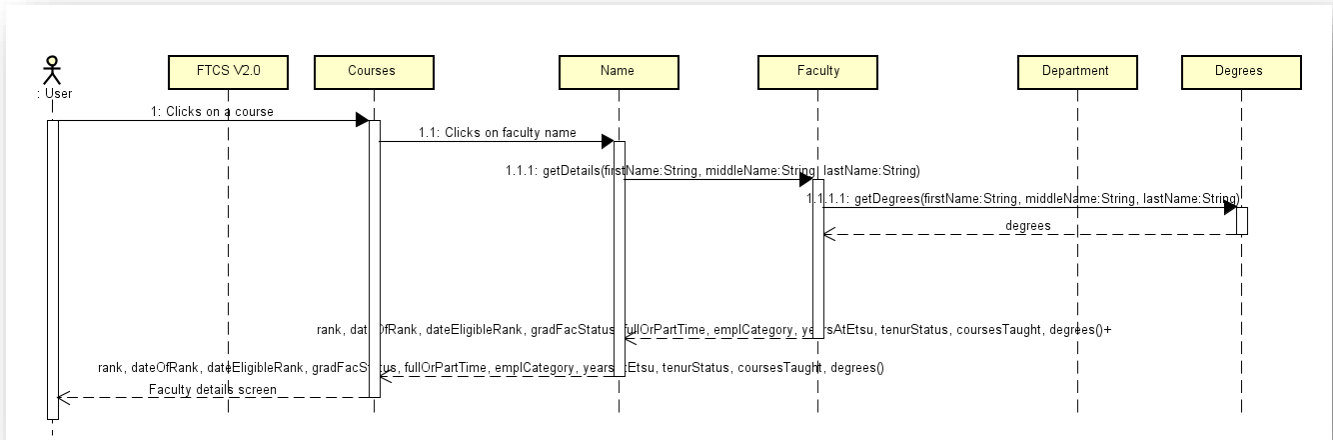
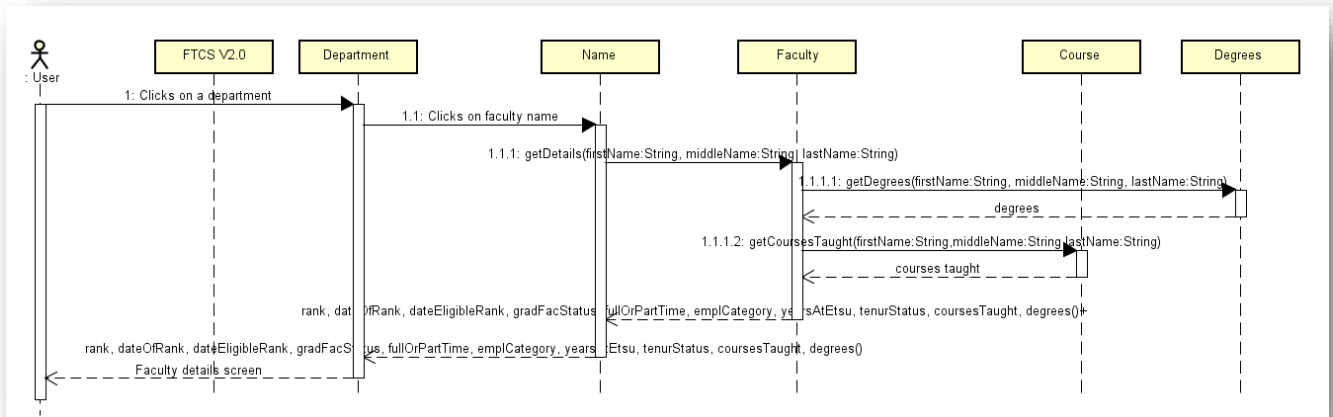
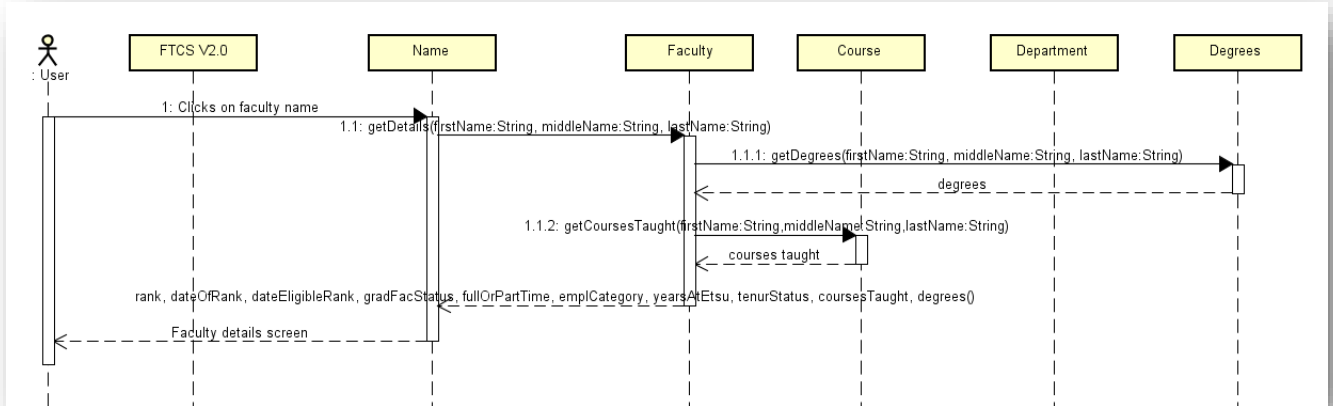
4. Dean Sets Credentials



