**Project Part 2 - CSCI 4488**

**Team:** Yu Zhou, Christina Matteis, Daniel Nolan, Jacob C. Levine

**Title:** Share-It!

**Project Summary:**
A share economy website where members list their personal knowledge/skills/resources that they'd be willing to share or trade. Then, if a user needs something they can browse the site for other users with that particular skill or resource. Such as someone that has the tools and/or know-how to help you tune your snowboard. The site would include location information so that you could find someone near you.

**Project Requirements:**

| **Business Requirements** | | | | |
|---|---|---|---|---|
| **ID** | **Requirement** | **Topic Area** | **User** | **Priority** |
| No business requirements | | | | |

| **User Requirements** | | | | |
|---|---|---|---|---|
| **ID** | **Requirement** | **Topic Area** | **User** | **Priority** |
| USR-001 | New user can create a new account | Account setup | All users | Critical |
| USR-002 | Existing user can save personal skills/resources | User profile | All users | High |
| USR-003 | Existing user can search for someone with desired skill/resource | Searches | All users | Critical |
| USR-004 | Existing user can search by zip code to find skill/resource | Searches | All users | Medium |
| USR-005 | A System Administrator can unlock a locked account for a user. | Security | Sys Admin | High |
| USR-006 | A user can request to have their account deleted | User account | All users | Low |

| | | | | |
|---|---|---|---|---|
| USR-007 | A user can submit support ticket | Customer service | All users | Medium |
| USR-008 | A Sys. Admin must delete a user account if requested | Account deletion | Sys Admin | High |
| USR-009 | A user can reset their password automatically through the “Forgot Password” link | Password reset | All users | High |
| USR-010 | A user can message another user after finding that they have a certain skill/resource | Inter-user messaging | All users | High |
| USR-011 | A user can login into the system. | Login | All users | High |

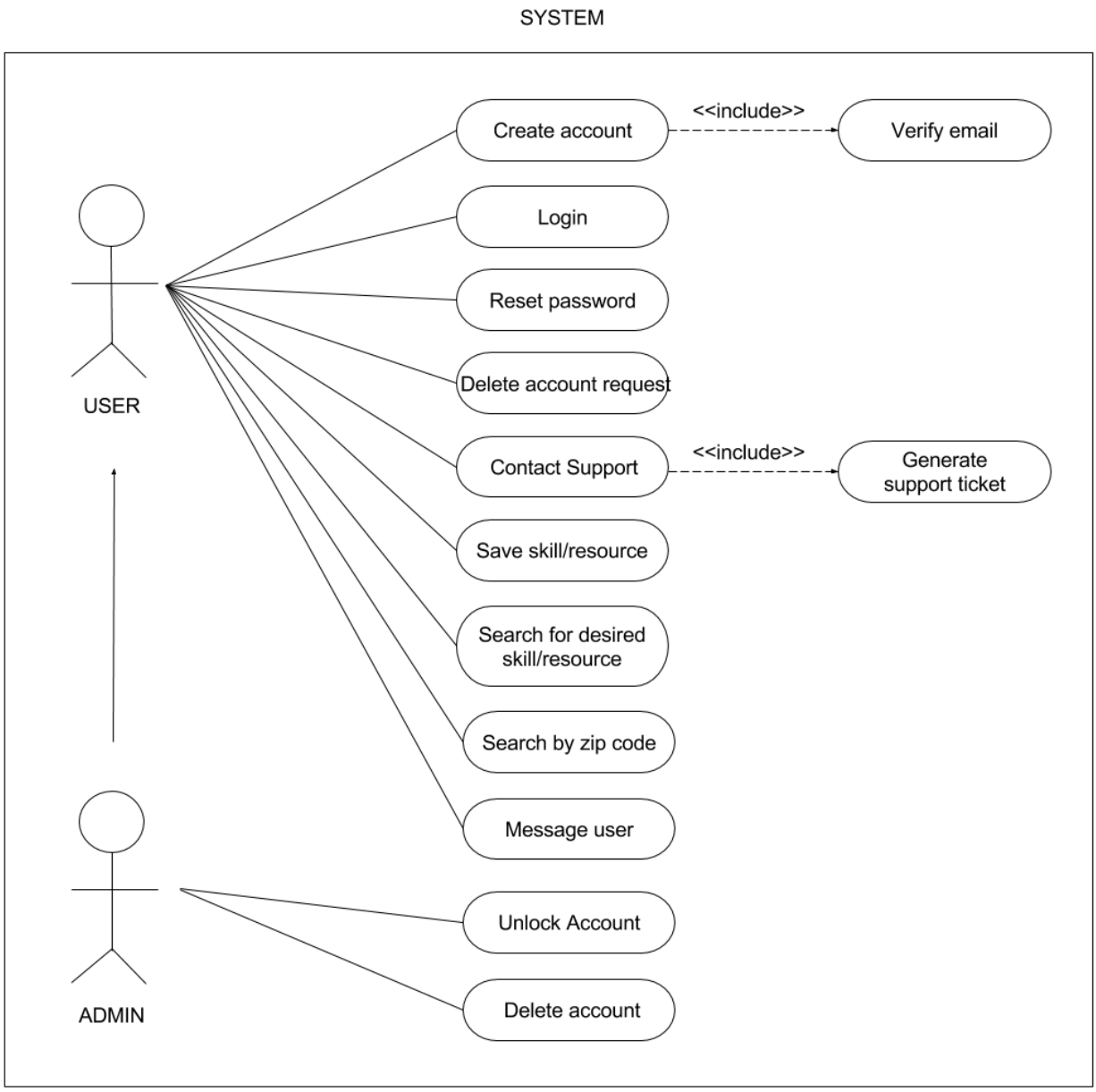
| **Functional Requirements** | | | | |
|---|---|---|---|---|
| **ID** | **Requirement** | **Topic Area** | **User** | **Priority** |
| FUNC-001 | User info must be deleted if a user requests it | Data deletion | All Users | Medium |

| **Non-Functional Requirements** | | | | |
|---|---|---|---|---|
| **ID** | **Requirement** | **Topic Area** | **User** | **Priority** |
| NONF-001 | User’s accounts are password-protected for security reasons | Security | All users | Medium |
| NONF-002 | User’s email address is verified as valid | Security | All users | Low |

**Use Cases:**

**Actors**: Admin, Customers

**Use Case Overview:**




**Use Case Documents:**

| | |
|---|---|
| **Use Case ID:** | USR-001 |
| **Use Case Name:** | Create Account |
| **Description:** | A new user can create an account with an email address |
| **Actors:** | User |

<table>
<tr><td>Pre-Conditions:</td><td>1. User does not have an existing account<br>2. User has active email address</td></tr>
<tr><td>Post-Conditions:</td><td>User has a personal account for web use</td></tr>
<tr><td>Frequency of Use:</td><td>Once</td></tr>
<tr><td>Flow of Events:</td><td>
<table>
<tr><td></td><td>Actor Action</td><td>System Response</td></tr>
<tr><td>1</td><td>User clicks “Create Account” button on homepage</td><td>Displays form for email address and password</td></tr>
<tr><td>2</td><td>User inputs email address, password, and accepts geolocation access then clicks “Submit” button.</td><td>System saves information to database and confirmation email is sent. Success prompt is shown.</td></tr>
</table>
</td></tr>
<tr><td>Variations:</td><td>2. If email is already in use, system will prompt user to either use another email or login.</td></tr>
<tr><td>Notes and Issues:</td><td></td></tr>
<tr><td>Developer Notes:</td><td></td></tr>
</table>

