SPRINT 5

TASK 4

GROUP 3

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CONTENTS

INTRODUCTION

Sprint documents are a series of documents that the Documentation writer will publish after every sprint, detailing all aspects of the sprint including user specification, product backlog, release backlog, burndown chart, class diagram, use case diagram, sequence diagram, and patch note.

By reading this series of documents, the reader will have a clear picture of what is done in every sprint and details about each version of the release.

USER SPECIFICATION

The client wants the application to be able to detect the phone's location and automatically display "Price Paid Data" of residential property sales close to the phones location. A heat map overlay to Google Maps will be used to display the prices.

Developer should consider the following:

- The "Paid Price" database is big; some kind of precomputation can be done to reduce the storage size

PRODUCT BACKLOG

This list of features includes everything that the development team might ever do.

- Set up the database in the server
- Implement a function to query the server and return information about house prices around the current GPS location
- Implement a function to generate the heat map using the data received from the server

RELEASE BACKLOG

Here are the features to be implemented in this sprint. Listed in priority order with the most important feature at the top of the list, and the amount of time needed to complete the task estimated in hour.

1. Set up database and servlet on the server (60 hours)
2. Implement the heat map overlay (60 hours)
3. Implement the 'List' function that will display a list of properties with their recent sold price and date (5 hours)
4. Evaluation, testing, and optimization (15 hours)

BURNDOWN CHART

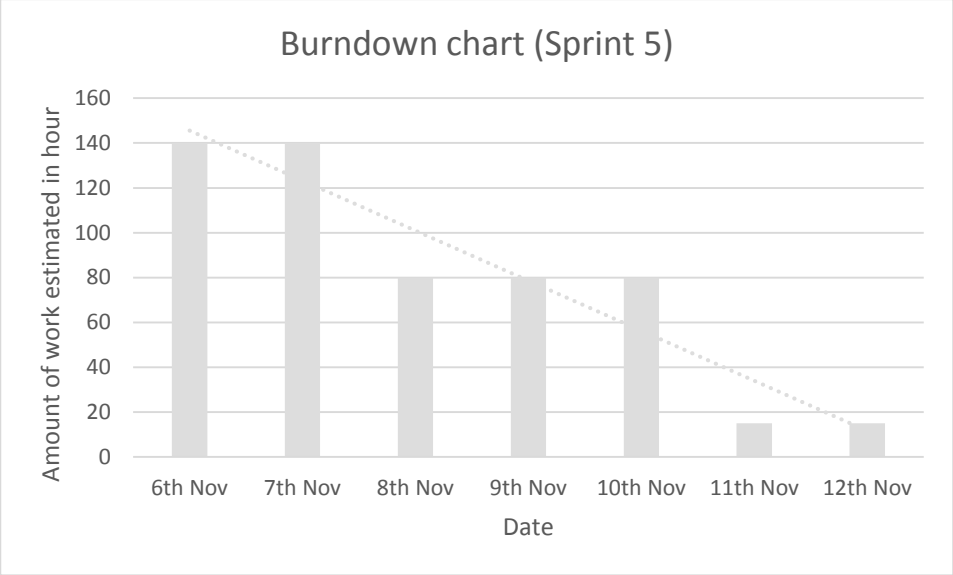

FIGURE 1. BURNDOWN CHART SHOWING THE AMOUNT OF WORK LEFT ON ANY GIVEN DAY ESTIMATED IN HOUR.

CLASS DIAGRAM

Mark	**Visibility type**
+	Public
#	Protected
-	Private
~	Package(default)

TABLE 1. MARKS FOR UML-SUPPORTED VISIBILITY TYPES.

