

## Write Up for Food Suggestion Tool

[John.Bower@student.gmail.com](mailto:John.Bower@student.gmail.com)

Here's my main User Story for the feature and also my run down on what I think it is and how it might be implemented. I believe the user scenario and non-functional requirements listed represent a practical set criteria for testing.

<b>User Story Name:</b> Food Suggestion Tool
<b>Actor:</b> Guest or registered user.
<b>Precondition:</b> User observers home page.
<b>Summary:</b> A tool that provides a series of food suggestions to the user. Suggestions are both random and based on user input. Users can continue to use the tool until they find a suggestion they like.
<b>Scenario:</b> <ol style="list-style-type: none"><li>1. User selects the food suggestion tool.</li><li>2. User is shown a selection of four food pictures with descriptions, some random (based perhaps recent posts, or recently liked suggestions perhaps), and some based on broad categories(breakfast, lunch, dinner, healthy snack, ect.).</li><li>3. User can select a suggestion to view more suggestions like it, or foods in similar categories.</li><li>4. User observers the new food suggestions and has the option to continue selecting foods suggested.</li><li>5. The user selects to view previous suggestions.</li><li>6. The user likes a suggestion that they want to eat.</li><li>7. User selects to quit and return to home page or chooses to start over.</li></ol>
<b>Exceptions:</b> <ol style="list-style-type: none"><li>1. Suggestion results not found: error message is displayed to the user explaining that the tool doesn't have any more suggestions. User can go back to previous suggestions or start over.</li></ol>
<b>Non-Functional Requirements:</b> <ol style="list-style-type: none"><li>1. All four food suggestions must be displayed in less than three seconds.</li><li>2. User must be able to quit and return to home page at any time.</li><li>3. User has option to go back to previous suggestions.</li></ol>

4. User has option to start over at any time.
5. User can select any of the suggestions shown and receive a new set of suggestions.
6. Food suggestion photos and descriptions must be observable to users on their smartphone screen without needing to scroll more than one screen size.

#### Food Suggestion Tool Run down.

The user experience is the virtualization of asking someone for food suggestions. The tool not only names the food suggestions with the description label, but also describes it further by using a picture. The user who finds a suggestion interesting can now search for a recipe or nearby restaurant using methods they already prefer such as web search, GPS map app, or a food delivery app. The user might also have their ingredients on hand or already know a favorite place that has the food suggestion. So the goal of the tool itself is not to help the user go find the food they want. Instead, it's only to make food suggestions.

The food suggestion tool must return results fast, with pictures of the same size, and description label. Some of the suggestions can be random, but it's important to be able to use user input to help refine the suggestions. For example, a broad category might be "hamburgers". Further refining to "large exotic hamburgers" in a google search returns Bison Burgers in LA, with a photo of burger and a caption of "big portions!" Adding recipe to the search terms in the Google search gets a top result of a recipe for the "Exotic Cheese Burger" with a photo of a pita bread burger with feta cheese and cucumbers. The app could pull the photo and title from web search results to create the food suggestions. The suggestion if selected could have a link to open the url in a web browser. Suggestions liked by users could be used to generate the random 'wild card' suggestions. Along with the food suggestions, keyword suggestions could be selected or entered by the user, and used to generate a new set of results. Example tags could be 'spicy,' 'vegetarian,' 'classic,' and so on.

Using web search results should minimize the reliance on using our own data stores, reducing complexity and costs, and at likely equal or better system processing time. Our system would only need to store a small set of keywords, such as the names of board categories, such as "breakfast," and descriptors such as "soup," "spicy" or "classic." The set of keywords would represent a relatively small data set, one implementation might be to use maybe a few JSON documents of a few MB each.

The Food Suggestions Tool presents one of our primary features that make our app interesting and unique. Since its concept and implementation is not so straightforward, it also represents one of our more challenging aspects to our project. I believe the format of the tool as given here lends to a feature that can be well shaped and implemented without reliance on another part of our project being completed. In this current outline, the only functionality that connects with other parts of our system would be in using "Likes" from other users to help generate suggestions - a part of our features functionality that is optional in order to complete a user scenario.