<table>
<tr><td>Use Case ID:</td><td>USR-002</td></tr>
<tr><td>Use Case Name:</td><td>Save a skill or resource</td></tr>
<tr><td>Description:</td><td>Existing user can save a personal skills or resource that is to be made available to other users for sharing.</td></tr>
<tr><td>Actors:</td><td>User</td></tr>
<tr><td>Pre-Conditions:</td><td>User has an active account and is logged in</td></tr>
<tr><td>Post-Conditions:</td><td>New skill/resource is saved in database</td></tr>
<tr><td>Frequency of Use:</td><td>Moderate</td></tr>
<tr><td>Flow of Events:</td><td>
<table>
<tr><td></td><td>Actor Action</td><td>System Response</td></tr>
</table>
</td></tr>
</table>

| | |
|---|---|
| | <table><tr><td>1</td><td>Click “Save New Skill/Resource”</td><td>Displays list of skills/resources for user to pick from</td></tr><tr><td></td><td>User selects applicable skills/resources and presses “Save”</td><td>System prompts for user to “Save Choices?” or Cancel</td></tr><tr><td>2</td><td>User clicks save</td><td>System saves new skill/resource in database</td></tr></table> |
| **Variations:** | 2. If user attempts to click save without picking at least one skill/resource, system prompts user to pick and resubmit. |
| **Notes and Issues:** | User must pick at least one skill/resource to save |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-003 |
| **Use Case Name:** | Skill/resource search |
| **Description:** | Existing user can search for someone with desired skill/resource |
| **Actors:** | User |
| **Pre-Conditions:** | User has an active account and is logged in |
| **Post-Conditions:** | Matching results (if any) are displayed |
| **Frequency of Use:** | High |
| **Flow of Events:** | <table><tr><td></td><td>Actor Action</td><td>System Response</td></tr><tr><td>1</td><td>User clicks on “Search” button</td><td>Displays form for entering search criteria</td></tr><tr><td>2</td><td>User fills in search form and clicks submit</td><td>Displays list of any matching results</td></tr></table> |

| | |
|---|---|
| **Variations:** | 2. If form is missing any required fields, system prompts user to fill in those fields and resubmit. |
| **Notes and Issues:** | |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-004 |
| **Use Case Name:** | Skill/resource search by zip code |
| **Description:** | Existing user can search by zip code to find someone with a specific skill/resource in their area. |
| **Actors:** | User |
| **Pre-Conditions:** | User has an active account and is logged in |
| **Post-Conditions:** | Matching results (if any) are displayed |
| **Frequency of Use:** | High |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User clicks on “Search” button | Displays form for entering search criteria |
| 2 | User fills in search form and clicks submit | Displays list of any matching results |

| | |
|---|---|
| **Variations:** | 2. If form is missing any required fields, system prompts user to fill in those fields and resubmit. |
| **Notes and Issues:** | |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-005 |
| **Use Case Name:** | Unlock User Account |
| **Description:** | A System Administrator can unlock a locked account for a user |

<table>
<tr><td>Actors:</td><td>User, Sys Admin</td></tr>
<tr><td>Pre-Conditions:</td><td>User has an active, locked account and Sys Admin is logged in</td></tr>
<tr><td>Post-Conditions:</td><td>User is able to login to their account using new temp password</td></tr>
<tr><td>Frequency of Use:</td><td>Moderate</td></tr>
<tr><td>Flow of Events:</td><td>
<table>
<tr><td></td><td>Actor Action</td><td>System Response</td></tr>
<tr><td>1</td><td>User calls customer service and requests a to have their account unlocked</td><td></td></tr>
<tr><td>3</td><td>Sys Admin clicks “Manage a user’s account”</td><td>Displays form for entering a user’s username</td></tr>
<tr><td>4</td><td>Sys Admin enters the relevant username and clicks submit</td><td>Displays admin page for managing a specific user’s account</td></tr>
<tr><td>5</td><td>Sys Admin verifies user’s identity by having them confirm account info on file</td><td></td></tr>
<tr><td>6</td><td>Sys Admin clicks “Unlock User Account”</td><td>User’s account is unlocked</td></tr>
</table>
</td></tr>
<tr><td>Variations:</td><td>6. If the user was unable to provide info that verifies their identity, the Sys Admin apologizes that they cannot help the user at this time and does not unlock the account.</td></tr>
<tr><td>Notes and Issues:</td><td></td></tr>
<tr><td>Developer Notes:</td><td></td></tr>
</table>

| | |
|---|---|
| **Use Case ID:** | USR-006 |
| **Use Case Name:** | Delete Account Request |
| **Description:** | An existing user can request to delete their account |
| **Actors:** | User |

| | |
|---|---|
| **Pre-Conditions:** | User has an existing account |
| **Post-Conditions:** | Account will be marked for deletion |
| **Frequency of Use:** | Once |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User clicks on “Manage Account” | Display user account settings |
| 2 | User clicks on “Request to Delete Account” | System prompts for confirmation |
| 3 | User confirms by clicking “OK” | System marks user’s account for removal in database |

| | |
|---|---|
| **Variations:** | |
| **Notes and Issues:** | |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-007 |
| **Use Case Name:** | Submit Support Ticket |
| **Description:** | An existing user can write and submit a support ticket |
| **Actors:** | User |
| **Pre-Conditions:** | User has an existing account |
| **Post-Conditions:** | User ticket has been submitted |
| **Frequency of Use:** | Low |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User clicks on “Create a Ticket” | Display text box to |

<table>
<tr><td></td><td>
<table>
<tr><td></td><td></td><td>write a ticket</td></tr>
<tr><td>2</td><td>User creates a ticket message</td><td>Text is displayed within the given textbox</td></tr>
<tr><td>3</td><td>User submits a written ticket</td><td>A “Submission Successful” message displays</td></tr>
</table>
</td></tr>
<tr><td>Variations:</td><td>3. If a ticket is missing any required fields, system prompts user to fill in those fields before submission.</td></tr>
<tr><td>Notes and Issues:</td><td></td></tr>
<tr><td>Developer Notes:</td><td></td></tr>
</table>

<table>
<tr><td>Use Case ID:</td><td>USR-008</td></tr>
<tr><td>Use Case Name:</td><td>Delete Account</td></tr>
<tr><td>Description:</td><td>If deletion was requested by user, a system administrator will delete the account.</td></tr>
<tr><td>Actors:</td><td>Admin</td></tr>
<tr><td>Pre-Conditions:</td><td>User has requested to delete their account</td></tr>
<tr><td>Post-Conditions:</td><td>User will no longer have an account</td></tr>
<tr><td>Frequency of Use:</td><td>Once</td></tr>
<tr><td>Flow of Events:</td><td>
<table>
<tr><td></td><td>Actor Action</td><td>System Response</td></tr>
<tr><td>1</td><td>System Admin clicks “Requests for account removal”</td><td>Displays table of users requesting to delete accounts</td></tr>
<tr><td>2</td><td>Sys Admin clicks on specific user name</td><td>Displays admin page for managing a user’s account</td></tr>
</table>
</td></tr>
</table>

| | | | |
|---|---|---|---|
| | | Sys Admin clicks “Permanently Delete Account” | System deletes all database tables associated with user account |
| **Variations:** | | | |
| **Notes and Issues:** | | | |
| **Developer Notes:** | | | |

| | |
|---|---|
| **Use Case ID:** | USR-009 |
| **Use Case Name:** | Click “Password Reset” Link |
| **Description:** | A user can click “Forgot Password,” which generates a clickable link that resets a previous password |
| **Actors:** | User |
| **Pre-Conditions:** | User has an existing account |
| **Post-Conditions:** | User password has been reset |
| **Frequency of Use:** | One to many |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User clicks “Forgot Password” button | System displays form for entering user’s email address. |
| 2 | User enters their email address and clicks submit | System sends a link to user allowing for password reset |
| 3 | User clicks “Password Reset” link in the email | Set of fields display allowing a user to change their password |
| 4 | User submits new password | System displays verification that the password has changed |

| | |
|---|---|
| **Variations:** | 3. If a user submits a previously used password, disable submission button and throw an error since it must be a new password.<br><br>3. If the password field is empty, send a verification message stating that the field is empty and must be filled in. |
| **Notes and Issues:** | |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-010 |
| **Use Case Name:** | User Messaging |
| **Description:** | A user can message another user after finding that they have a certain skill / resource |
| **Actors:** | Users |
| **Pre-Conditions:** | Users have existing accounts, user must have submitted skills/resources |
| **Post-Conditions:** | User receives a message from another user |
| **Frequency of Use:** | High |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User 1 searches for another user with a certain skill they are interested in | System displays all possible users that match the user's search |
| 2 | User 1 clicks on User 2 who has a chosen resource / skill | User 2 information and message link is displayed |
| 3 | User 1 messages User 2 | User 2 receives a message from User 1 and both are CC'd onto an email / message board |

| | |
|---|---|
| **Variations:** | |
| **Notes and Issues:** | |
| **Developer Notes:** | |

| | |
|---|---|
| **Use Case ID:** | USR-011 |
| **Use Case Name:** | User Login |
| **Description:** | A user can login into the system |
| **Actors:** | User |
| **Pre-Conditions:** | User has an existing account |
| **Post-Conditions:** | User has logged into their account |
| **Frequency of Use:** | High |
| **Flow of Events:** | |

| | Actor Action | System Response |
|---|---|---|
| 1 | User inputs username and password into designated fields | |
| 2 | User clicks “Login” button | System logs user into their account |

