

# Microsoft Capita Team 2 / Bi-Weekly Report 4

**Date:** 02/12/2016

**Team:** Lambros Zannettos, Nathan Liu, Junwen He

## Overview

During the past two weeks we contacted James to see if we could get access to the SIMS database schema. We also set up REST endpoints for Team 1 and created database connectors that will connect to an Azure SQL database in the Cloud. We came up with various ideas on how to process the datasets from SIMS also worked on the website.

## Meeting summary

*Mon, 21 November 2016*

This was our final skype meeting with Scott Bell. He informed us that he would no longer be mentoring our project, but continued to try and help us with setting up a SIMS DB on our VMs.

*Tue, 22 November 2016*

Dr Strange confirmed that our project had been reassigned and that we would now be working on the backend engine that would send data to Team 1's visualisation engine. We organised a meeting with James to see what we would need to do and what questions we would have to ask him.

*Thu, 24 November 2016*

During this meeting with James Randall, we were given some more details regarding our new project. We discussed ideas, possible approaches and requirements for the project. We also discussed how this new project would tie in with Team 1's project on visualisation.

*Fri, 25 November 2016*

This was a relatively short meeting with Dr Strange to bring him up to speed with what we had discussed the previous day with James Randall.

*Tue, 29 November 2016*

We met with our TA and showed him the work that we did during the week. Nathan showed in the REST endpoints that Team 1 would communicate with, Lambros showed the Azure Machine learning studio and Junwen had worked on the website. We agreed to continue our work during the next week.

## Tasks Completed

1. Created sample REST End points for sending information between client and server.
2. Met with (new) client to establish requirements and talk about the new project.
3. Started research towards the new requirements.

## Problems to be resolved

1. We are in communication with James Randall to get access to a database or a copy of a development version of the database. This will hopefully be sorted by the end of the week. Getting access to real data or a DB schema has been an issue since day one.

### **Plan for next two weeks**

- Update project website with the latest experiments.
- Get access to database.
- Do more research.
- Run experiments with set operations.

### **Individual reports**

#### *Lambros Zannettos:*

During the past two weeks, I have been looking into different ways of performing set operations on very large data sets. I have also experimented with Azure (setting up VMs, SQL servers) and also with Microsoft Machine Learning Studio. As research for the project, I have been working through the Lynda “Path to becoming a data scientist” set of 7 courses. While looking into Hadoop, I also watched the “Hadoop Fundamentals” course, after which I established that Hadoop is not suitable for the solution we are looking for. I have also helped out with the project website.

#### *Nathan Liu:*

During the week I worked on learning how to create a REST service on the server. I created several methods for GET, POST and PUT. This is how we will transmit data and receive requests from Team 1. I also created a database connector that connects to a SQL database, we are now waiting for either a sample schema to connect this to or log in credentials from SIMS with read/write privileges.

#### *Junwen He:*

This week, I mainly worked on the website. Since we were assigned to a new project, so the website need to be rearranged. I edited the website to record the process of the new project, and gathered information about it and put it on our website.