

Project Plan
For the Girl Scouts of America Badge Tracking
Application

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Of Team Cookie Council

Version 1.3

11/6/15

Change Log

Revisions	Change Note(s)
1.0	Creation of document
1.1	Major overhaul of the document
1.2	Changes to HLA and Milestones
1.3	Changes to Milestones and CS425 Exit strategy

Reviewed and Approved by:

Signature

Date

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Estimation

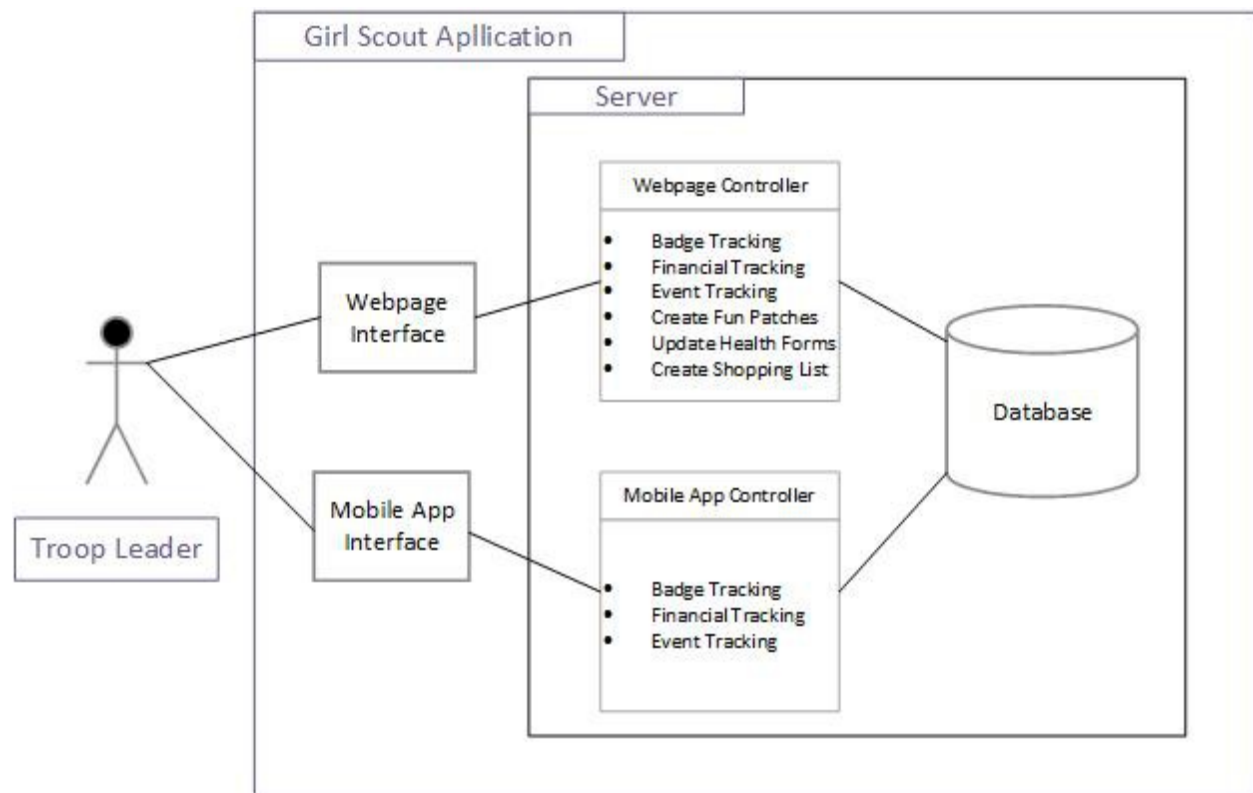


Figure 1 Girl Scout application HLA diagram, this diagram describes the major components and overall architecture of the application.

Milestone Name	Description	Milestone Completion Date	Hours to Completion
Database	Design, create, and test the database associated with badge tracking, financial tracking, event tracking, and the badge shopping list.	11/5/15	42
Basic webpage with database interactions	Create the basic web pages for badge tracking, badge overview, troop overview, financial tracking, event tracking, shopping list and homepage. These pages will have database interactions and will be tested to insure proper functionality and correctness of data.	11/19/15	37
Fully functional and user friendly webpage	Update pages previously created as well as create pages for log-in and adding new users. These pages will be tested for usability and updated as needed. Error	2/18/16	77

	handling and input validation will be added to each page as well.		
Mobile application	Research, design, and create a mobile application with all the functionality available in the web application. This application will be usability tested and changes will be made as needed. Error handling and input validation will be added to each function.	4/5/16	111
Delivery	Final implementation of product will be delivered to customer representative. Documentation will be provide for usability and maintenance purposes.	4/19/16	15
Total			282

Table 1 – Milestone chart

Resources

A server will be required for this application, in order host the potential website and the potential database. The application will require a server by 11/5/15, in order to allow database testing and web server integration. If the server is not provided by this time the application will be moved to a local offline environment.

An android based and iOS based mobile device will be needed for the potential mobile application. These mobile devices will be needed by 01/22/16, in order to development and testing of the mobile application. If these devices are not provided by this time the application will be limited to a mobile web interface.

