The River CRC iOS Application

CSE 482 Senior Interdisciplinary Project

Sprint Quarter 2014

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Dr. Turner

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**Introduction:**

The River Christian Reformed Church is a church of over 400 members that was established in 1911. It is supported by a denomination called the Christian Reformed Church of North America and is located in Redlands, CA. They currently have a website that is mobile capable being hosted by a company called CloverSites. Their website is a flash based website and they have no intentions to change it, as they enjoy it’s functionality and ease of use. The idea for the app originated from the church’s media director. She felt that even though the website is currently mobile capable, they would like to add to the user experience, particularly with the ability to listen to the sermon podcasts in the app, and to be able to read along with the sermon notes. The other main thing they want to add is the ability for its users to read and follow along with the church’s new blog, which includes video, audio, images, and text.

**Needs Assessment:**

The needs assessment for this iPhone application was developed with a meeting with the church’s media director onsite at the church. She had done some work ahead of our meeting and came with drawings and ideas on what they would like in the application. The church currently has a website and is mobile capable that they don’t want to change. The main concept for the iPhone application is to be an extension to the website, and not a duplicate of the website. Since their website is already mobile capable, they want to enhance the experience. The following is a list of the components required in the application:

Required Components:

* Sermons/Notes Podcast Player
* Tumblr Blog Integration
* Ministries List
* Church Information
* Social Media Links

After above is complete

* Events
* Live Stream Sermon
* Prayer Requests

The required components above are the items I plan on completing in the app before the end of the quarter. The other items will only be worked on if I complete the required components. Per the church media director, the other items are just ideas and aren’t essential to the experience they are trying to create with the application.

**Methodology:**

The methodology I plan to use to create the application began last summer when I did an Independent Study with Dr. Turner on Objective-C and iOS programming. The valuable skills I obtained during that time will allow me to complete this iPhone application for the church. Using the images given to me by the church’s media director, I will design and iPhone application around their ideas and needs. I will be doing research on a few different topics to enhance my skills and to learn what works and what doesn’t work in a church iphone application. This will be accomplished by downloading different church iPhone applications and examining what works and what doesn’t work in them. The church media director, and myself, will go through these different apps and enhance the ideas for the app. I will also be doing research into different areas of objective-c that I don’t understand fully at this point. This will include the following:

* XML Parsing
* Tumblr API
* Audio Streaming
* PDF Downloading
* Email, Phone, and Web links
* Twitter, Facebook, Vimeo links
* Image Caching

The application will also be developed in stages, giving the church media director access to it on her own device to experiment with to help refine the final product.

**Project Deliverables:**

List the deliverables that make up a solution for the client needs. Provide estimated completion dates for each deliverable. Include a 30-minute presentation as the final project deliverable.

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| **Week** | **Schedule of Activities** | **Schedule of Deliverables** |
| Week 1 - March 31 to April 6 | Go over code previously written and figure out where I last ended up |  |
| Week 2 - April 7 to April 13 | Research on different required components |  |
| Week 3 - April 14 to April 20 | Continue Coding |  |
| Week 4 - April 21 to April 27 | Continue Coding | Basic Functional Prototype Ready |
| Week 5 - April 28 to May 4 | Continue Coding |  |
| Week 6 - May 5 to May 11 | Continue Coding |  |
| Week 7 - May 12 to May 18 | Continue Coding |  |
| Week 8 - May 19 to May 25 | Continue Coding |  |
| Week 9 - May 26 to June 1 | Finish up required components | Functioning app and begin process to upload to App Store |
| Week 10 - June 2 to June 8 | Prepare Presentation | 30 Minute Presentation on my progress |