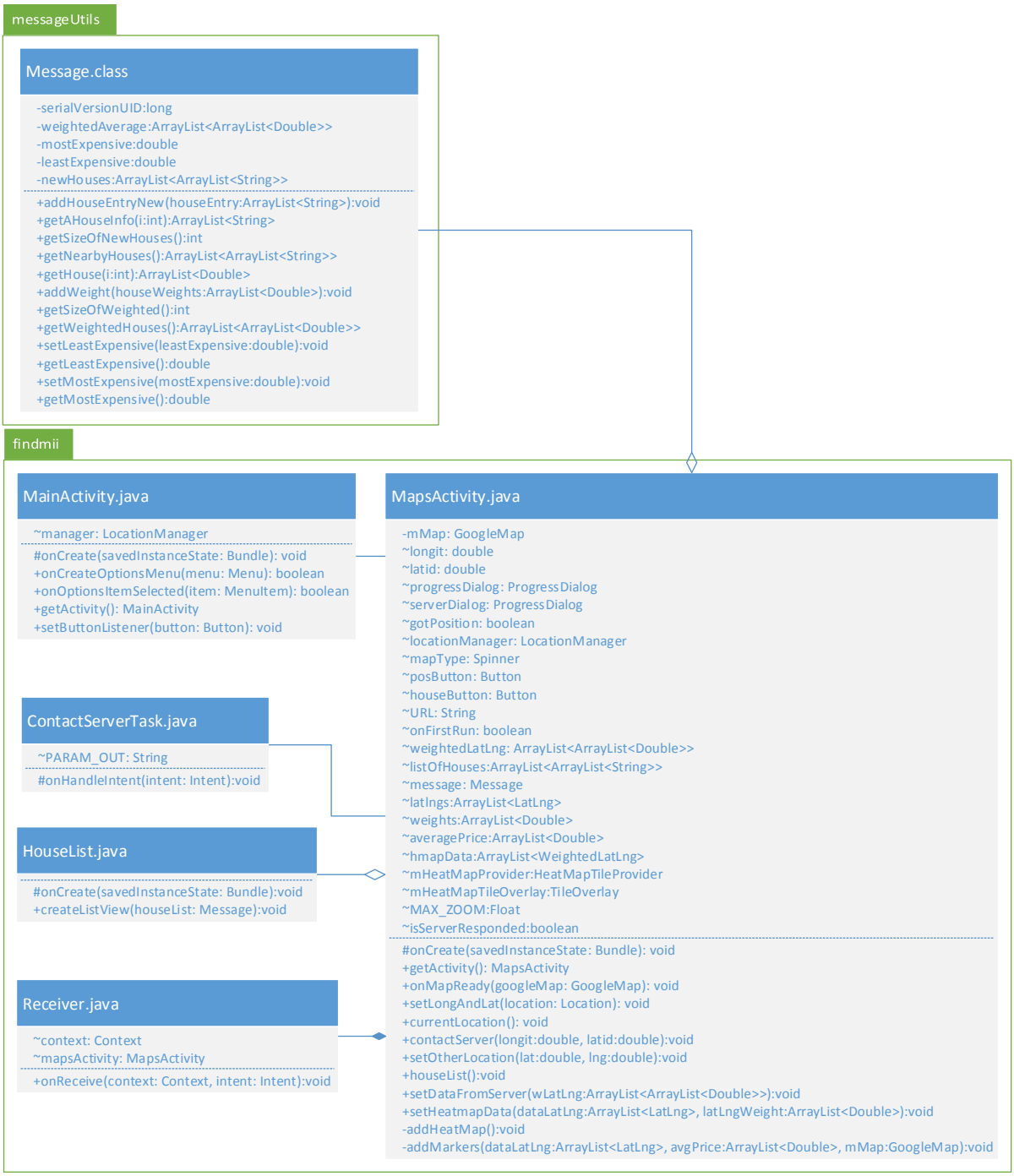

Figure 2. Class diagram. The upper part contains attributes of a class and lower part contains methods of a class.

USE CASE DIAGRAM

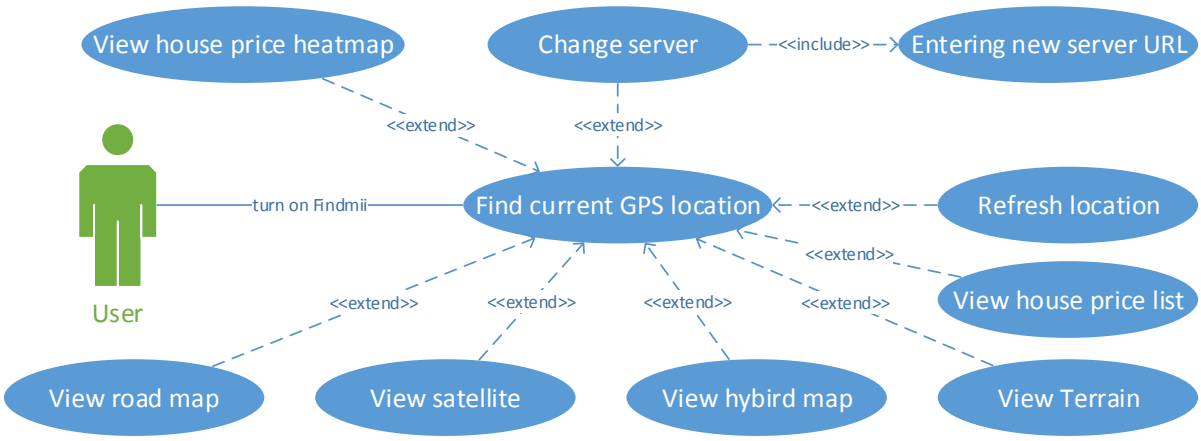

FIGURE 3. USE CASE DIAGRAM SHOWING THE ACTIVITIES A USER CAN DO.