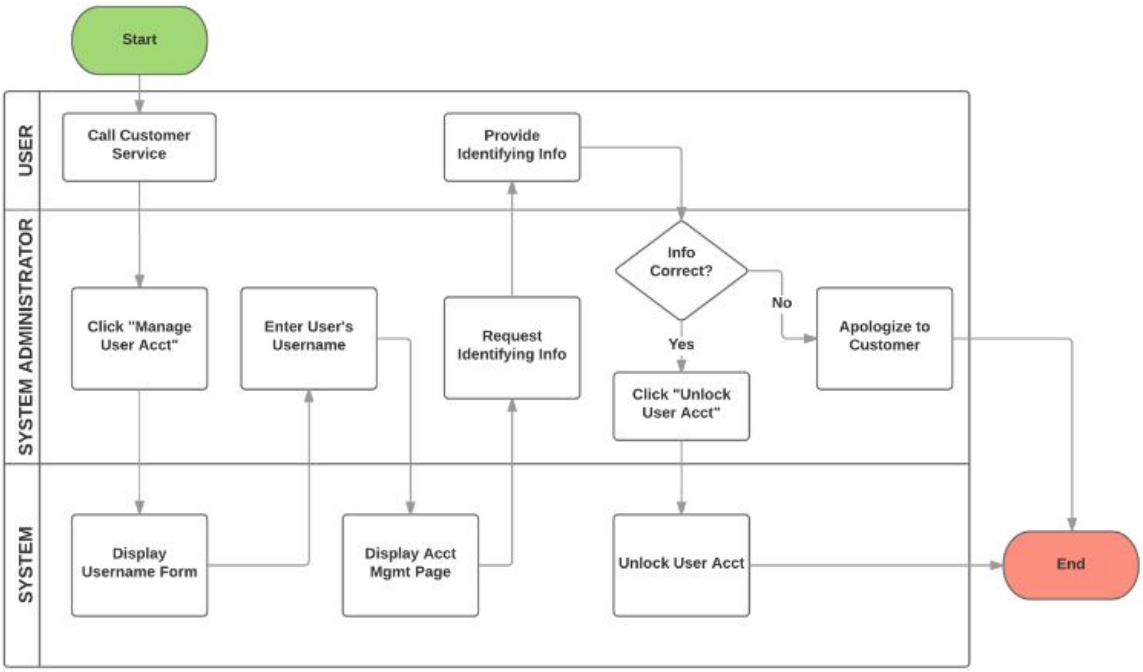
| | |
|---|---|
| **Variations:** | 2. If User submits incorrect values in login fields, system will prompt user to try logging in again. |
| **Notes and Issues:** | |
| **Developer Notes:** | |

**Activity Diagrams:**

**1.**

## UNLOCK USER ACCOUNT

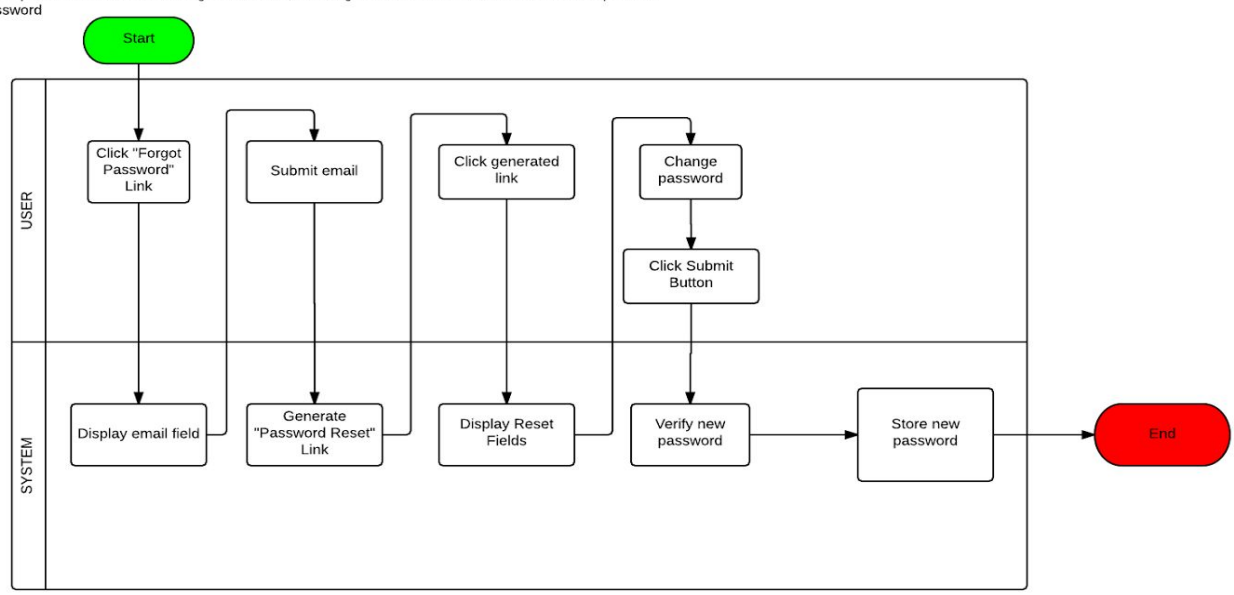
Requirement ID#: USR-005
Use Case ID#: USR-005
By: Jacob C. Levine
Descprition: A Sys Admin unlocks an account for a user




**2.**

**CLICK "PASSWORD RESET" LINK**

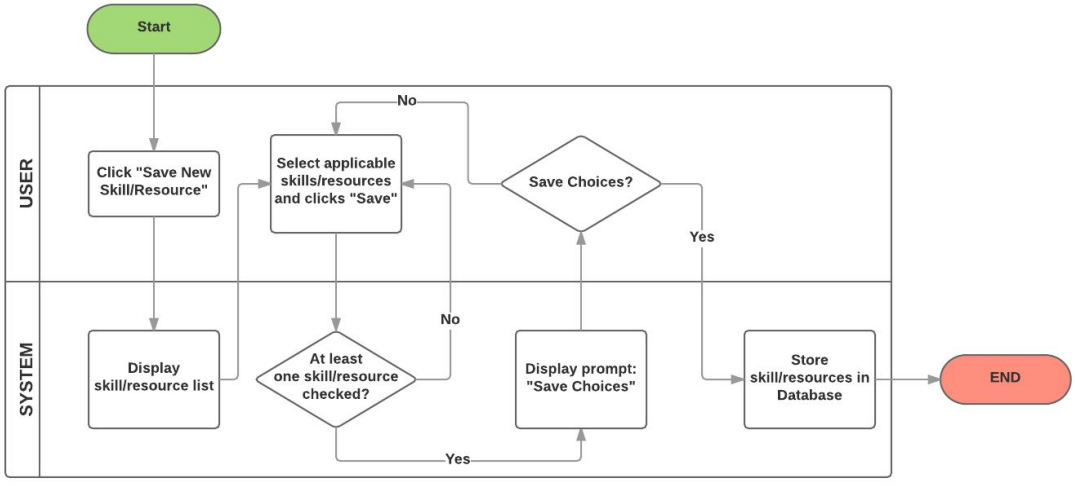
Requirement ID #: USR-009
Use Case ID #: USR-009
By: Daniel Nolan
Description: A user can click "Forgot Password," which generates a clickable link that resets a previous password




