Aber Fitness Project

Final Report for SEM5640 Developing Advanced Internet Based Applications

Authors: Adam Lancaster [arl4], Andrew Edwards [ane18], Charlie Lathbury [ckl2], Daniel Monaghan [dkm2], David Fairbrother [daf5], Jack Thomson [jat36], James Britton [jhb15], Robert Mouncer [rdm10]

December 6, 2018

Version: 0.1 (Draft)

Department of Computer Science
Aberystwyth University
Aberystwyth
Ceredigion
SY23 3DB
Wales, UK

Declaration of Originality: waiting on neil for this

CONTENTS

LIST OF FIGURES

Chapter 1

Overview

Aber Fitness is a web application developed using Microsoft's *.NET Core* and Oracle's *Java Enterprise Edition* (henceforth referred to as Java EE). The project aims to provide a service to encourage fitness and promote engagement with sporting activities amongst the users of the application, offering functionality such as graphing fitness data gathered by owners of *Fitbit* devices, the ability to challenge other users to competitions and a sport ladder system with tight integration into a bespoke facility booking system. *Aber Fitness* aims to offer everything that would be needed by a sporty and active person in order to bring their sporting activities into a digital platform and also to enhance their use of devices they already own, such as *Fitbit* devices or smart watches such as the *Apple Watch*.

At launch the system will ingest activity data automatically from *Fitbit*, with the capability of easily implementing other health data provider services at a later date due to the modular nature of the data ingest system. Once normalised this activity data will be used throughout the various subsystems of *Aber Fitness*, providing users with functionality such as a dashboard overview of their activity over the last hour, day, week, etc. as well as integrating tightly into the challenges system to add a competitive aspect to the system in to keep users engaged with both the platform itself and keeping fit in general.

TODO: Add more here

Appendices