A consultation with Socratis Tornaritis will be needed to implement the mobile application. This consultation will need to be held by 01/15/16, in order to obtain the knowledge to develop a mobile application effectively. If this consultation is not held by this date then the mobile application development process will be extended to allot time for self-education.

Participants for a usability study will be needed to test web page functionality and usability. These participants will be needed by 11/20/15 in order to refine the web page interfaces in a manner that our client and possible users find easy to use and understandable. If the participants are not available by this date then our client and any available volunteers will be used instead.

- Server needed by 11/5/15
- Consultation with mobile application developer needed by 01/15/16
- Android based and iOS based mobile device needed by 01/22/16
- Participants for usability study needed by 11/20/15

Scheduling

The schedule for the development of this application is based around the 2 week sprints implemented in the course semi-agile process, it is as follows:

- Project specification and product backlog are split amongst the team and completed by 9/22/15.
- Project plan, risk plan, quality plan, and sprint planning document are split amongst the team to be completed by 9/29/15.
- On 10/13/15 the first of the sprints begins.
- The first application milestone is the formation of the database and will be completed by 11/5/15 after two sprints.
- The second application milestone is a basic web page with database interaction and will be completed by 11/19/15 after one sprint.
- On 11/20/15 a class presentation will be held to show the progress being made on the application and plans for future implementation.
- Thanksgiving break will allow limited time for application development starting on 11/21/15 but will return to normal starting on 11/30/15.
- Customer representative report is due 12/3/15.
- Post-Mortem report is due 12/10/15.
- Project portfolio and project portfolio report are due at noon on 12/15/15.
- Winter break will limit time for application development starting on 12/18/15 but will return to normal starting with the beginning of spring semester on 01/11/16.
- The third application milestone is a fully functioning and user friendly web application, this will be completed by 2/18/16 after four sprints.
- Beta release demos of the application will be held on 3/1/16 and 3/3/16.
- A team poster draft will be designed and developed by 3/24/16.
- A final team poster design will be developed by 3/31/15.
- 4/5/16 marks the applications fourth and final milestone which is a mobile application; this is also when the application poster will be presented.
- A final project presentation will be held on 4/15/16. Here the team will show all of the applications functionality and the process in which it was developed.
- On 4/19/15 the project will be delivered to the client for acceptance testing.
- Customer representative report is due on 4/26/16.
- Post-Mortem report is due 4/28/16.
- A project portfolio is due at noon on 4/30/16.

Milestones

- Database - 11/5/15
- Basic web page with database interactions – 11/19/15
- Fully functional and user friendly web page – 2/18/16
- Mobile application – 4/5/16

Refer to table 1 for more information.

Communication

Team communication outside of the classroom is done primarily through the texting application called Google Hangouts. For assignments and project code the team will be using an online repository called BitBucket as well as Dropbox. Communication with the client is currently done through email and occasional meetings until a weekly or bi-weekly schedule can be made up.

Team meeting are generally held on Tuesdays and Thursdays after CS425 at 4:45PM, The customer representative is emailed every Thursday as 6:00PM after our team meetings. The teams working schedule will vary weekly based upon availability.

Quality Assurance and Risk Management

The risks of not having a server will greatly affect this application because the application will have to be developed using a peer to peer system or a strictly local environment. The risk of no mobile application development knowledge will potentially limit the application functionality and will increased time which is already allotted in the estimation table above. The risk of missing mobile testing platforms will make testing potentially unreliable. These risks are described in more detail in the risk plan.

Testing is already worked into the estimation of each of our milestones as described by table 1 above, as well as in the Quality Plan. Issue tracking will be done using the bit bucket issue tracking functionality.

CS425 Exit Strategy

The CS425 Exit Strategy for this application will be the completion of a core component. The core component to be completed will be the project database, basic webpage with database interactions implemented, and a simple iOS app to test the waters of mobile development. These are two critical pieces of the application that the entire rest of the project will be built upon. The database is what will store all of the scout leader's information regarding their specific troop, and the basic web page is what will be built upon to create the fully functional web application as well as the mobile application. The iOS app is just to gain mobile development knowledge not necessarily an application pertaining to the project.

CS499 Exit Strategy

Usability studies will be performed as laid out in our Expectations table and the Quality Plan. This is prior to the development of the fully functional web application, and after the initial development of the mobile application. These studies are estimated to take 40 hours.

The following tests are estimated to take 35 hours.

Queries will be done both directly to the database as well as through the webpage to assure correctness of data. A fake scout will be created and ranked up from Daisy to Ambassador checking all requirements for badges need to rank up. After each rank up a shopping list will be generated and checked for correctness.

A fake event will be created and then populated with fake scouts attending, the financial account will be checked to see if the dues associated with that event are being shown. The fake scout will be used to update their cookie sales and this data will be checked for correctness in the database.

Summary

Resources needed will be a server, mobile platform, and consultation with a mobile app developer. Communication tools used are Google Hangouts for group communication, and Bit Bucket and Drop Box are used for file submission. Specific technologies being used are Android, iOS, Mozilla

Firefox, Google Chrome, Internet Explorer, Xampp, and a database. The teams working schedule will vary weekly based upon availability.