# Sprint Report #4

# February 2, 2017

# Team Overview

### **Project**

DoorPanes

#### Members

- Andrew Fagrey
- Jayson Kjenstad
- Samantha Kranstz

# Sponsor

- Dr. Jeff McGough
- Dr. Christer Karlsson
- Brian Butterfield

### Client Meeting Time

Thursday at 10:00 a.m.

# **Sprint Overview**

During this sprint we worked on getting dataflow moving between all the different parts of our project. We created a middleman project that contains the model and data access code for the web application and web API to share. The middle man project was important, because without it we would have the same endpoint code in the web application and the web API. We decided to create this middle man project to maximize code reuse.

Also a great amount of progress was completed for the tablet application in this sprint. The tablet application now can actually make Http get requests and pull down seeded data from the Azure database. The tablet application uses Retrofit for making the Http requests from the Azure web API.

# Setbacks

### **Tablet Application Development Change**

Here's a list of a few things that we struggled with this sprint:

- Database seeding and migrations problems (didn't understand how they work)
- Tablet application retrofit requests took a while to understand and get working
- GUID usage
- Database permissions and authorization

# **Deliverables**

- Making a get request to an Azure server from the tablet application and getting JSON returned
- Displaying JSON calendar events on the tablet application screen
- Understand tablet class layout
- Return actual JSON from web API endpoints
- Updated getByOwner endpoint
- Updated web API models
- Understand GUID principles
- Load events from database
- Connect web application database to Azure
- Created middle man project for Web application and web API to share
- Display calendar events on the calendar framework on the web application

# Activities

#### **Team**

- Worked to understand concepts.
- Research on how parts of our project work.

# Andrew Fagrey

- Worked with Samantha on understanding and developing the API.
- Worked to understand the JSON storage in the open source calendar framework used in the web application.
- Worked on displaying calendar events on web app calendar framework
- Worked on web app database issues.

#### Jayson Kjenstad

- Worked on the tablet application.
- Finalized the transition to native Android
- Used Retrofit Get requests to pull A JSON endpoint using the Web API
- Parsed JSON responses into usable data
- Created CalendarEvent model
- Minor GUI modifications
- Mapped out class hierarchy

#### Samantha Kranstz

- Researched Guid and permissions.
- Updated API endpoint get by owner.
- Updated API models.

# Work that is carried over into Sprint 5 is as follows:

- Finish calendar event endpoints.
- Email authorization.
- Changing keys to Guids.
- Create Realm objects.

# **Backlog**

#### Azure

- Set up Azure
- Create Azure database
- User Authentication
- App Communication

### Web Application

- Design Wireframes
- Code the user interface according to wireframes
- Create project and test project
- Create website login screen
- Communicate with Azure
- Create schedule templates
- Create send and receive message system
- Open calendar framework JSON events
- Connect calendar event creation to database
- Load events from database when navigating to dashboard controller
- Remove authorization code

### Web API

- Create Professor Model
- Create Office Personnel Model
- Create Calendar Event Model
- Create Student Model
- Model Location
- Create GetCalendarEvent endpoint
- Create GetCalendarEvents endpoint
- Create GetCalendarEventByOwner endpoint
- Create GetCalendarEventsByDate
- Create SaveCalendarEvents endpoint
- Repository Layer
- Serialize data
- Migration on database
- Create project and test project

# **Tablet Application**

- Design Wireframes
- Code the user interface according to wireframes
- Create room login screen
- Design and create splash screen
- Enable tablet to connect to Azure
- Create communication class
- Display a message on tablet screen
- Display schedule on tablet
- Put tablet in kiosk mode
- Move tablet code

### Student Mobile App

- Design Wireframes
- Code the user interface according to wireframes
- Create project and test project
- Create app login screen
- Communicate with Azure
- Create send and receive message system
- Allow push notifications on mobile app
- Allow user to view professor and classroom schedules
- Create request form for meeting with instructor
- Create request form for a classroom reservation

### Miscellaneous

- Logo
- Learn Azure
- Learn Xamarin
- Connect Visual Studio to Azure
- Look into networking for tablets
- Look into a pre-built calendar framework for displaying calendar events