**3.**

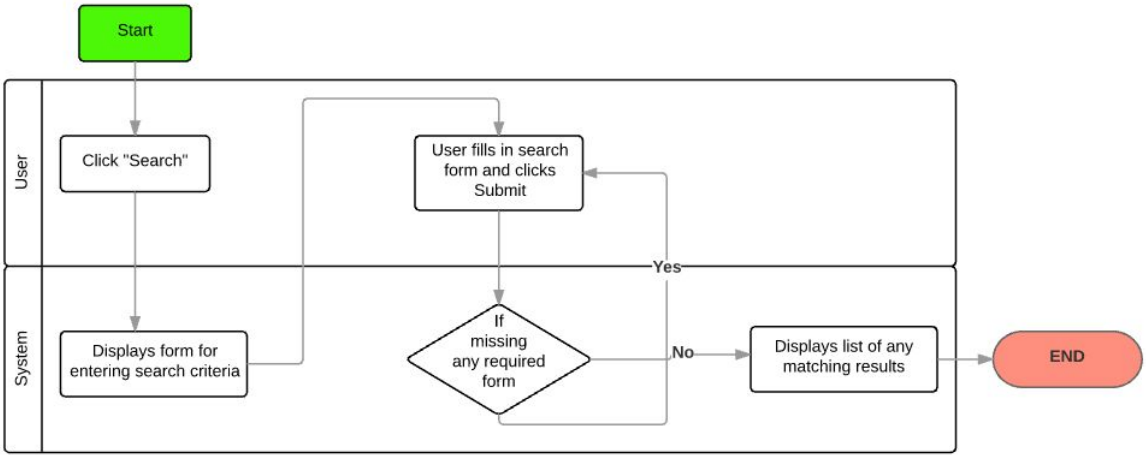
**SAVE NEW SKILL/RESOURCE**

**Requirement ID#: USR-002**
**Use Case ID#: USR-002**
**By: Christina Matteis**
**Description: An existing user can save a personal skills or resource that is to be made available to other users for sharing.**




**4.**

**Skill/resource search by zip code**
Requirement ID#: USR-004
Use Case ID#:USR-004
By Yu Zhou
Description: Existing user can search by zip code to find someone with a specific skill/resource in their area.

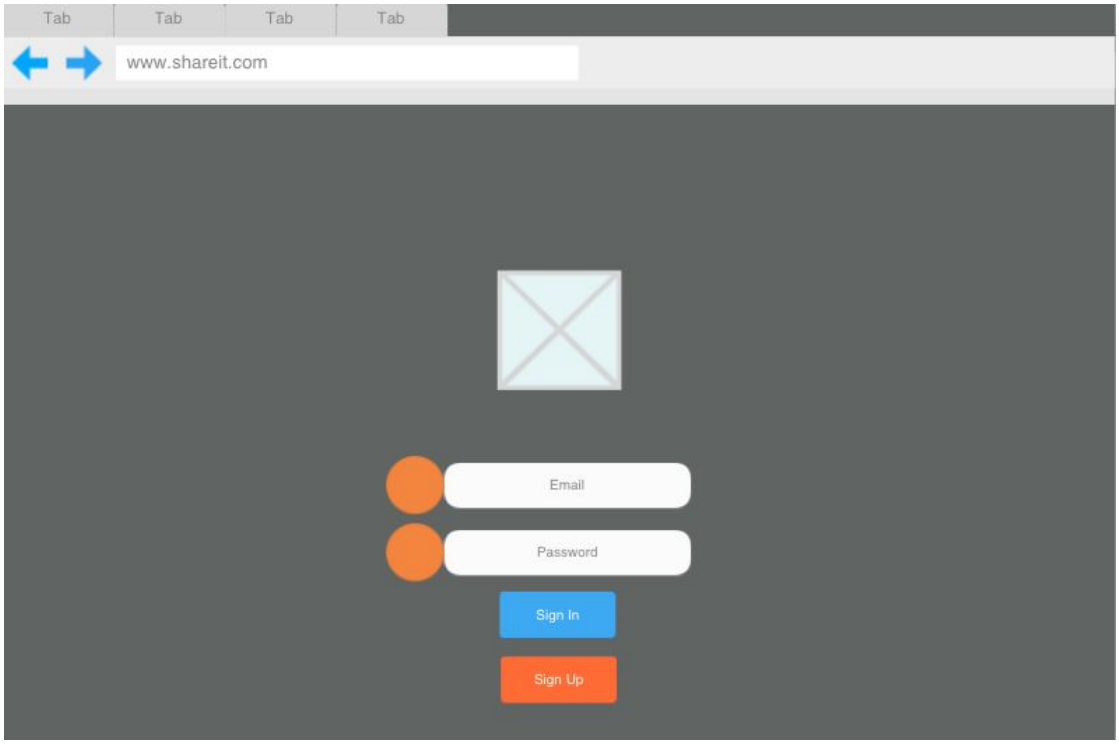



**Data Storage:**

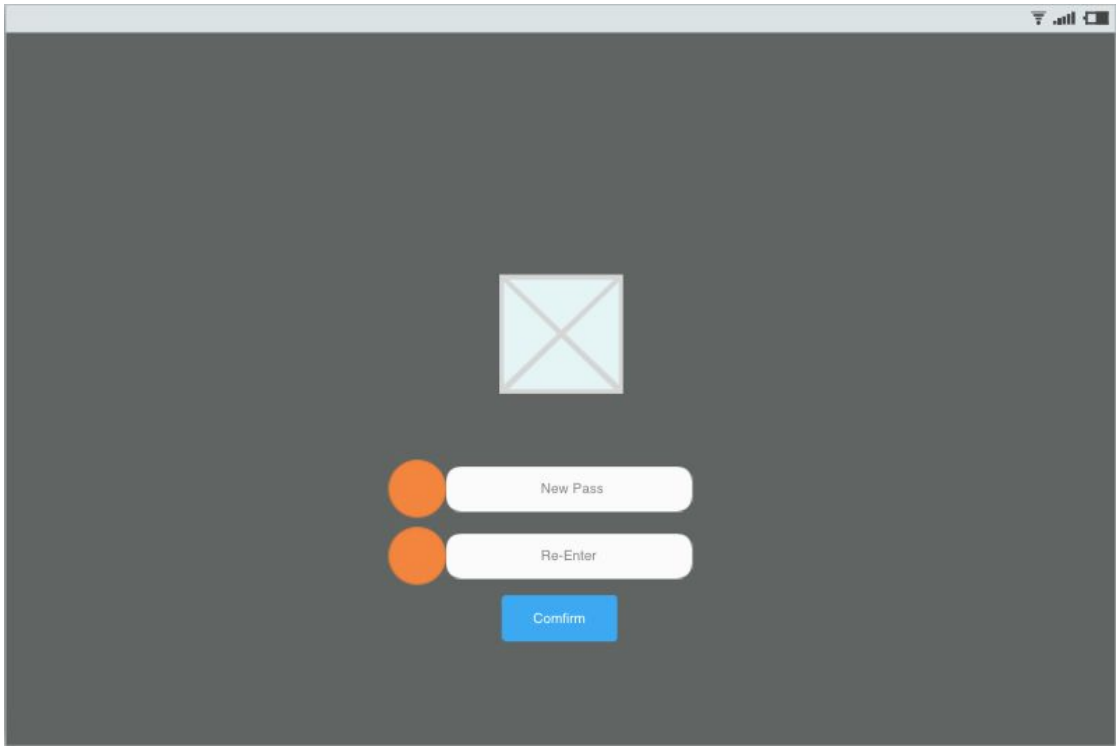
- MySQL database
- Classes:
    - DBmanager class to store all needed information such as user info (including System Administrators) and messages
    - All other classes go through the DBmanager class

