Project Title: YouSCream

Assigned Team Number: 10
Team members:
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Project status change

1) Is there anything changed from your original proposal and / or progress report?
No

2) If answer “Yes”, clearly state what has been changed.

Team member_____, Project title_____, Approach_____,

Platform_____, work plan_____, others_____

3) Have you finished all the tasks that you targeted in your original proposal and/or progress report?

Yes

4) If answer “No”, clearly state what has been changed.

Design idea_____, Implementation_____,

User evaluation_____, others_____

Project Report

1. Project objectives

- To create an easy-to-use USC-friendly app that provides real-time information services regarding apartments, jobs and events on and around the campus.
- To learn by implementing the fundamental aspects of User Interface development with focus on interactivity between human and computer in a mobile environment.

2. Problem statement

There are various apps that provide students with sole functionalities which forces students to utilize numerous apps to meet their needs. We want to eliminate the need to look-up several information sources by combining them into a mobile application that students can access on-the-go.

3. System design and development

System Design:

Task Analysis : Textual Task Analysis is charted out below:

0. Use the YouSCream App.
1. Open the App Start page
2. Select the feature
    - 2.1 Click on Apartment Hunting button
        - 2.1.1 Click on the search filter button
            - 2.1.1.a Choose current location by selecting CurrentLocation radio button
                - 2.1.1.a.1 Move sliders for Min and Max rent
                - 2.1.1.a.2 Select size of apartment
            - 2.1.2.b Search by location by selecting SearchLocation radio button
                - 2.1.2.b.1 Enter search location query
                - 2.1.2.b.2 Move sliders for Min and Max rent
                - 2.1.2.b.3 Select size of apartment
            - 2.1.2.c Click on Hunt
        - 2.1.2 Navigate around the current location
        - 2.1.3 Click on desired drop pin/marker
            - 2.1.3.a Read information on Apartment from the pop up box.
            - 2.3.1.b Click on Visit webpage to view more about apartment
        - 2.1.4 Click on question mark to open dialog help box
        - 2.1.5 Click on Home Icon. (Once user is satisfied)
    - 2.2 Click on Events
        - 2.2.1 Navigate through the news feed
        - 2.2.2 Click on desired event
            - 2.2.2.a Read information on Event when the list view expands
                - 2.2.2.a.1 Click on Add to Calendar button to add to Calendar

2.2.2.a.2 Click on RSVP to visit event website
2.2.3 Click on question mark to open dialog help box
2.2.4 Click on Home Icon.
2.3 Click on Jobs
2.3.1 Expand the left/right side panel
2.3.1.a Enter Job Title to search for
2.3.1.b Enter Job Location to search for
2.3.1.c Click on Hunt! to search
2.3.2 Navigate list of job
2.3.3 Click on Apply Here link to visit webpage.
2.3.4 Click on question mark to open dialog help box
2.3.5 Click on Home icon
2.4 Click on question mark to open dialog help box
2.5 Close the application

Plans 0:
Do 1-2 in order. Step 2 is optional

Plan 2:
Follow 2.1, 2.2 , 2.3, 2.4, 2.5 in any order. Step 2.3 is optional
Plan 2.1:
Select 2.1.1, 2.1.2, 2.1.3, 2.1.4, 2.1.5 in any order. Step 2.1.4 is optional
Plan 2.1.1:
Do 2.1.1.a or 2.1.1.b and then 2.1.1.c
Plan 2.1.3:
Do 2.1.3.a or 2.1.3.b
Plan 2.2:
Select 2.2.1, 2.2.2, 2.2.3, 2.2.4 in any order. Step 2.2.4 is optional
Plan 2.2.2:
Do 2.2.2.a or 2.2.2.b
Plan 2.3:
Select 2.3.1, 2.3.2, 2.3.3, 2.3.4, 2.3.5 in any order. Step 2.3.4 is optional
Plan 2.3.1:
Do 2.3.1.a, 2.3.1.b, 2.3.1.c

Usability Evaluation

We were asked to show our project to team number 11 and they had several comments regarding our application.

