

Senior Project, 2017, Summer

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Problem

- Breazehome's desktop web application does not conform to mobile platforms.

Solution

- Develop a mobile web application for Breazehome.
- Offers users a convenient way to use Breazehome's services on mobile.

Current System

- Provides users with a desktop web application that allows users to buy, sell, and properties.
- Properties are displayed in a list and map view.

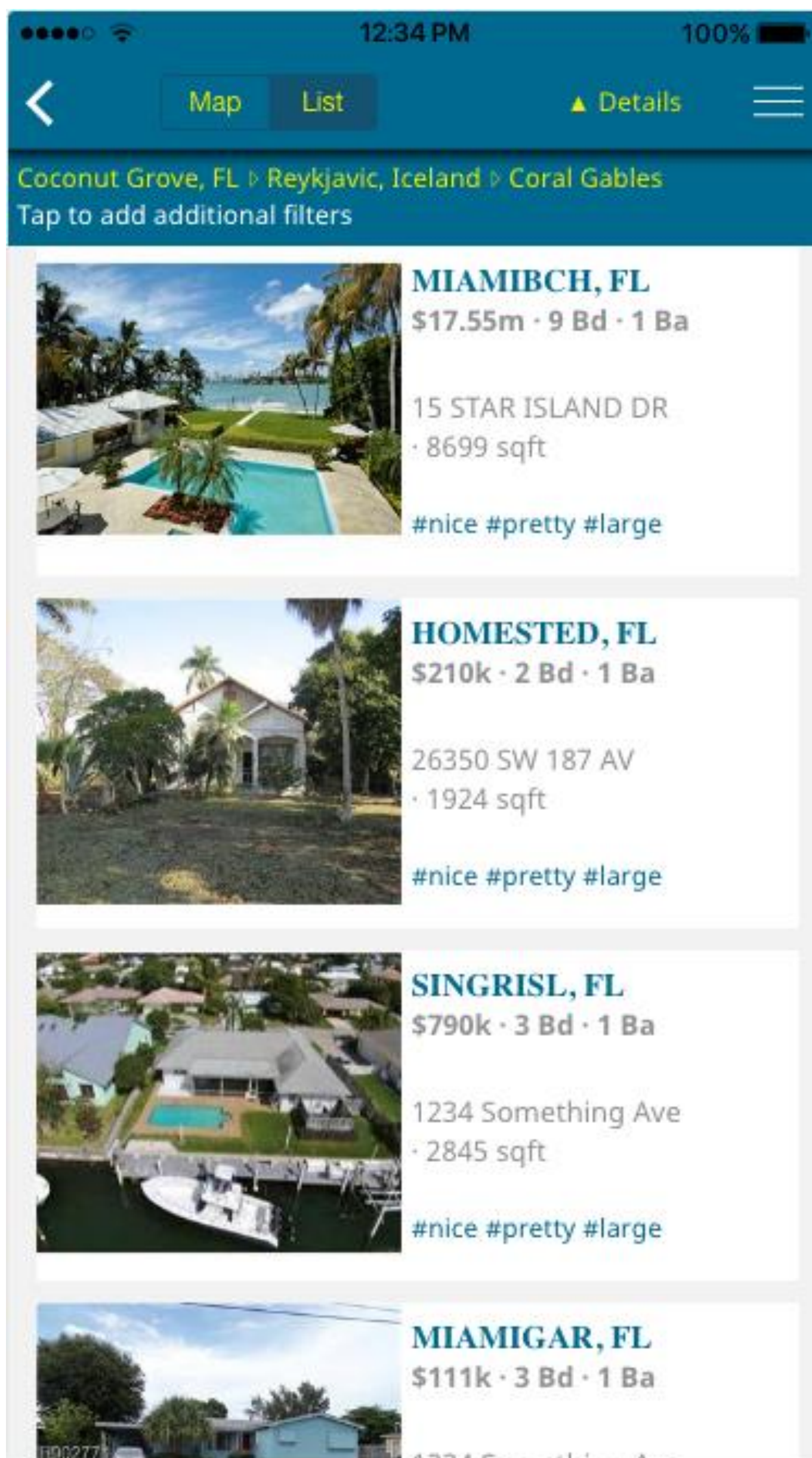


Figure 1



Figure 2

