

# RECycle Continued

**SW Engineering CSC 648/848 Section 01 Fall 2017**

## **Team 13**

Jeremy Rodgers

Sabiha Barlaskar

Risha Shah

KaChi Lau

Parker Gray

## **Milestone 2**

**10/27/2017**

Date	Document History
10/27/2017	First Draft (Submitted for Review)

# 1. Data Definitions V2

## 1. Types of users:

- a. **Browser:** Can just view the website to get an idea about the market trends
  - b. **Selling Agent:** Needs to register. Can add house details, can remove house details, can modify the house details.
    - Name,
    - ID,
    - Location,
    - Years of experience,
    - Reputation(E, G, F)/(Rating),
    - Photo,
    - Contact Info,
    - House Listed
  - c. **Buyer:** Has to register to purchase a property. He can buy house or contact the seller to have a look at the house.
    - Name,
    - ID,
    - Location,
    - ContactInfo,
    - Interested property name,
    - Photo.
  - d. **Admin:** Admin can ban users, remove properties from listing, view statistics for the website.
    - Name,
    - ID,
    - Admin specific GUI,
    - Log in portal
- ## 2. Property details: Contains Details of the property
- Property location/address (elaborated on below),
  - Size in square feet,
  - Price,
  - Number of bedrooms,
  - Bath, Kitchen,
  - Lot size,
  - Date of construction,
  - Images of house
- ## 3. Address details: Contains the address details
- Zipcode,
  - City,
  - Street,
  - Country,
  - Apartment number/House number

**NOTE:** Data definitions within MVC mockups and vertical prototypes are more or less consistent with milestone 1. Modify this page as new data definitions are added.

## **2. Functional Requirements V2**

### **Priority 1**

#### **Buyer**

1. The buyer shall be able to search the website for a property using zipcode, name of the city
2. The buyer shall be able to filter the search details by price, the area of the property, the number of rooms and the year of construction
3. The buyer shall be able to sign in, register and create an account for himself/herself

#### **Seller**

4. The seller shall be able to sign in, register and create an account for himself/herself
5. The seller shall be able to add/delete/modify details of the property
6. Seller will be able to view current listings as well as contacts at their personal dashboard.

### **Priority 2**

#### **Buyer**

7. The buyer shall be able to see a list of featured properties in the home page
8. The buyer shall be able to edit his/her profile
9. Buyer will be able to view 'favorited' homes on dashboard as well as contacts.

#### **Seller**

10. The seller shall be able to edit his/her profile
11. The seller shall be able to contact a customer service representative through interactive messaging

#### **Admin**

12. The admin shall be able to add/delete/modify the details of property

13. The admin shall be able to contact a seller/buyer by message

### **Priority 3**

#### **Buyer**

14. The buyer shall be able to contact a customer service representative through interactive messaging

15. The buyer shall be able to send message or email to the seller/real estate agent

16. The buyer shall be able to rate a seller

#### **Admin**

17. The admin shall be able to suspend a seller/buyer if needed

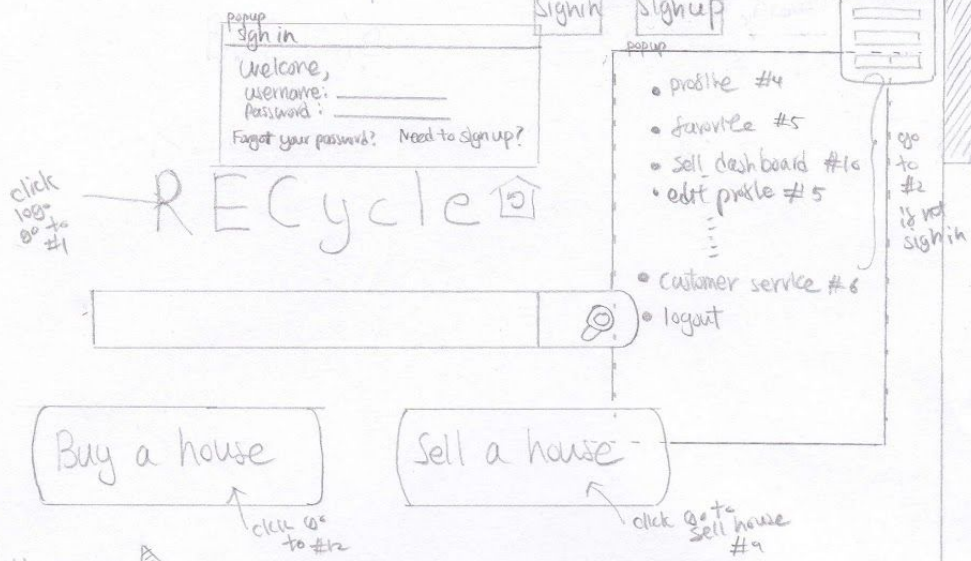
18. The admin shall be able to respond a seller/buyer

