IST 412: M02-A01 Product Module and API Design

September 12, 2017

**Group 5**

Dylan Straffon

Justin Rosenthal

Alex Roeum

Jacob Chorney

**PACKAGES/CLASSES**

**Foodmood**

FoodMood.java

**foodmood.models.analytics**

Correlation.java

Relation.java

Chart.java

**foodmood.models.food**

Food.java

Foodlist.java

FoodConsumed.java

**foodmood.models.mood**

Mood.java

**foodmood.models.notification**

Notification.java

NotificationList.java

**Foodmood.models.recommendation**

Recommendation.java

**foodmood.models.user**

User.java

**Foodmood.controllers**

ChartController.java

FoodMoodController.java

**Foodmood.models**

* **User**
  + LCOM4 = 1: The User methods only reference that particular user’s profile. The authenticate() method uses the username instance variable to check if the supplied password matches. getFoodConsumed() returns the food consumed instance variable. getNotificationList() returns the notification list instance variable. getUsername() returns the user’s username instance variable.
* **Notification**
  + LCOM4 = 2: Notification’s methods do not reference other classes. The methods getTitle() and getDescription() provide the name and description of notification view. While isRead() shows the status of the notification, markRead() and markUnread() modify the current status of the notification.
* **NotificationList**
  + LCOM4 = 1: addNotification() adds a notification to the list. The removeNotification() method removes notifications from the list. They never modify the Notification class directly.
* **Food**
  + LCOM4 = 1: Only has one method that return the food name.
* **FoodList**
  + LCOM4 = 1: All of the methods within this class reference a single ArrayList instance variable. addFood() adds food to the list. The removeFood() method removes food from the list.
* **Food Consumed**
  + LCOM4 = 3: The instance variables are food and a Mood object. The methods in this class to not modify any Food object instances.
* **Mood**
  + LCOM4 = 1: Has one method, getRating() which returns the integer rating that the user had placed on their food.
* **Recommendation**
  + LCOM4 = 1: Has one method, getFoodList() that returns the list of recommended foods.
* **Correlation**
  + LCOM4 = 1: Has one method, searchForCorrelations() that searches the food list and the user's food consumed history for correlations between foods and moods.
* **Relation**
  + LCOM4 = 1: Has one method, searchForRelation() that searches the user's food consumed history for relations to a particular food.
* **Chart**
  + LCOM4 = 1; Has two methods, generate() for generating the chart and showChart() shows them.