SEQUENCE DIAGRAM

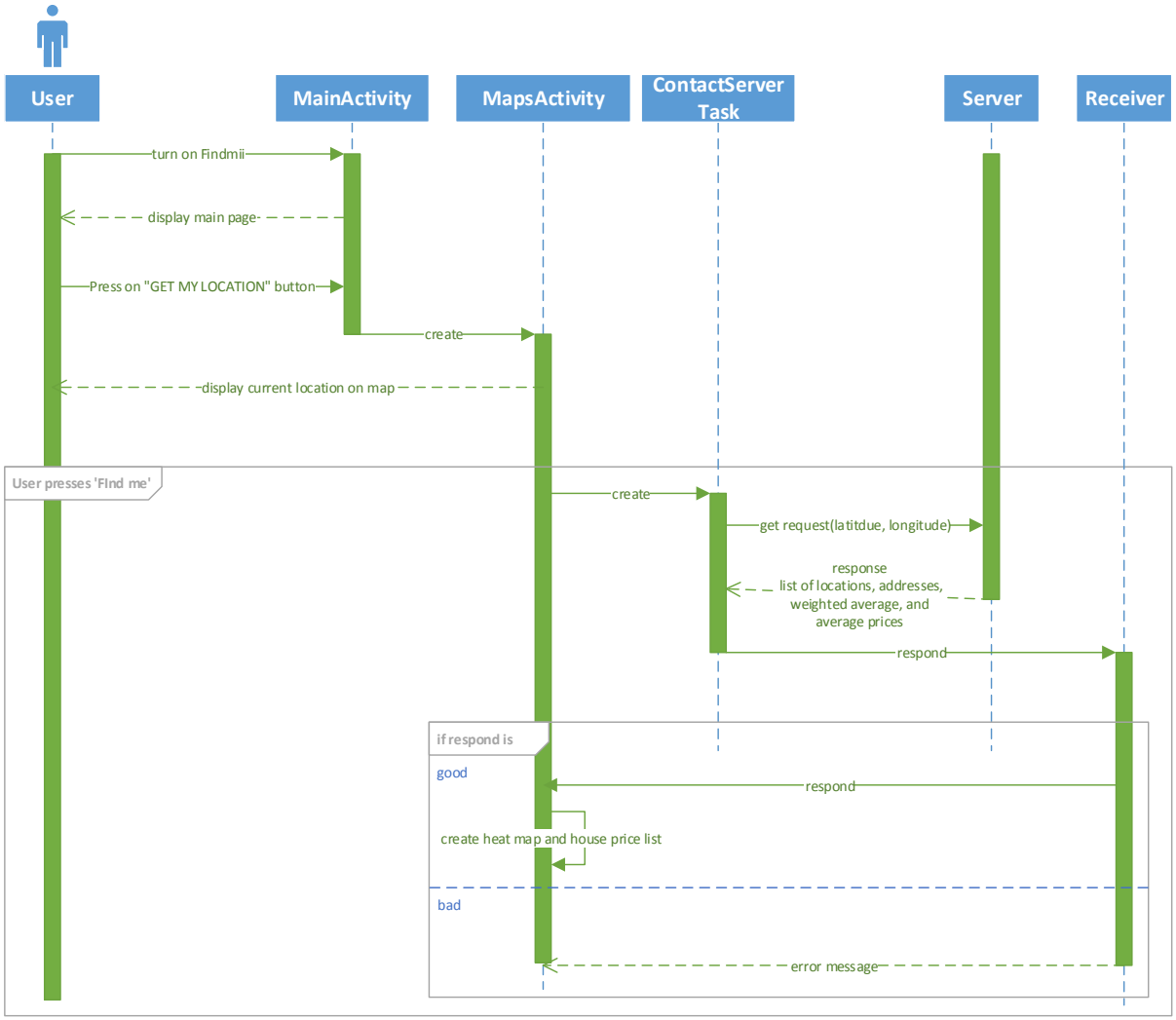

FIGURE 3. SEQUENCE DIAGRAM SHOWING INFORAMTION FLOW BETWEEN USER AND OBJECTS WHEN THE USER USES FINDMII TO FIND THE CURRENT LOCATION.