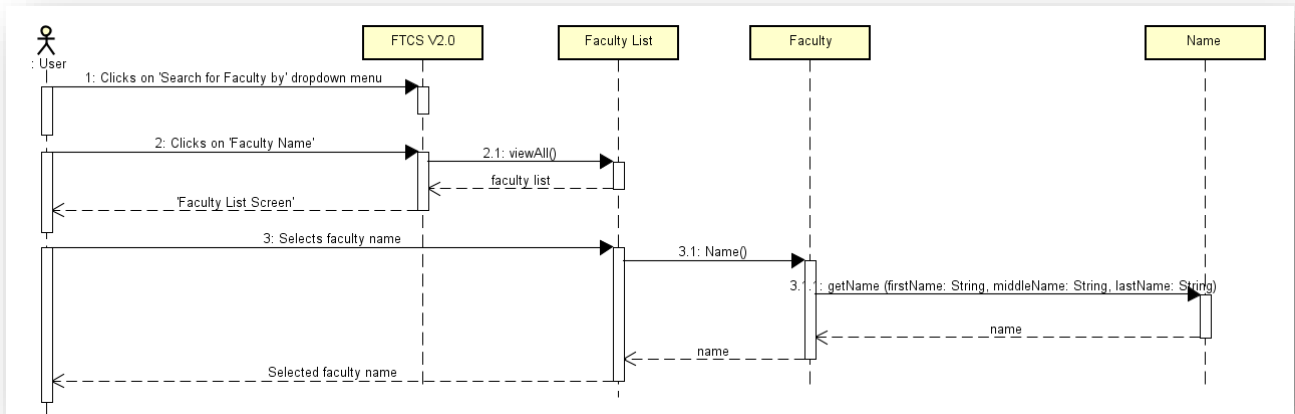
5. Credential Officer Sets Credentials



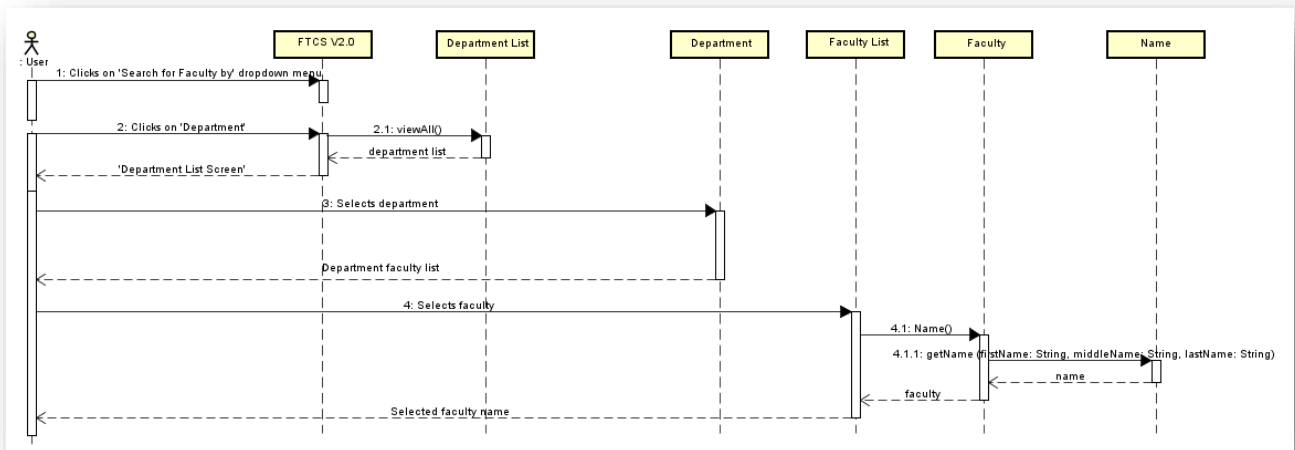
6. View Instructor Details: Credentials, Previous education