1) YouSCream Home
   a. Layout:
      The icons suggested their intended feature or purpose. Due to basic intuition, the group clicked on the icons to get to the feature pages. They found the color change of the icons informative feedback. It helped confirm the intuition that clicking the icon would lead to a new page.
   b. Content:

The front page had just enough content to suggest the basic idea of the app. The three feature icons displayed their intended meaning and prompted users to explore them by clicking on the icons.

c. Overall Look:

Simple and intuitive enough for standard app users.

2) Apartment hunt page.

a. Layout:

The user suggested that search filter button could be bigger and more obvious. In addition, the user suggested some feedback to determine which apartment they clicked on.

b. Content:

Overall filters that separated rent and size of apartment were clear and self-explanatory, for the min and max rent the user suggested a slider to specify the range.

c. Overall Outlook:

A clear layout and separation of functionality and display provided an engaging application for standard app users.

3) Job hunt page.

a. Layout:

Clean and clear layout that separated the job and search filter. The group found the separation of the list and the search very intuitive.

b. Content:

Overall filters that separated title and location of the job were clear and self-explanatory.

c. Overall Outlook:

A clear layout and separation of functionality and display provided an engaging application for standard app users.

4) Events page.

a. Layout:

Clean and clear layout that show a news feed of events. The user found that scrolling through the events was easy and found that clicking on each list item was intuitive.

b. Content:

Overall the content was clearly separated by several distinguishing factors such as the color of each item in the list and the date picture that was associated with each list item.

c. Overall Outlook:

A clear layout and separation of functionality and display provided an engaging application for standard app users.

Methods for Prototyping:

We have used visual design to represent the navigation of the application features.
The prototypes were designed on Illustrator and Photoshop.

Results

We designed the prototype for the application. The rough prototype for the home page of the application has been designed (Figure 1). The home displays the main features of the application available using a menu with icons. The user can navigate to different pages from the home page by, giving his input through clicking the icons present.

Figure 1: Home Page

Figure 2: After Apartment icon is clicked

The apartment hunt feature can be accessed by the user from the home page (Figure 2).

The user can view a map on this page. He can view his current location. Dialog boxes with the apartment addresses were designed to give users notifications.

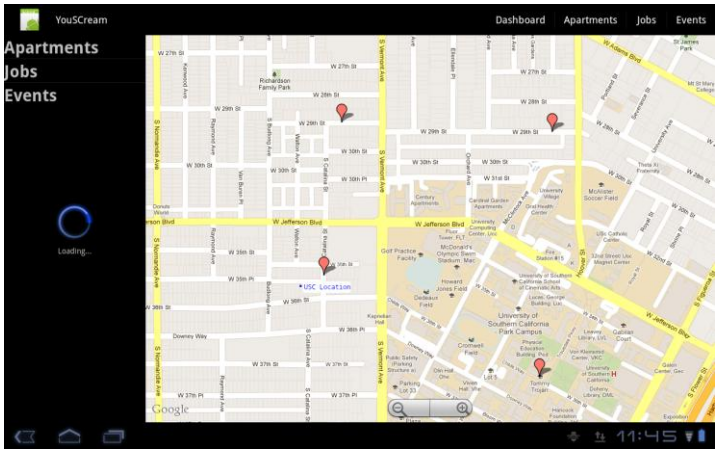


Figure 3: Map with location placeholders for Apartments

4. System functionality

YouScream provides a simple yet powerful search engine that enables students to obtain information about housing, events and jobs. The information is obtained from sites and is put together under one application.
Functionalities:

The apartment hunt feature enables students to retrieve real time information on available housing options.

- The user can use his current or input a location. If the user inputs a wrong address, a list of possible correct addresses are provided in a dialogue box allowing the user to select the right address.
- Based on location, housing options are displayed in form of icons on the map. The side panel that contains the options to filter results can be expanded. Apartment size, location and rent information can be input from the user to filter the results according to his choice.
- Clicking on the icons leads to a web preview of the Trojan Listings web site being displayed.
- The user can view the details of the selected apartment in the web view. The user can also view the apartment details in the browser as well.
- The data for the apartment feature is obtained from the Trojan listings, USCHousing website.