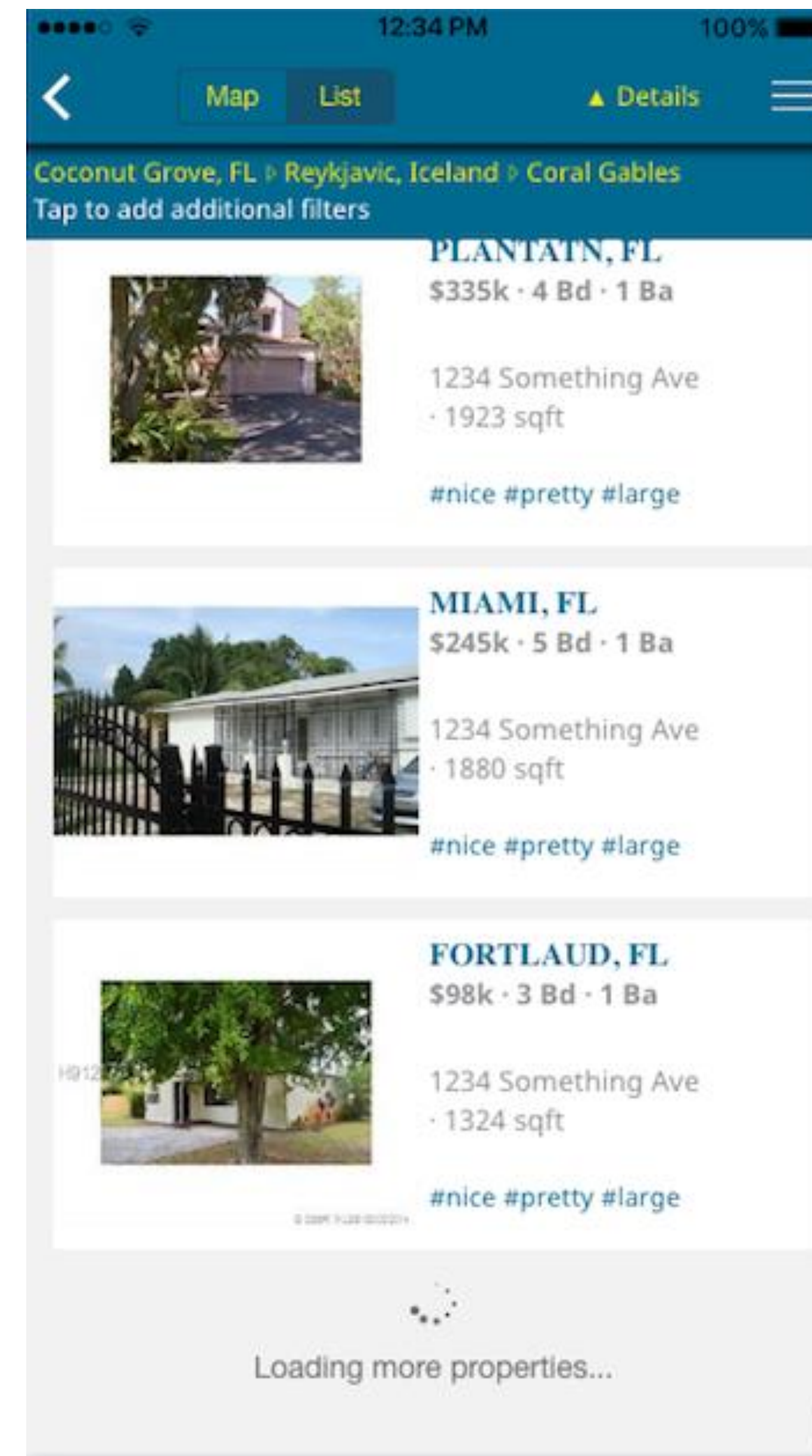


Figure 3

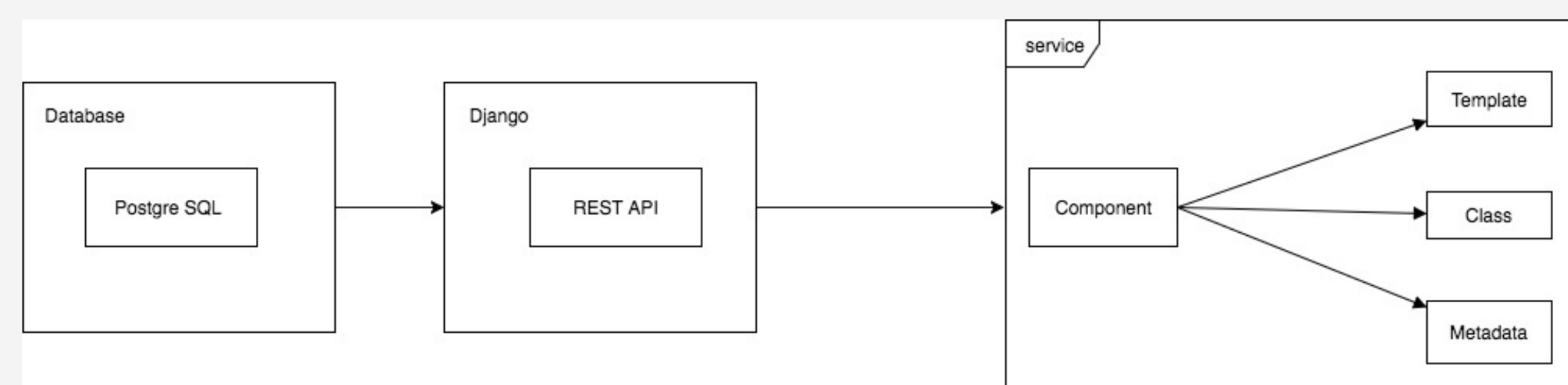
Screenshots

- Figure 1: Search page with Filterbar shown
- Figure 2: Search page with property card swiped right
- Figure 3: After reaching the end of the list, more properties are loaded