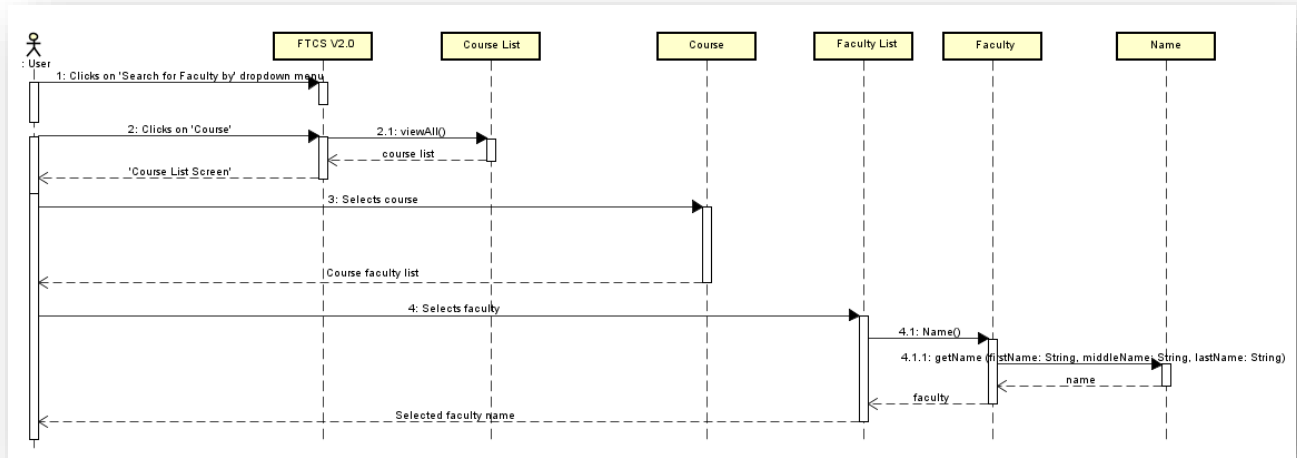
a. Search by Faculty Name



b. Search by Department

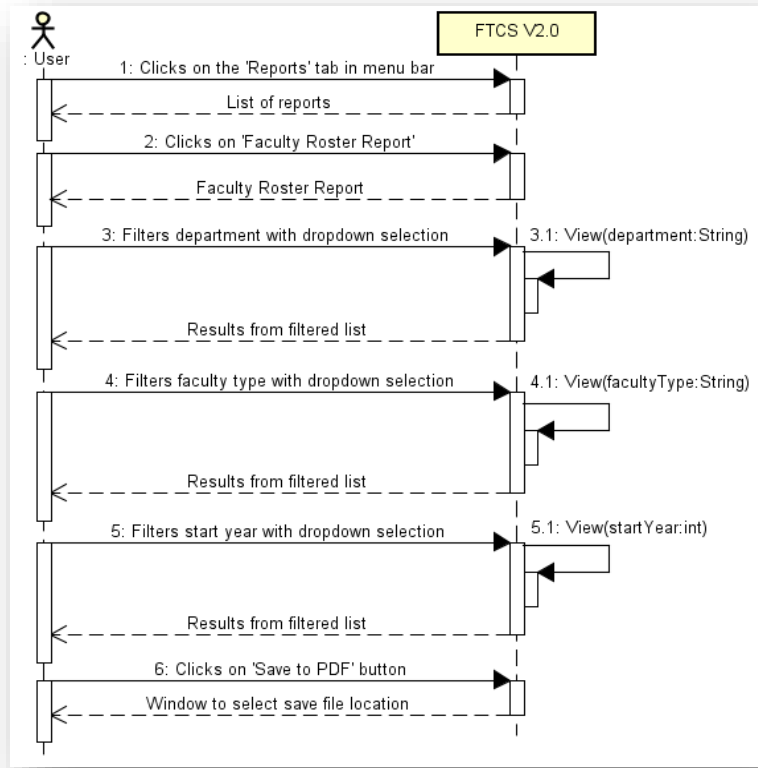


c. Search by Course

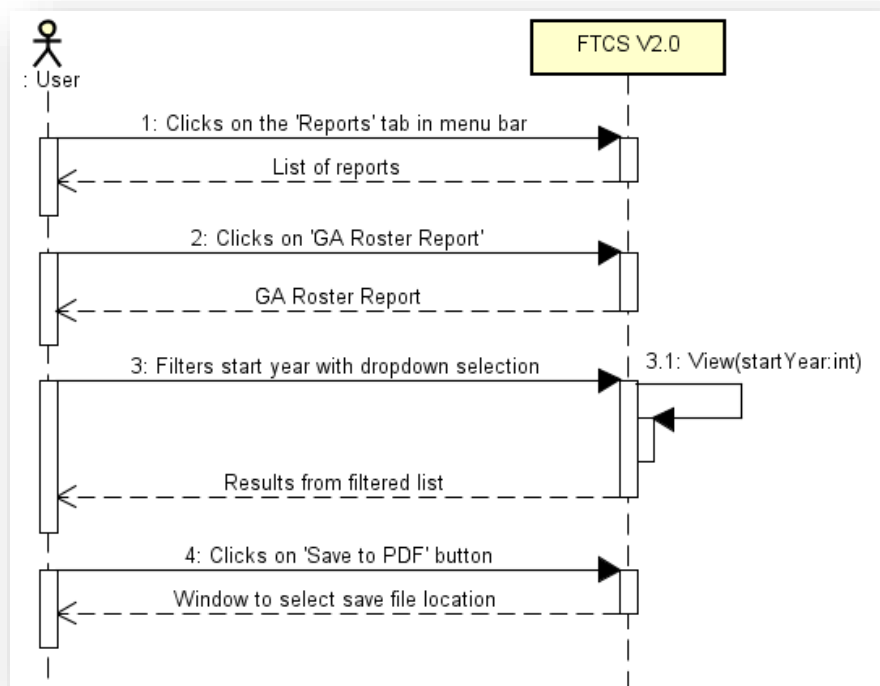


