

## **CSE OFFICE AUTOMATION**

### **PROCESS MODEL FOLLOWED – INCREMENTAL DEVELOPMENT.**

We followed the incremental development model to develop our software. We started in a plan driven way by allocating a lot of time for the requirement engineering process in the beginning itself. But few practices of agile development were also used in order to incorporate some specifications other than the initially considered ones in order to make the system more usable, secure and reliable.

### **INITIALLY GATHERED REQUIREMENTS :**

#### **FUND MANAGEMENT SYSTEM :**

- Admins should be able to access and edit all the user records, the transaction log, create and delete a user, and approve a transaction.
- User should be able to view and edit his/her details and also view his/her transaction history.
- The system should be secure.

#### **FILE UPLOADING :**

A person should be able to upload his files to a particular space allocated in the IIT Cloud and also view his files.

The client wanted this file uploading also to be included in the Fund Management System itself with an extra privilege to the admin to view the files of all the users registered under him.

These were the requirements finalized by the client after two meetings. The specifications meeting the above mentioned requirements were written during this time and were approved by the client.

### **SYSTEM SPECIFICATIONS :**

1. A login page for both admin and user (for security).
2. An email notification will be sent for each login in case of Admin (extra security).
3. A web page for creating a user.
4. A web page for editing a user.
5. A web page for deleting a user.
6. A web page to access all the user records or transactions log based on the admin's choice.
7. A web page for the admin to make a transaction requested by a user.
8. A admin page that can navigate through all the above mentioned web pages.
9. A search box in the admin page to search for a user.
10. An user page showing his personal details.
11. The page should allow user to view his transaction log and edit his personal details.
12. Two options for uploading and viewing his files in the user's homepage.
13. Similar options will be provided for the admin but the admin can view files of all the users under him.

## ITERATION 1 :

- Considered specification : 1,3,4,5,10.
- Feedback :
  1. Initially the delete user page directly deletes the user on entering his user-id.  
Suggested Change : On the delete request the details of the user are to be displayed first and then the admin would be provided with delete option.
  2. The length of the contact is to be checked before accepting (length has to be ten).
  3. Make the user page responsive.
- Extra Specification :  
14\*. An Email notification has to be sent to the user when the admin approves a transaction involving the particular user.

## ITERATION 2 :

- A prototype was used to explore options and develop a UI design for the admin page.  
**Initially the prototype looked like :**



Final accepted one :



- Considered Specification : 6,7, 11, 14\*.
- All the Bugs in the feedback of iteration 1 were resolved. The user page was made responsive.
- Feedback :
  1. No complaints regarding the web pages. Some extra requirements were mentioned.
- Extra Specifications :
 

15\*. The web page should display a welcome message with the name of the user. The name of the user or admin has to be displayed till the session ends.

16\*. The admin should be able to see the transactions activity of various users in the last two days.

#### **ITERATION 3 :**

- Considered Specifications : 8, 9, 12, 15\*, 16\*.
- Extra Specifications :
 

17\*. An option should be provided such that an admin can be redirected to a particular user's "Edit Page" from the access records page.

#### **ITERATION 4 :**

- Considered Specifications : 17\*, 2, 13.
- Iteration 4 is yet to complete. It's done up to the implementation of 17\*.