Requirements

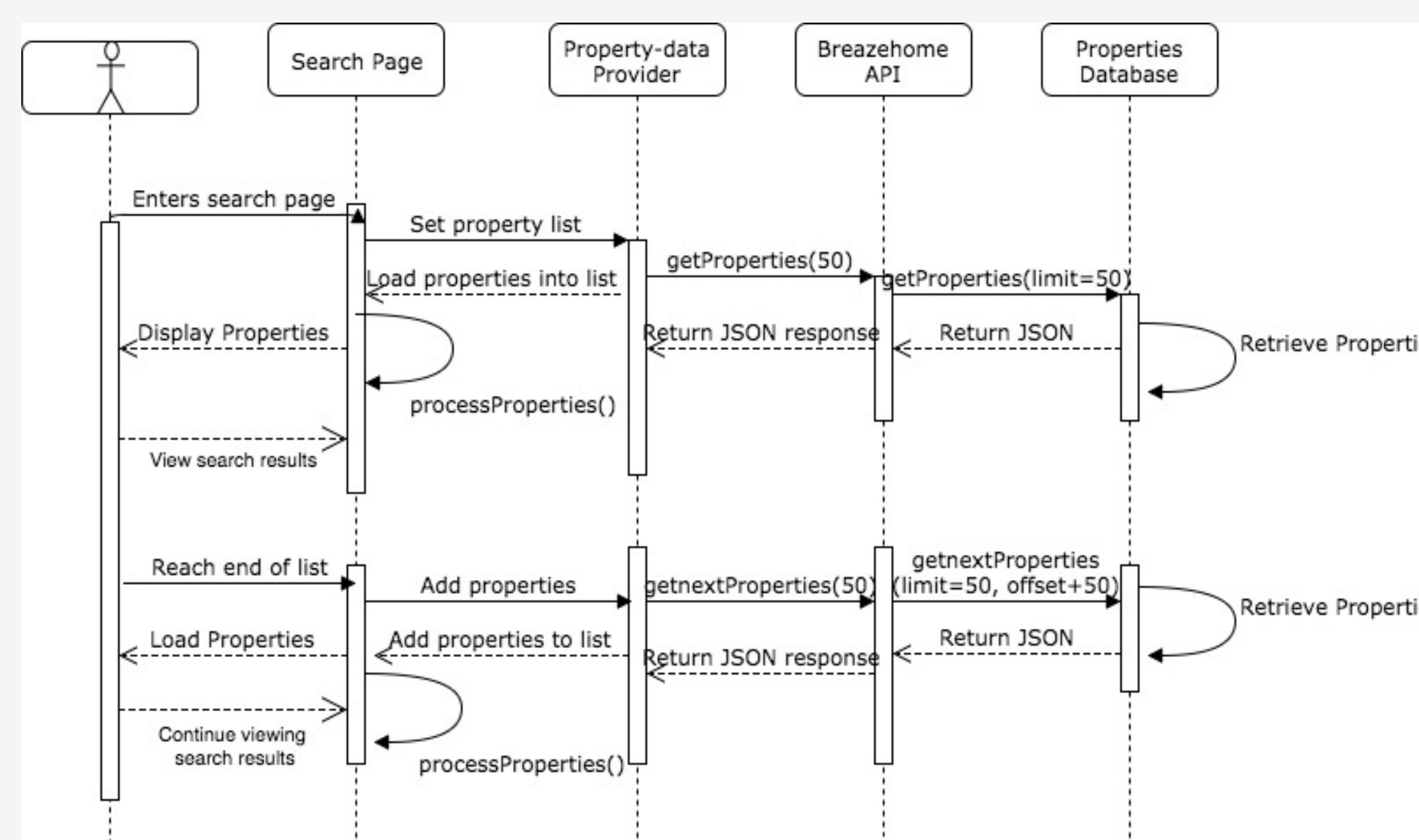
- Allow users to access property details by clicking on property card
- Allow users to swipe cards
- Load more properties once user has reached the end of the list
- Implement a drop down filter bar accessible by clicking the details button
- Allow users to access the map page by clicking on the segment

Class Design



System design including the database, web API, and service

Object Design



Implementing backend properties and services

Implementation

- Frontend
 - Ionic 3
 - HTML
 - Typescript
 - SASS
- API
 - Python
 - Django REST Framework
- Database
 - PostgreSQL

Verification

Unit Test

- Test case ID:** get_backend_properties_0
- Description/Summary of Test:** Given the user is a guest or registered user, when the user first loads the search page, then the system should retrieve properties from the API.
- Pre-condition:** The user is logged in or is a guest of the system.
- Expected Results:** The system should display the properties in a list after receiving a response from the API and processing the data.
- Actual Result:** The system displays the properties in a list after receiving a response from the API and processing the data.
- Status (Fail/Pass):** Pass.
- Test case ID:** get_backend_properties_1
- Description/Summary of Test:** Given the user is a guest or registered user, when the user reaches the end of the search page, then the system should load more properties to the property list.
- Pre-condition:** The user is logged in or is a guest of the system.
- Expected Results:** The system should display a "Loading more properties..." message then display the new properties once they have loaded.
- Actual Result:** The system displays a "Loading more properties..." message until the next list of properties is shown
- Status (Fail/Pass):** Pass.

Summary

- Allows users to browse through list of properties
- Presents users with information about the listed properties
- Gives users access to property details page
- Gives users access to filter page
- Allows users to switch between map and search pages

Acknowledgement

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