

Project One Overview

CIS 315 SPR 2016

Version one due April 28th '16

Overview

For project one, please **have your team generate these two major products:**

1. **a toolkit** for using javascript to read, write, delete and update data in the amazon cloud, and upload files to a secure web server
2. **a responsive beta site** to accommodate your business use case in one visible, hosted site on the Internet

To prove your team's solution, please write a documentation booklet detailing the business case, with images of the site's pages. Then detail the code used to complete the toolkit. Provide snippets of javascript, with some discussion in the margin, describing the solution for the team's benefit. Your work should communicate to the outside world the objective of the project, then communicate within the team the techniques for using your toolkit. Team members should be able to take your toolkit and use its techniques in a variety of coding problems.

1. The Javascript toolkit

Using the AWS SDK for Javascript, construct a basic set of HTML/Javascript examples which serve to illustrate how to connect to the amazon cloud, then interact with DynamoDB. Your examples should read, write, update and delete data from an example DynamoDB table. You can contain your example within one script.

Your toolkit should use an OAuth security service, ideally provided by a major social network (FB/G+), where the user provides his/her credentials. These OAuth credentials should be used by your cloud provider (AWS) to allow them to traverse a set of cloud resources, like DynamoDB and Amazon S3.

You must show the ability to upload files to your website. Uploaded files should be visible in your cloud's web server (S3 component of AWS).

2. A Responsive Beta Site

A set of HTML5 pages illustrating the business case, with minimal content should be presented. The pages should be responsive (ie, load across a variety of phones and PCs). Your team is recommended to provide basic user services, such as a login page, a profile editor, and account page, a landing/home page, plus other pages they will need to use your core offering. There should be ample pages with distinct purposes, for each page. Pages need not be highly developed, but rather illustrate your goals for a working site. They should be largely empty, not possessing any immediate data-getting features (we will assume they will have data, later in the course).

Grading rubric

An A project will contain these elements:

1. an articulate, clear business case, describing the basis for the business. You may use research you are doing in a concurrent class (such as CIS 315). The reader must grasp the social problem you are solving, and how the organization of the site supports this objective.
2. a working website, with basic HTML pages
3. the site is hosted with a public web address / URL

4. the site is responsive (loads via mobile browser, laptop and LCD screen resolution)
5. the javascript toolkit must hit Facebook, authenticate the user before initiating CRUD operations on a cloud-hosted database (dynamodb)
6. the toolkit demonstrates read, write, update, delete operations on the table above, and shows data moved / updated / deleted to the database afterward

A B project omits one objective from the A project.

A C project omits two objectives from the A project.

A D project omits three objectives from the A project

An E/F project omits four or more objectives from the A project.