### **3. UI Mockups and Storyboards**

Starts on next page.

#1  
Homepage

user type: buyer, seller  
Admin



More houses...

Adr

\$XXXXXX

Adr

\$XXXXXX

New

New

Adr

\$XXXXXX

New

Adr

\$XXXXXX

New


Adr

\$XXXXXX

About Help  
↑ go to about

Folder

2017

REcycle 


Sign up your account

username: \_\_\_\_\_

Password: \_\_\_\_\_

confirm your password: \_\_\_\_\_

password level



phone: \_\_\_\_\_

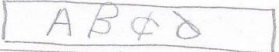
Email: \_\_\_\_\_

Address: \_\_\_\_\_

store ☐ Zipcode: \_\_\_\_\_

city: \_\_\_\_\_

captcha




go to  
1

go to  
#1



#3  
sign in Page

User: Buyer, Seller, Admin

REcycle 

Sign in

Welcome,

Username: \_\_\_\_\_

Password: \_\_\_\_\_

go to #1  go to #1


Forget your password? go to #13

Need to sign up? go to #2

\*If user click on profile, favorite, seller dashboard ...., it would redirect to this page.

#4  
User Profile

we case i seller, buyer,  
admin

RECYCLE 



User Profile

Info

Info

User name : \_\_\_\_\_

User Email : \_\_\_\_\_

User Phone : \_\_\_\_\_

User Account created date : \_\_\_\_\_

User last login : \_\_\_\_\_

Send Message



to #7

Footer

#5  
Edit Profile/Favorite

we have: seller,  
buyer,  
admin

go to 1

Recycle 



set  
this  
as  
header

Edit Profile/Favorite

Inbox ←

Edit

Favorite

Inbox

Edit  
similar as user Profile except no send message

UserEmail: \_\_\_\_\_

User password: \_\_\_\_\_

confirm password: \_\_\_\_\_

phone: \_\_\_\_\_

address: \_\_\_\_\_

state ☒ Zipcode: \_\_\_\_\_

city: \_\_\_\_\_

cancel

ok

Favorite

Id	price	rating	

Footer

Inbox






Reply?

#6

we have: buyer, seller

customer service

RECycle 



---

Customer service

- subject :
- problem / issue :

cancel

send

Footer

go to #1

#7  
Message a user

Usercase: seller, buyer, Admin

# REcycle

## Send a message

Reason

↓

issue

buy a house

others

drop down menu

issue

- subject:
- description:

cancel

ok

buy a house

- house address or ID
- subject:
- description:

cancel

ok

others

- subject:
- description:

cancel

ok

go to #1

Footer

#8  
Admin Page

Use Case: Admin

# RECYCLE



## Admin Page

Index

same as seller  
buzzer

All user

click can go to user page

All users

Username

Jack

All house

Edit Users

All house

click can go to house this page

house Id

Addr

Edit User

Username




Footer



#9  
sell house

wechat: seller

REcycle 



Sell a house / Fill in house Information

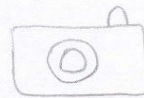
upload picture

upload picture

Address

description

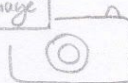
=  
=  
=



upload house image



upload more image



max is  
5

Confirm

Footer


go  
to  
#1

description

Address

#10  
Seller dashboard


usecase: seller

REcycle 







Seller dashboard

Edit button

  
Add a house

go to  
#9


	Address	price	rating	customer Info
				
				
				
...				