**UI Mockups:**

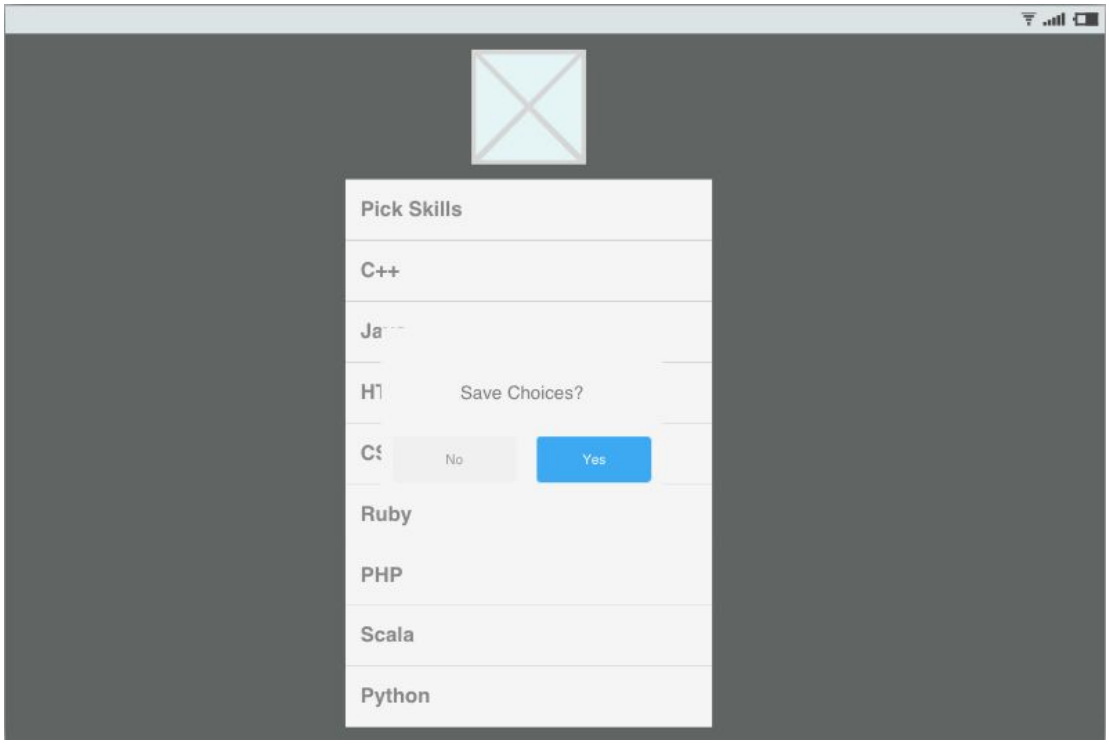
**Log In**



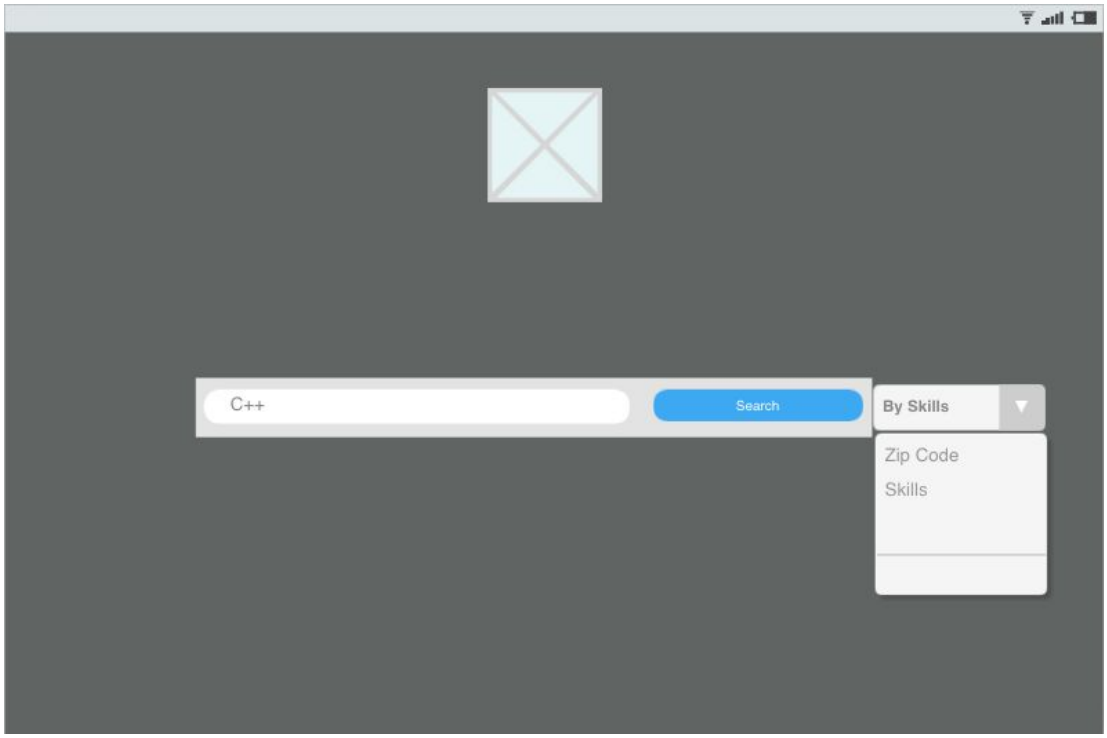

**Change Password**



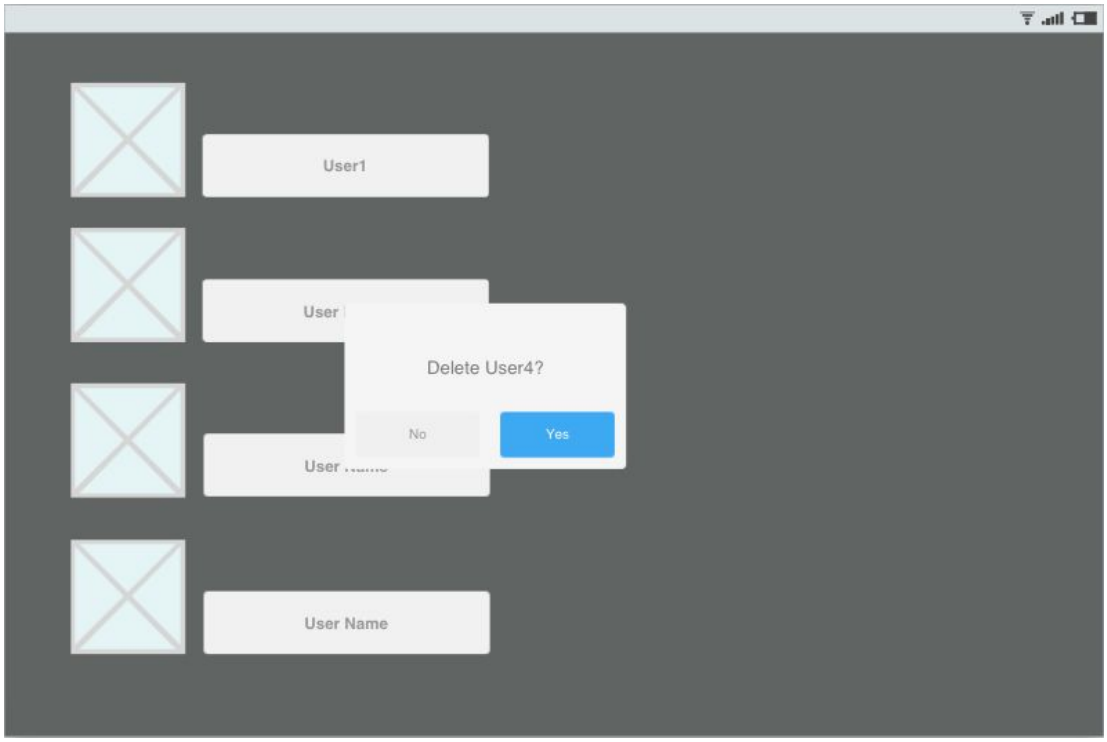
**Save Skills**



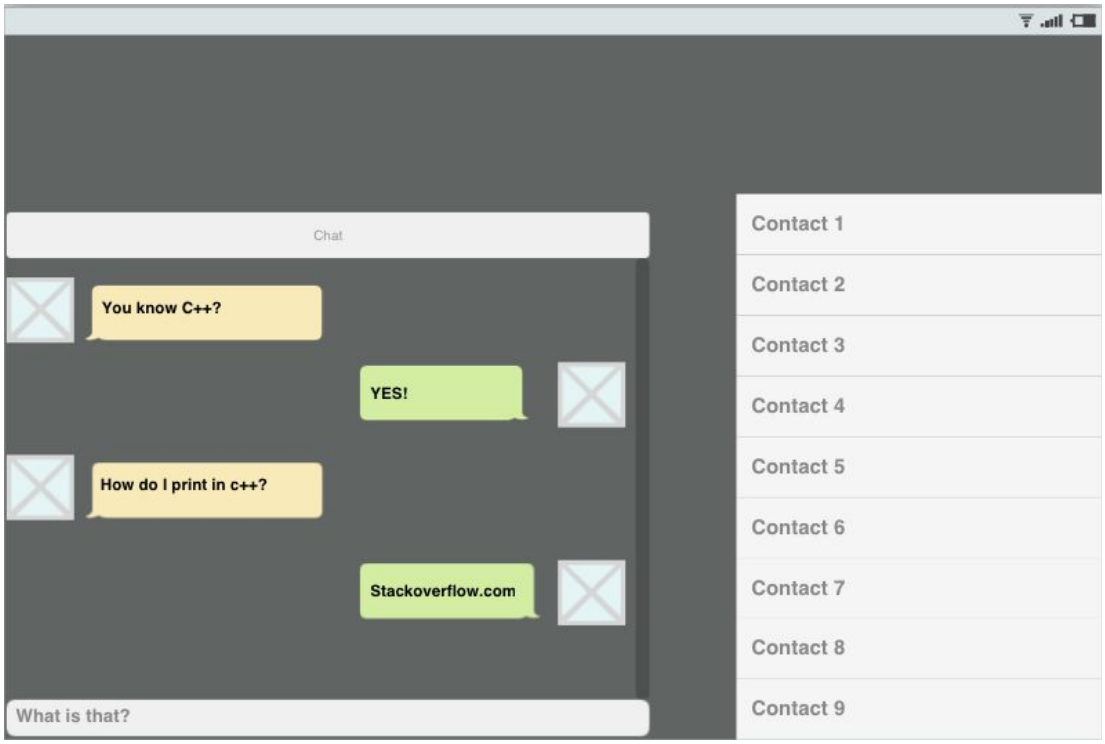

**Search Skills/Zip Code**



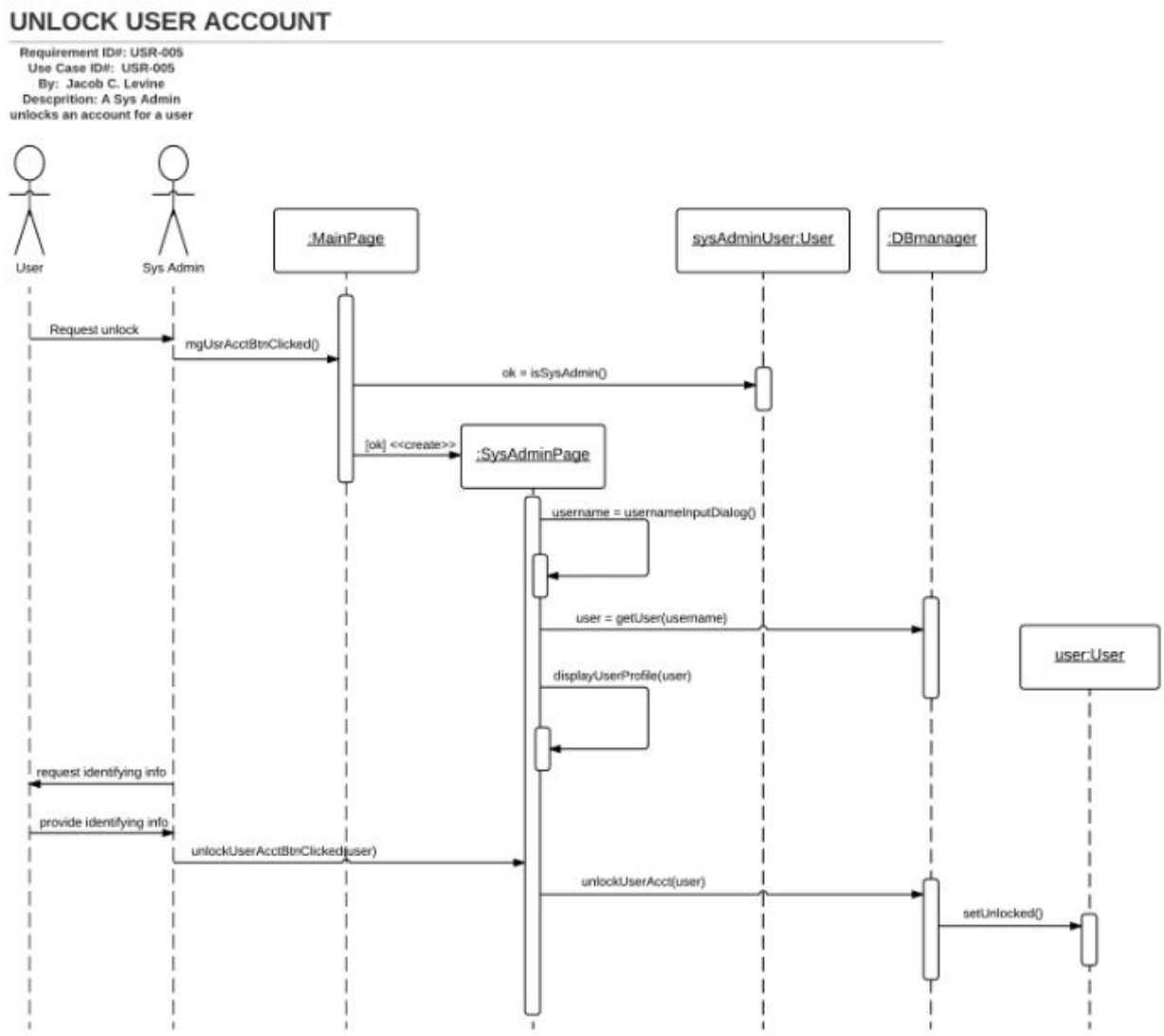
