Milestone 1

A progress report containing:

o A brief description of your application.

We will develop a web application for students at duke to post their ratings about food, classes, campus events, anything related to campus life. Users can post their rating with a picture or a web link and a short comment. Each rating will be on the scale of 1 to 5. Users can subscribe to various categories to receive real time feed of new ratings. The application will also recommend popular new topics each week and the highest rated items of all categories a user has subscribed to.

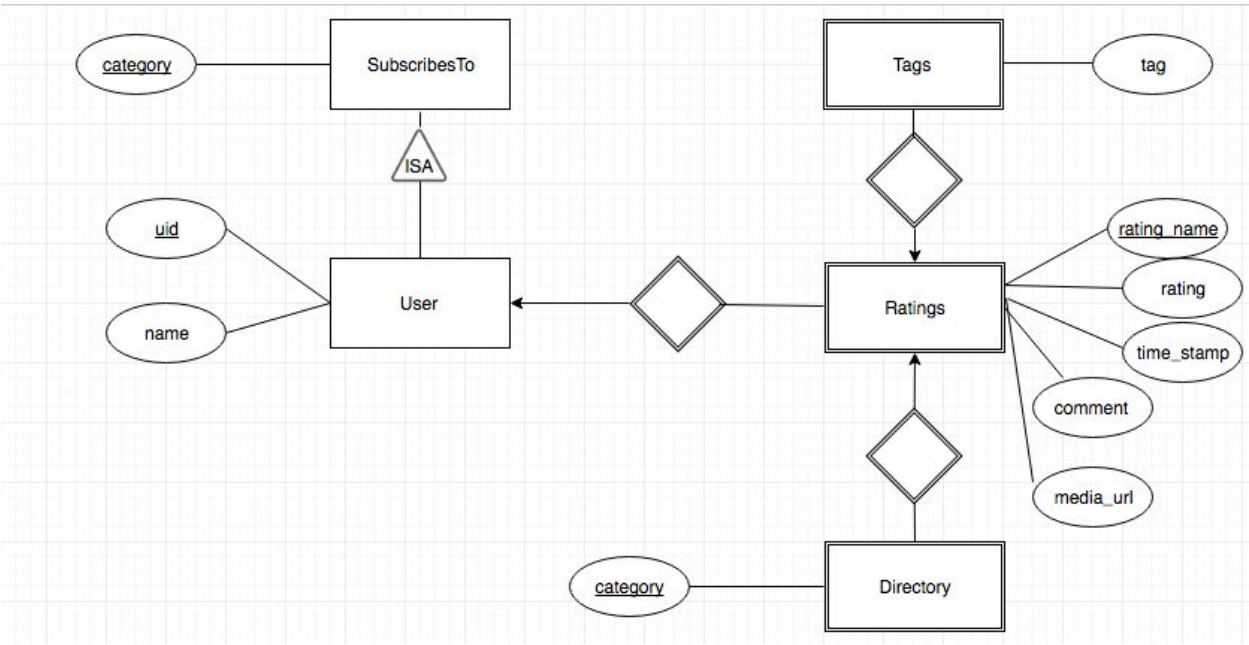
o A plan for getting the data to populate your database, as well as some sample data.

We will first use sample data generated by our sample dataset script. We will release a beta per new feature and invite our friends to try it out.

o A list of assumptions that you are making about the data being modeled.

In usual cases users will be posting ratings almost uniformly throughout time, and ratings will be distributed across a large number of topics, with each topic carrying about 1~5 tags. However, in some special cases we could have an overloading number of posts about a few topics, for example if we get another National Championship or beat UNC by 20 points.

o An E/R diagram for your database design.



