

1.) Food Recommendation App (With what you have in the fridge) - Pinterest API

- Refrigerator Items Freshness App - Grocery Store Website Scraping

It would be an app that would initially have the user input into a list/database what they currently have in their fridge/pantry. Then the user would select what items they would like to cook with (or a 'select all items from fridge/pantry' option would be available if they don't want to be limited by just what they want to use), and we would present the user with a list of stuff they could make based off of what they selected as the ingredients they would like to use. Another feature we may implement as well is that when the user plugs in the stuff they have in their fridge/pantry, they can also put in the expiration dates for them that way we can send them an alert whenever something in their fridge/pantry is about to expire. Then we can search for nearby stores that have that item that's about to expire and tell them they can go restock there.

One of the third party libraries that we would use would be the Pinterest API since many people upload recipes with instructions and an ingredient list on there. Then depending on whether we decide to implement the expiration date alert feature, we may need to use the phone's GPS sensor to look for nearby stores. We would then run a search on that store's website and scrape it to find whether or not they have the item that is about to expire.

2.) Movie Night Meetup

It would be an app that would allow people to meetup for a movie night at the theaters. A user would plug in what day they would like to go to the movies, what movie they would like to watch, and at around what time. They could then see other people who have similar criteria as them and they could message them via the app whether or not they would like to go to the movies together on the day they had inputted. There would also be a section where there would just be a list of user's looking to go with someone to the movies, sectioned/split up by either day, time, or movie (whichever the user would like to filter by) and ordered from closest to furthest away to the user. This way if the user doesn't have a strict/strong preference as to which day, time, or movie they want to watch, they can just look for other people who do have a strong preference and they can just join them. We would also allow the user's to purchase their tickets straight from the app by either using Fandango's API directly or just redirecting them to Fandango's site but with all of their information filled out already.

One of the third party libraries that we would use would be the Fandango API to get a list of movies from which the user can select from and get the movie times for them. We also may need to use the phone's GPS sensor to determine the proximity of user to user. That or we would ask for the user to input their zip code and from there we could use Google Maps API to determine the distance from zip code to zip code and see how close one user is to another via the zip code they provided.

3.) Road trip Planner - Google Maps API

It would be an app that would take all the hassle away from planning a road trip. The user would input the locations they would like to travel to on their road trip, how many people would be on the trip, and in how many days they would like to complete the trip in. We would then plan out the route (reorder the locations) that would lead to the most optimal trip (e.g. If the user would put in Los Angeles, Chicago, and Miami in that order, then we would reorder them in a way that would lead to the least amount of mileage that they would have to drive). It would then tell the user how much time they would have at each location of the trip, as to allow for them to complete the whole trip within the days given. If the whole trip isn't able to be completed within the amount of days provided, then we would inform the user that they need more days to complete the given trip that way they can decide on whether they would like to take more days for the trip or if they would like to delete a location. We would also allow for the reverse where the user can plug in how much time/days they would like to spend at each location, and we would provide them with the minimum amount of days that would be needed to complete the whole trip that way they can either ask off of work for those many days or just allow them to plan out their calendar in an easier manner. A feature that may be added, depending on how development goes, would be that the user can plug in a budget for the whole trip. We would then take this budget into consideration and recommend/plan out restaurants/hotels for them to stop at.

One of the third party libraries that we would use would be the Google Maps API to plan out the user's trip for them. Then depending on whether we implement the restaurant recommendations, we may use the Yelp API to find the price level of a restaurant and see whether or not it fits within the user's budget.