## Delete Users




## Chat System

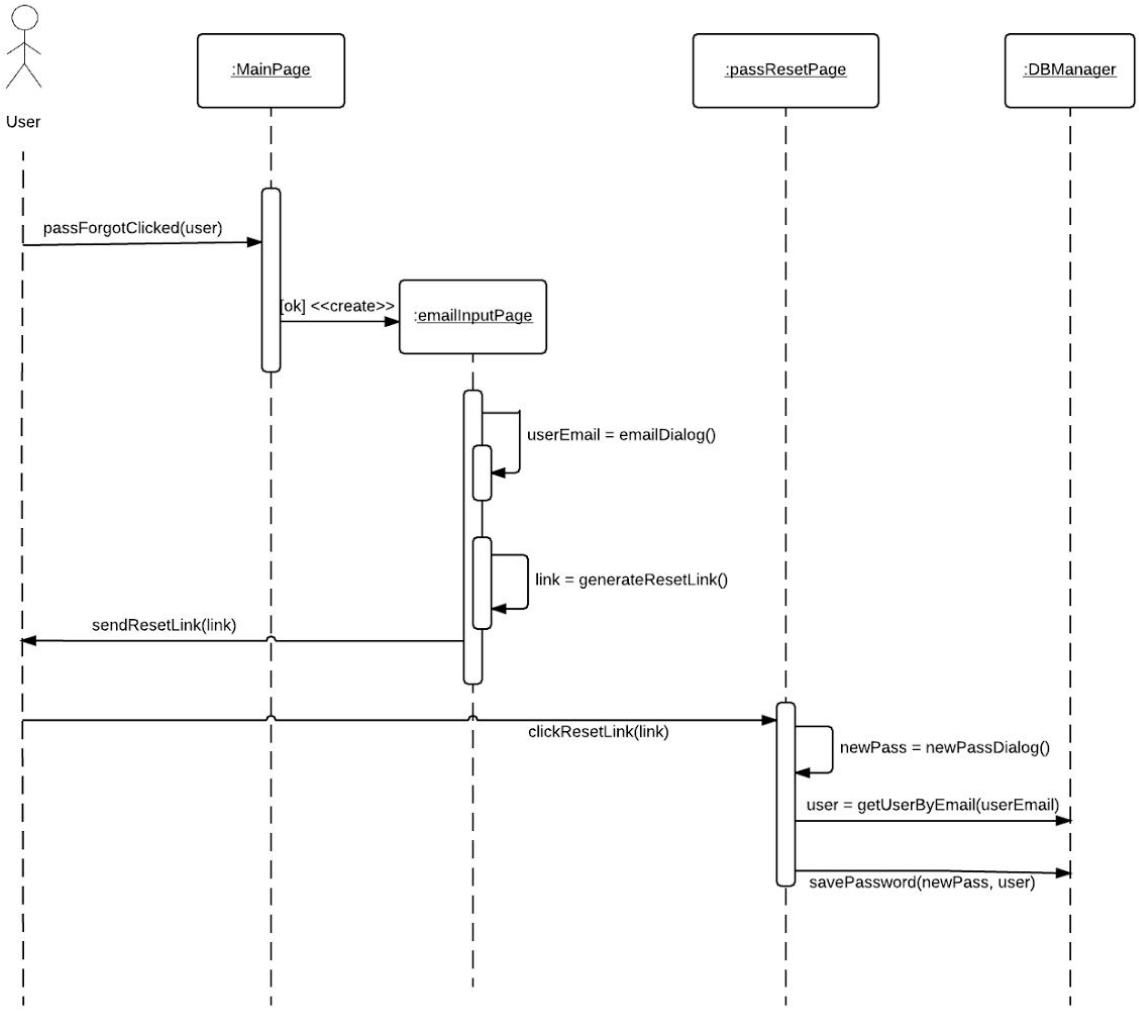


**User Interactions:**

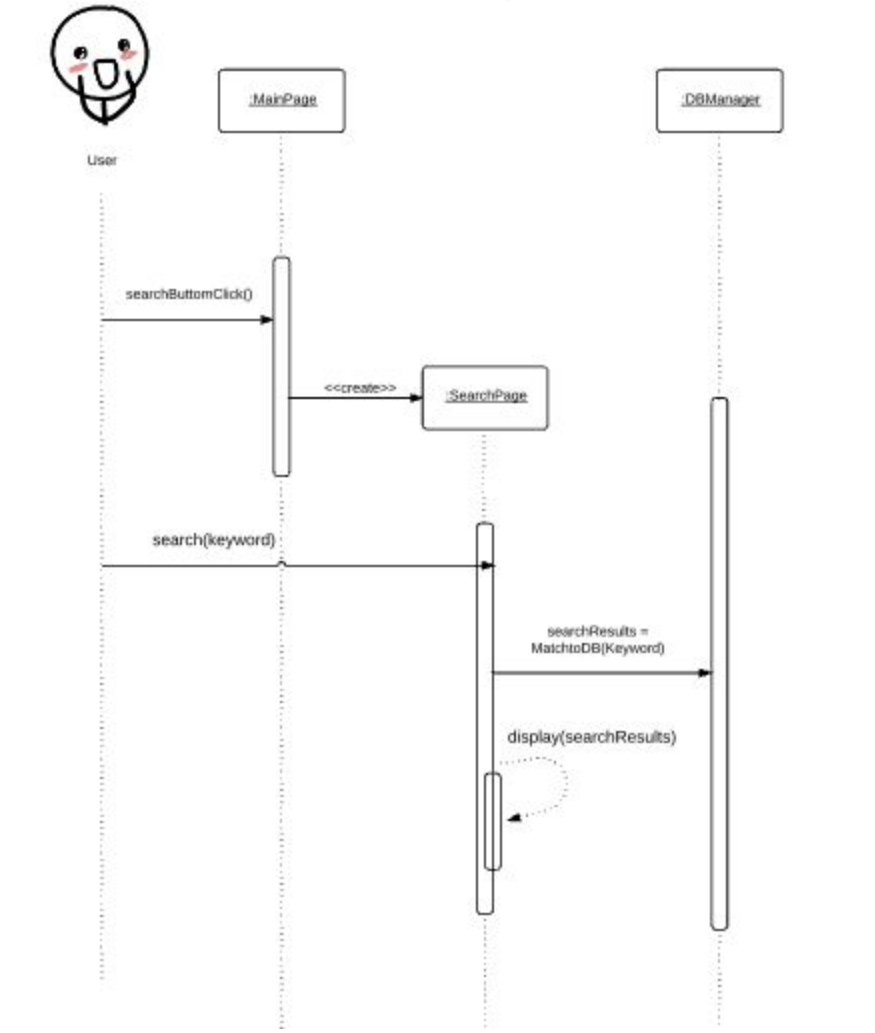


**CLICK "PASSWORD RESET" LINK**

Requirement ID #: USR-009
Use Case ID #: USR-009
By: Daniel Nolan
Description: A user can click "Forgot Password," which