Footer



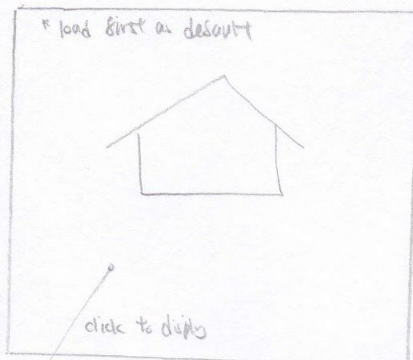
#11  
buy a house (house info)

usecase: buyer

RECYcle 



House info



House address: \_\_\_\_\_



add  
to  
favorite


House description: \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

house price


\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Seller name: \_\_\_\_\_

Selling rating: 

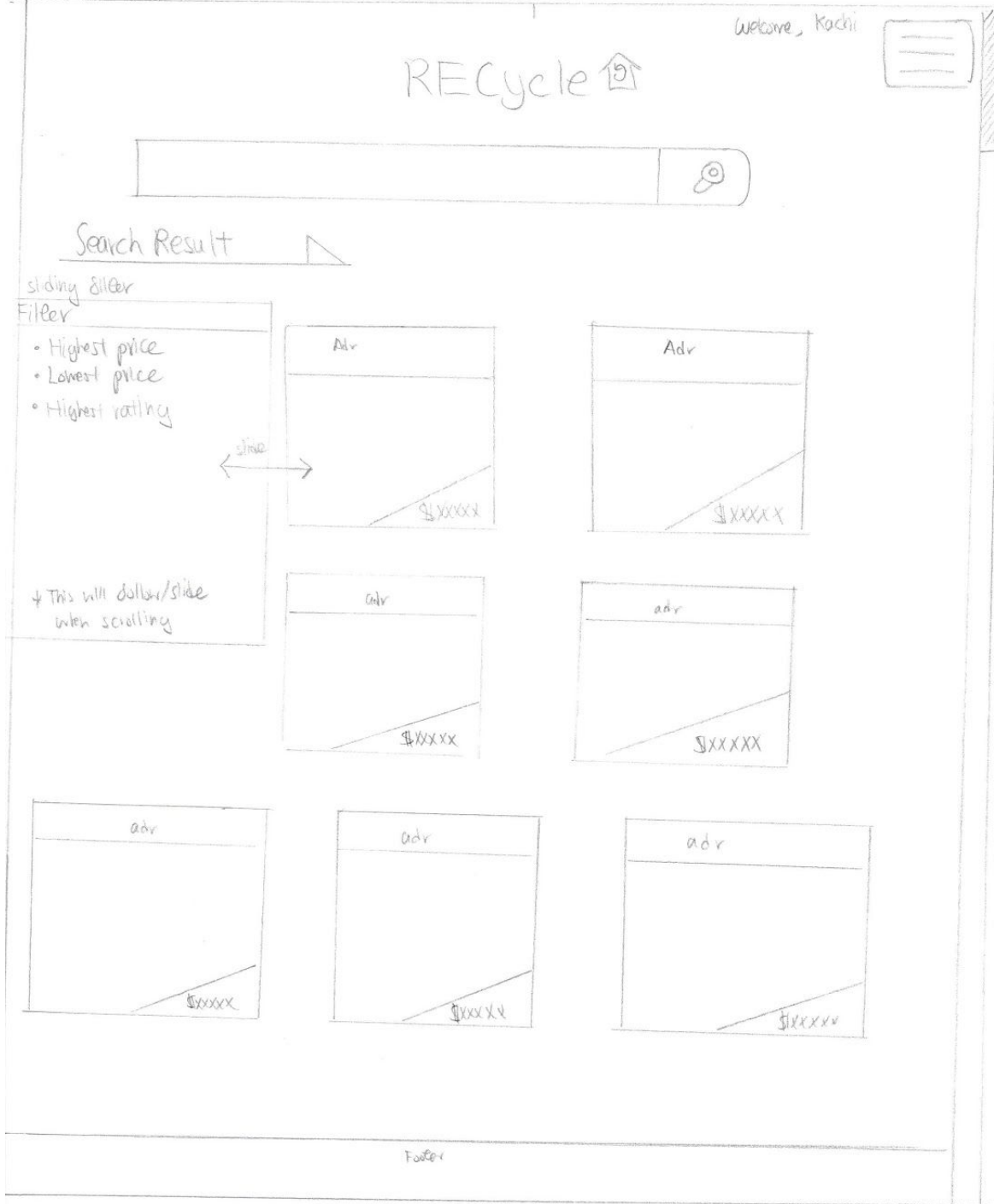
★★★★★


click the name to  
go to user profile



Buy the house / contact seller

go to #1



RECycle 



Forgot your password?