DATA BASE STRUCTURE

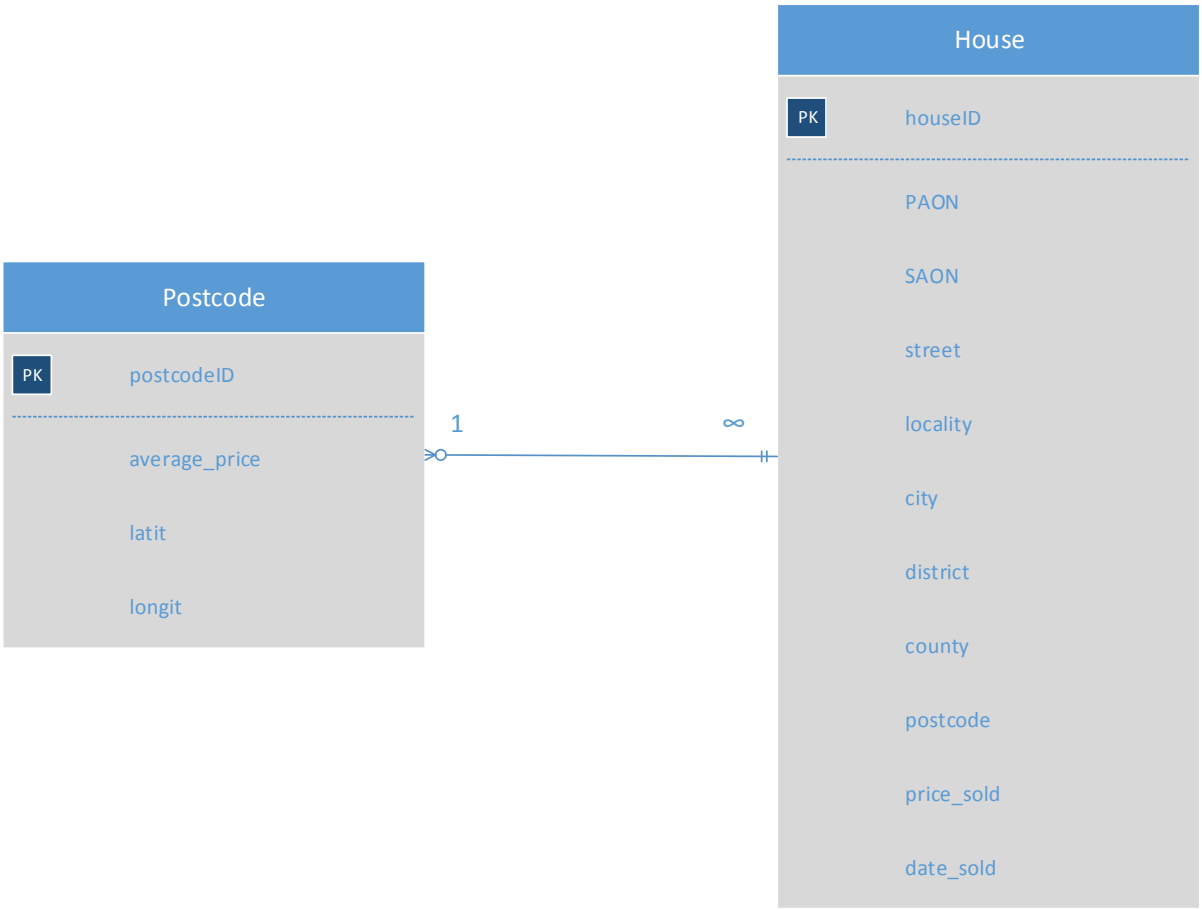

FIGURE 5. DATABASE NOTATION.

PAON: Primary address object name, which is the house number of the property.

SAON: Secondary address object name, which is the flat number of the property.

PATCH NOTE

Findmii version 3.0

- A database is set up for storing house price data
- Implemented a function to allow the application to get information from the database to perform the following actions:
    - Generate a heat map to present the house prices
    - Generate a list of nearby houses, displaying the full address, price, and distance from current location
- Removed the feature of sending current location to server automatically every minute