generates a clickable link that resets a previous password

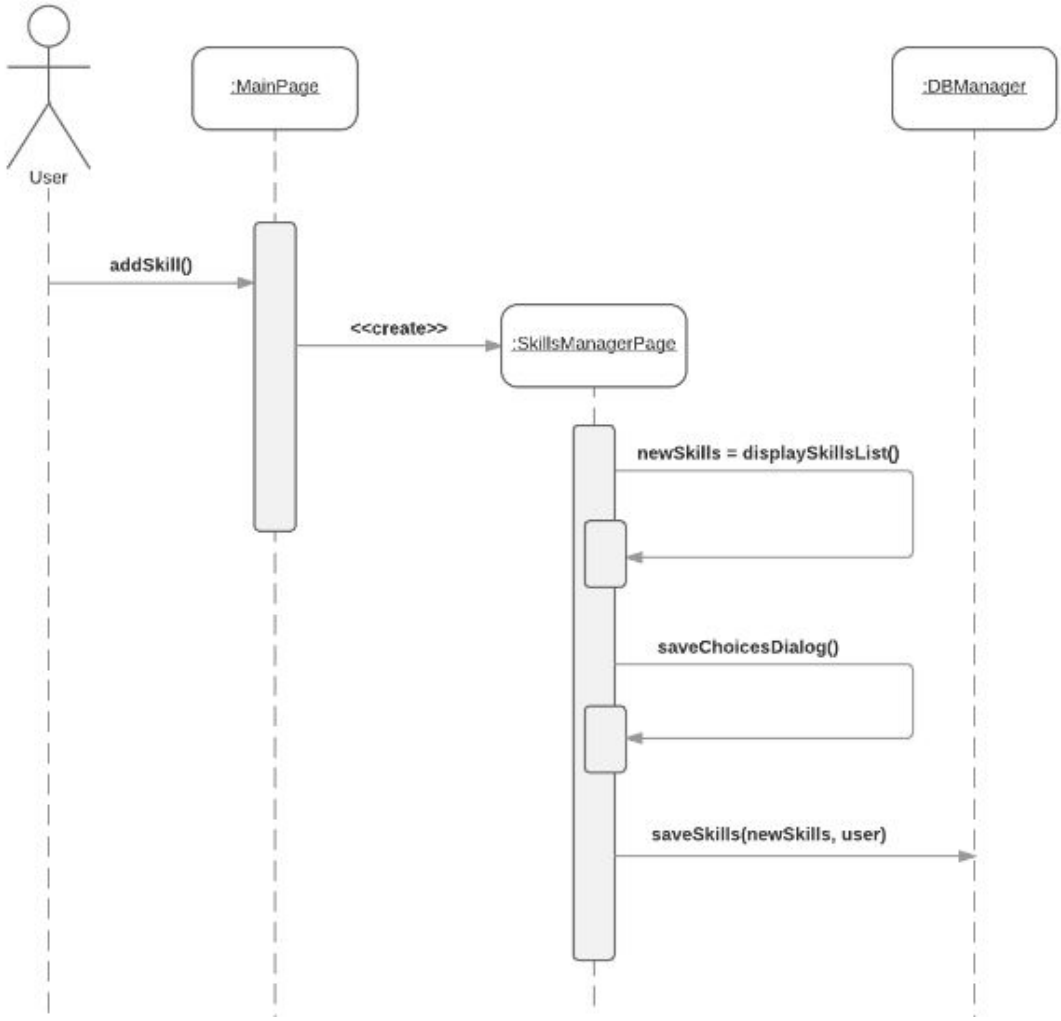


**Skill/resource search by zip code**
Requirement ID#: USR-004
Use Case ID#:USR-004
By Yu Zhou
Description: Existing user can search by zip code to find someone with a specific skill/resource in their area.