A News Feed is provided for all events in and around the campus.

- The list can be scrolled through and expanded to view details of an event.
- Options are provided to the user to add an event to a personal calendar, or RSVP to the event by visiting the site through the browser.
- If an event is added more than once, an error message is shown.
- The event data is obtained from the vision and voices website.

A Job Search feature is provided. It enables students to retrieve up-to-date information on jobs posted on websites.

- The jobs are listed and a link is provided for each job that takes the user to a site where he can view job details and apply.
- A side panel can be expanded to show the criteria based on which the user can search for jobs.
- Location information as well as job type can be input by the user to filter the results.
- Information about jobs is obtained from sources like pobyfy.com and indeed.com.

Limitations:

There some limitations with respect to the data sources. We wanted to incorporate the job listings from the ConnectSC website. However, regular students are not provided access to the ConnectSC resources. At this point, our app has been designed and developed exclusively for tablets. We plan on customizing the layouts to suit cellphone devices as well.

System Requirements:

- Developed with Java and Android SDK 3.1 with Google APIs
- Compatible with Acer Iconia A500 Tablet

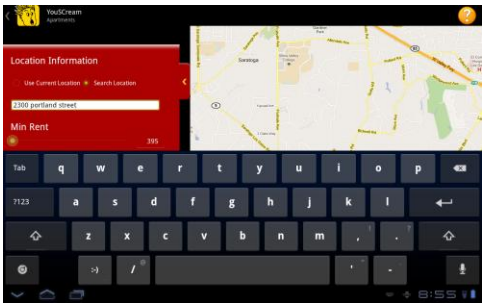
5. Results and user evaluation

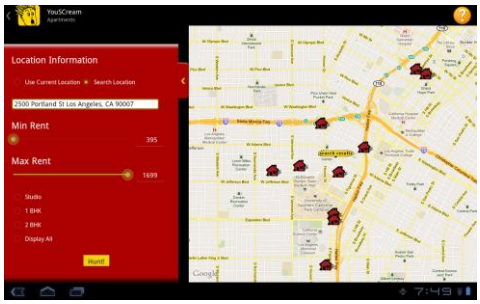
The application was given to non-team members to test out the functionality.
The following is a summary of the user evaluation by team 11 members of the CSCI-588 class:

User evaluation on 11/20/11:

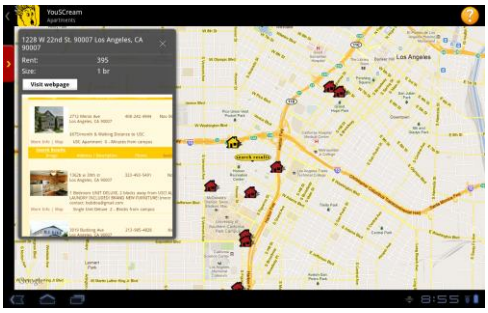
1. **Start Page**: Users mentioned that the start page had recognizable icons that helped them to intuitively understand their functionality.

2. **Apartments Page and Sliding Panel**: The users were gave a positive feedback about the sliding panel. Since, some were not familiar with the tablet keyboard, they need our guidance to get back the search results and to hide the virtual keypad. Hence, we decided to give a help option that would give directions to use and created the help icon in the upper right corner.



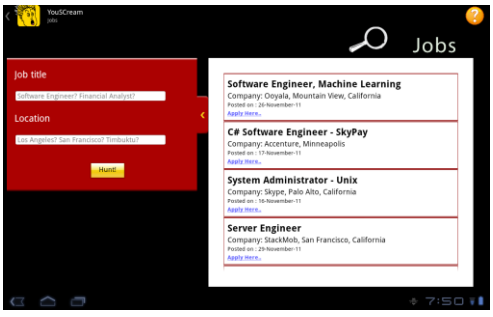


3. **Apartments Page and Preview box**: The preview box for the apartment icon was useful in showing the webpage, but the users asked for the tab to be bigger in order to view the page completely. Since, we wanted only a preview of the page, we decided to give an option for viewing the full site by giving the link to the leasing company site. This would open the site on a normal browser view to let users navigate through the site.