7.

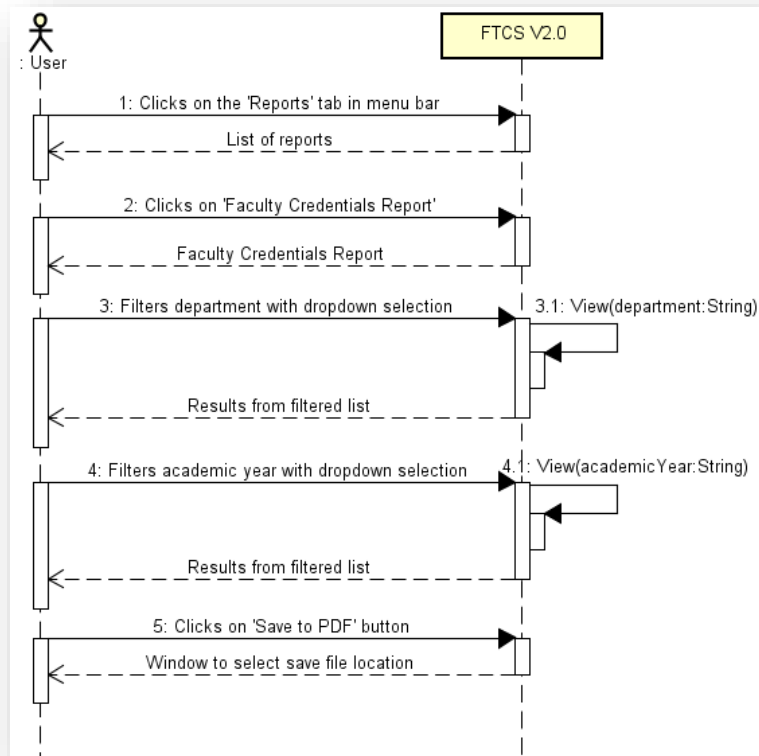
a. Save Faculty Roster



b. Save GA Roster



c. Save Faculty Credentials



d. Save Course Section / Qualifications