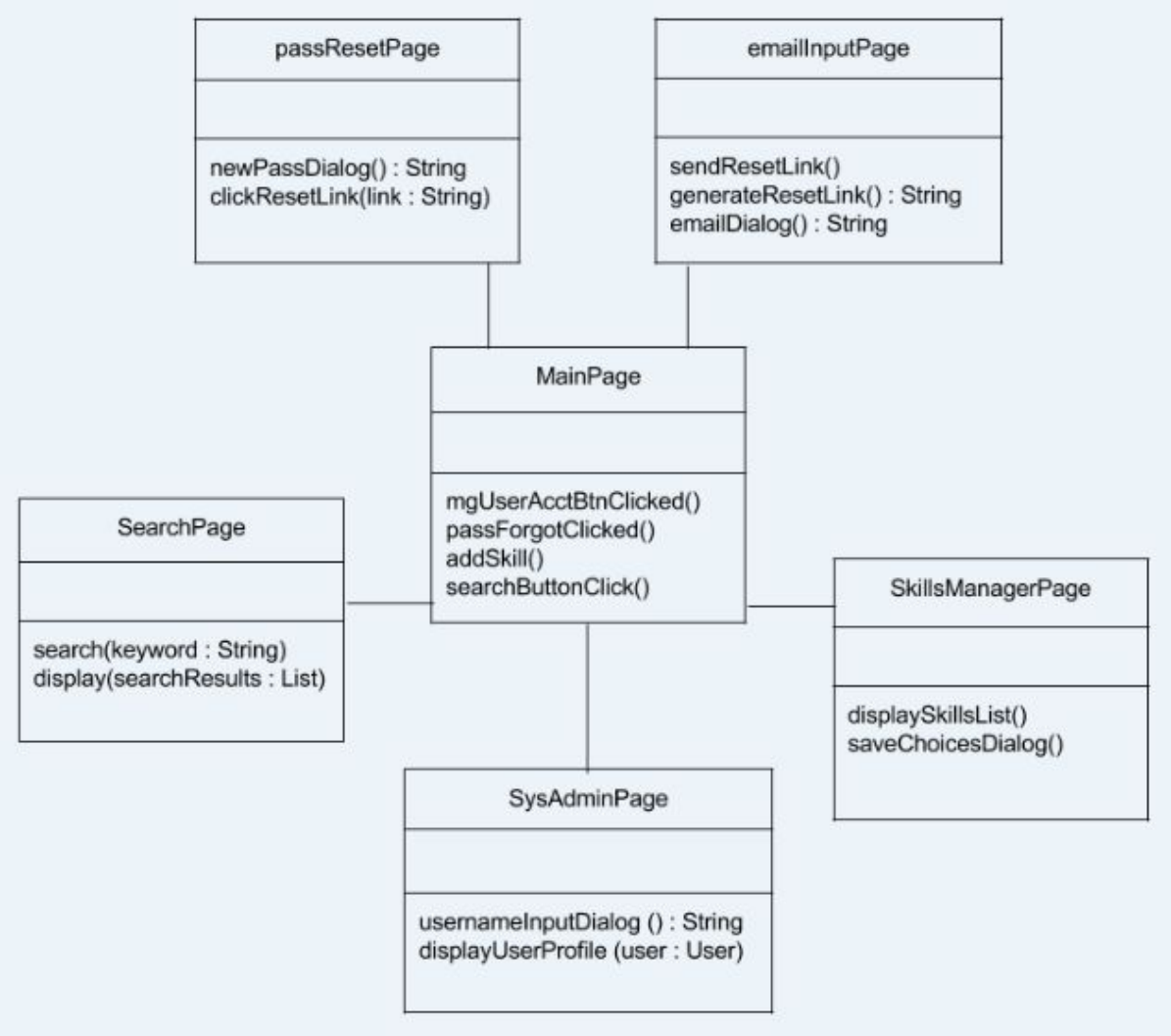


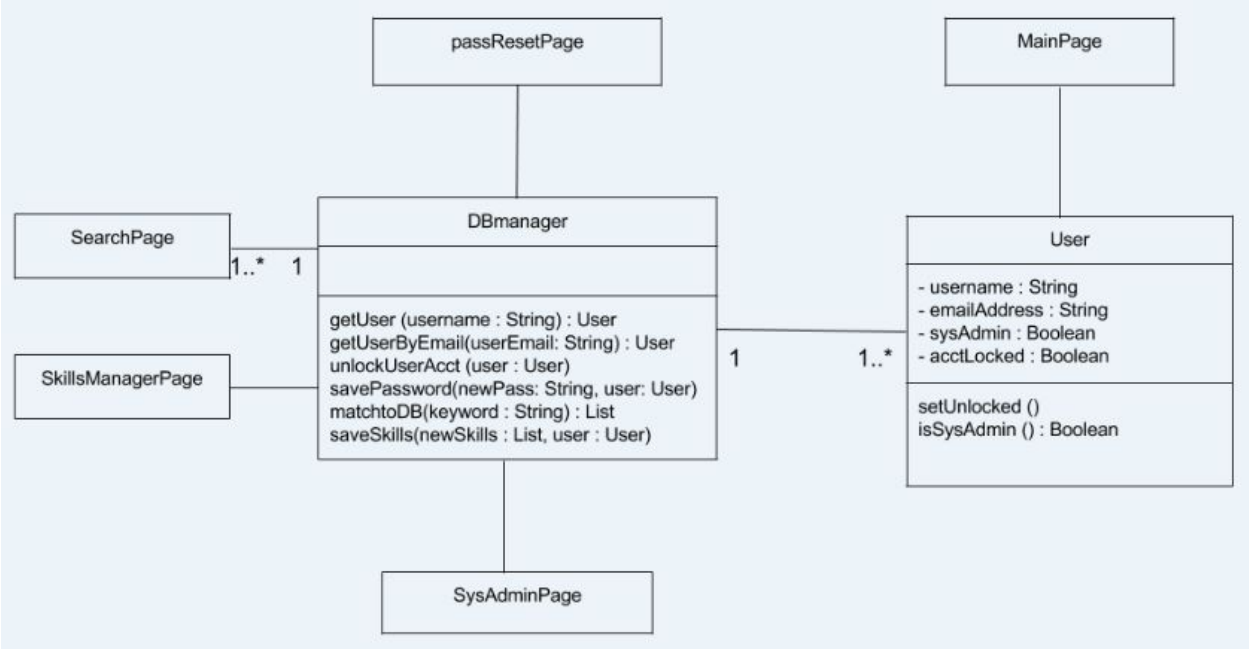
## SAVE NEW SKILL/RESOURCE

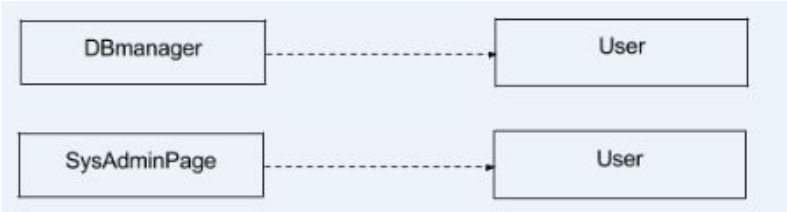
**Requirement ID#: USR-002**
**Use Case ID#: USR-002**
**By: Christina Matteis**
**Description: An existing user can save a personal skills or resource that is to be made available to other users for sharing.**



**Class Diagrams:**




passResetPage
MainPage
SearchPage
DBmanager
User
1..*
1
- username : String
- emailAddress : String
- sysAdmin : Boolean
- acctLocked : Boolean
getUser (username : String) : User
getUserByEmail(userEmail: String) : User
unlockUserAcct (user : User)
savePassword(newPass: String, user: User)
matchtoDB(keyword : String) : List
saveSkills(newSkills : List, user : User)
1
1..*
SkillsManagerPage
setUnlocked ()
isSysAdmin () : Boolean
SysAdminPage


DBmanager
User
SysAdminPage
User