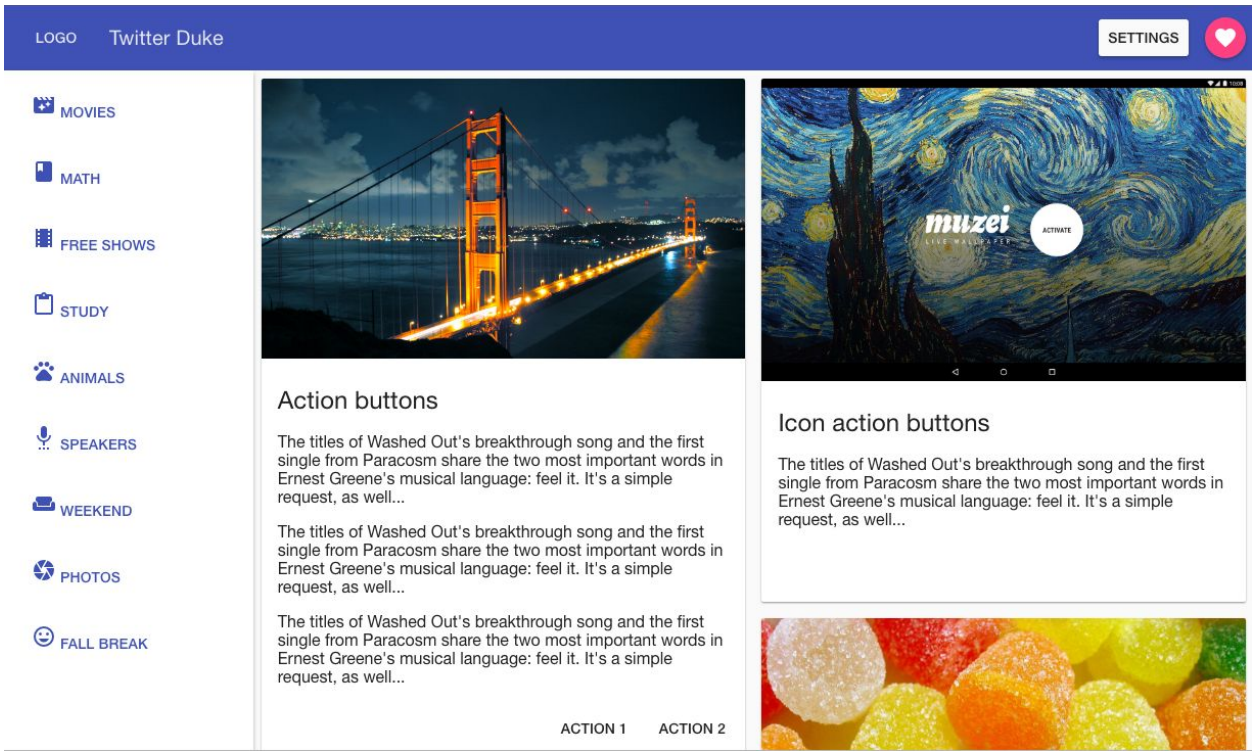
o A list of database tables with keys declared.

User (uid, name)
SubscribesTo (uid, name, category)

Ratings (uid, rated_name, rating, comment, time_stamp, media_url)
Directory (rated_name, category)
Tags (uid, rated_name, tag)

o A description of the Web interface. You can write a brief English description of how users interact with the interface (e.g., “the user selects a car model from a pull-down menu, clicks on the ‘go’ button, and a new page will display all cars of this model that are available for sale”). Or, instead, you can submit a canned demo version of the website.

Below is a demo of the home page after a user is logged in. On the left navigation bar are the categories subscribed by the current user. The main panel is a trending feed of posts from any categories the user is subscribed to. User can scroll down to view more posts or click on any category to filter posts of the particular category. To post a new rating, a user will first click on the button on the top right corner, then a dialog will show up in the middle of the screen, and the user can upload media, enter rating, and add hashtags to the post as well. After submitting the rating, the new post will appear in the main panel.



a. How do you plan to acquire the data to populate your database? Use of real datasets is highly recommended. You may use program-generated “fake” datasets if real ones are too difficult to obtain.

We plan to acquire data to populate the database eventually by getting data directly from Duke students. Students can go on the website to rate things, submit new items in a category to be rated, subscribe to categories, among other things, and these actions will populate and modify the database. For now however, we will be using generated fake datasets to populate a sample database.

b. How are you going to use the data? What kind of queries do you want to ask? How is the data updated? Your application should support both queries and updates.

We will use the data to draw conclusions such as what the top 5 items are in a particular category at the moment, what the most popular items are, and what items are trending. Some example queries we would ask are getting the top 5 ratings from each user, finding the number of times each location has been tagged, getting the number of total ratings given by each user, and getting the most subscribed to places. Data is updated by user actions on the website, such as liking a certain item, which is reflected in an update to the database.