# CIS105 Fall Project 2015

ASU Main Campus – ASU West – ASU Polytechnic

Sep 28 – Oct 05 2105

Faculty Host: Matt McCarthy – Senior Lecturer, Arizona State University
http://apps.wpcarey.asu.edu/directory/people/profile.cfm?person=2144095



## The Course

CIS105 is a survey information systems course that is required for all freshman/sophomores who intend to pursue a bachelor's degree in Business at ASU. This course is arguably the largest Information Systems course in the United States, with over 2,700 student enrolled in ten sections on three campuses in Fall 2015.  The course covers a range of IS topics, and students complete Excel and Access projects and an additional integrative project such as mobile app development.

## Project Overview

The ASU CIS105 students were tasked with creating an HTML5 app/game to be deployed to their own custom website and followed-up with marketing.  Students were instructed to acquire a DreamSpark.com account, which then qualified them for a free Microsoft Azure subscription, which allowed them to create a custom website to deploy to.  Students used TouchDevelop.com to create their app/game, and then deployed to their site when completed.  Students then marketed their app via Facebook, Twitter, and through in-person social events.

The project emphasis was to demonstrate a complete cycle of app/site development including marketing, devops, and analytics.  The project represented a significant portion of students' grade

## Challenges

The previous year's project at ASU required only the creation of an app/game via TouchDevelop.com.  This year introduced deployment to a custom web site, which meant students would need a site to deploy to.  Students own a variety of devices so all recommended technologies and processes had to

work on all. **Browser-based tools that were independent of manufacturer, operating system, and browser-type were essential**.

With the number of students needing to acquire DreamSpark and Azure accounts, concerns were raised regarding possible denial of service due to sudden burst of requests originating from the same location.

# The Approach

Microsoft offered a solution in three phases: logistics, development & deploy, marketing & analysis.

## Logistics

Advanced preparations were made with the assistance of the local Microsoft technical evangelists, who were able to get the classroom wireless networks white-listed with DreamSpark, Microsoft Live, and Azure so that automated security filters would not activate when hundreds of students accessed the Microsoft websites all at the same time from the same location.

Next, all the students needed to create Microsoft and Azure accounts. Fortunately, most students already had Microsoft accounts due to taking advantage of the university's Office 365 benefit, so all they needed were DreamSpark (to verify their student status) and Microsoft Azure accounts. A short video that walked the students through setting up the accounts was posted on the course LMS and social media site managed by a lead-TA, who also answered questions on the discussion board.

## Develop & Deploy

Once students had their accounts set-up, it was now time to demonstrate how to develop an app/game. Students watched as Michael Palermo and Randy Guthrie (Microsoft Technical Evangelists) demonstrated how to develop a simple game via TouchDevelop.com. Since the emphasis of the project was on the entire journey of app development including deployment, marketing, and analysis – the expectation for app/game was to be simple.

Once the students completed development, they now needed to deploy to their free web site created in Azure. They learned how to access the publisher settings file in Azure and use it to deploy the app/game made in TouchDevelop.com. Once this was completed, the students now had a custom URL they made in order to move on to the next phase.

## Marketing & Analysis

Once students had completed their deployment, they now were instructed on the benefits of marketing their work for others to see. Live, in-class lectures were provided by local Microsoft technical evangelists (Michael Palermo and Randy Guthrie) on the benefits of identifying multiple marketing strategies and measuring results with analytics. Students were provided demonstrations of Application Insights and other 3rd party analytic tools. Below are samples of marketing endeavors in Twitter and Facebook:

· Sep 30

I'm basically an app designer now, you can all refer to me as tech god from now on

asuangela.azurewebsites.net  #ASUCIS



September 29 at 11:28pm · Edited

Pac-Man is life! #asucis https://jamesflappypac.azurewebsites.net/



# Additional Insights

At the time of this report 33 students changed their major as a result of this experience.

The on-campus Microsoft Student Partner participated in the project and helped answer project questions via his Facebook group: https://www.facebook.com/groups/ASUmicrosoft, which also is helping provide post-project support and community for those students who want to continue their technology learning after the course is over.

Many students asked in class if/how they could continue using their Azure account to do more development beyond the class. We were happy to tell them that their Azure accounts do not expire, even after they graduate!