4. **Job Page and Filter Panel**: The users found the filter panel a convenient way of searching through the jobs available on the listing. One user pointed over the magnifying button mistaking it for the search filter option instead of using the sliding panel tab. We had to prompt the user to pick the red tab on the left to use the filter option.

Once, we had the help option on the right corner, the new set of users did not make that mistake after understanding that the red tab on the left brings out the search filter.



5. **Events Page and News Feed**: The extend and hide news feed tabs in the Events page was widely received by the users. Some users kept extending and hiding the tabs without reading the content, just to experience the design action. One user asked for a functionality that would add the event to his facebook account.

After the above evaluation, the team added reviewed some suggestions made by the users and accordingly made changes to the design. We are thankful to team 11 for their time and feedback of the application.

User evaluation on 11/25/11: 5-Second Test

We conducted the 5-second test (http://www.fivesecondtest.com) on some of our friends regarding the App. The concept of the test is to display an image from the app to someone for 5 seconds and then ask questions to the person related to the intuition of the app and the ability of the person to understand the App within a short period. The questions asked and the answers provided were the following :

1. Does the Home screen look professional enough? [or] Does the App look trustworthy?

Yes, it looks trustworthy enough. The start page has a definite finish and icons have an exact meaning which looks real.

2. Is there excess detail on the other page ?

No, the App didn't have excess detail

3. What did you like about the design?

The design had an easy structure to it and was able to understand the design of the start page easily.

4. What do you expect to see after clicking one of the icons?

I expect the icon to change color or size and then go to the next activity

5. Do you like the icons? Does the color combination look right?

I was not able to make out the some of the icons due to its size. Color combinations looks fine.

6. Did you find the fonts easy to read?

Yes the fonts were of the right size to read.

7. Were you able to understand what the App did?

I did understand what the App did but I felt that there should be more dialogues between App and the user.

6. Conclusion

1. For any student, the 3 most key aspects of student life are finding a place to live in, landing a good job at the end of his/her course and of course, ensuring a healthy balance between their academic and social lives. We, as USC students, realised the lack of a centralised platform that provides instant access to these resources and more.
2. We developed an extensively student-friendly app that allowed them to gain access to information to these resources enhancing the mobile device as an all-in-one communication tool.
3. We were able to implement many of the fundamental principles of user interface design that were the driving forces of our project.
4. While developing an effective back-end for the app, we strove to ensure that the user interface is user-centric, comprehensive and efficient.
5. Our custom-built and easy-to-use design enhances user experience as it focuses extensively on the underlying concepts of user interface design such as recognition over recall, user control and freedom, flexibility and efficiency of use, to name a few.
6. We intend to enhance our app by adding functionalities such as:
    - **Directions**: Provide directions or routing assistance on Google Maps to the locations of the desired apartments or social events happening around the campus.
    - **Speech-translator**: We plan on using a voice translator in the app to help international students coming from all across the globe to translate from their native languages to English or vice versa.
7. With the existing features and future enhancements on our app, we feel that we would be contributing extensively to the USC community.
8. The USC students would have access to information on the three elementary aspects of their student lives - all at less than arm's length and on a single click!
9. Here is a link to a video demonstration of our app: http://www.youtube.com/watch?v=JwedbaxKTZ0

7. Comments/issues/complaints/suggestions (optional)

Since our team's app was related to USC, we wanted to enhance the student experience by showing information from MyUSC etc., but could not due to time constraints.

In future, the course or TA could suggest students to contact USC Business Technologies if they have an innovative USC-specific idea that would need data or support from the Business technology department.