Type your email/username: \_\_\_\_\_

We will send you a email with your password soon!

Resend?

cancel

ok

Footer

go to #1

go to #1

#14 Edit house

Use case: seller

# RECycle

Edit a house

upload a picture

Address

description

≡

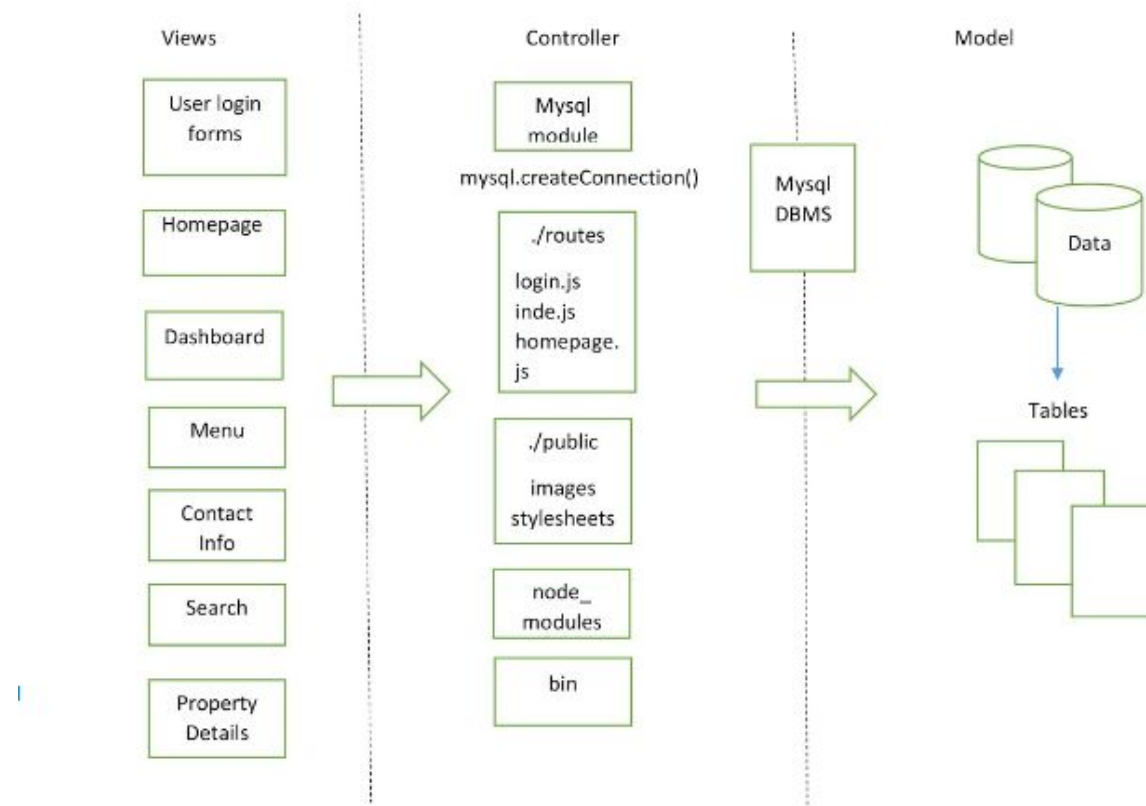
Edit

Address

Footer

## 4. High-level Architecture & Database Organization

### High-Level Architecture



### Database Organization

Two tables organized in the next page.

### Property Table

Size (square feet)  
Price  
Bedroom #  
Bathroom #  
Lot size  
Date of Construction  
Images of House  
Property Type  
House #  
Street  
Zip Code  
City  
State  
Country

### Seller Table

Name  
ID (identification of any kind)  
Location  
Years of Experience  
Reputation  
Photo  
Contact Info  
House Listings

## **Media Storage**

Use a folder on server that can be modified through the group github at will.

## **Search/Filter Architecture/Implementation**

Use the 'like' clause in SQLQuery to have an all-inclusive string-based search. The like clause solves all of the issues.

## **APIs**

None as of now.

## **Non-Trivial Algorithms**

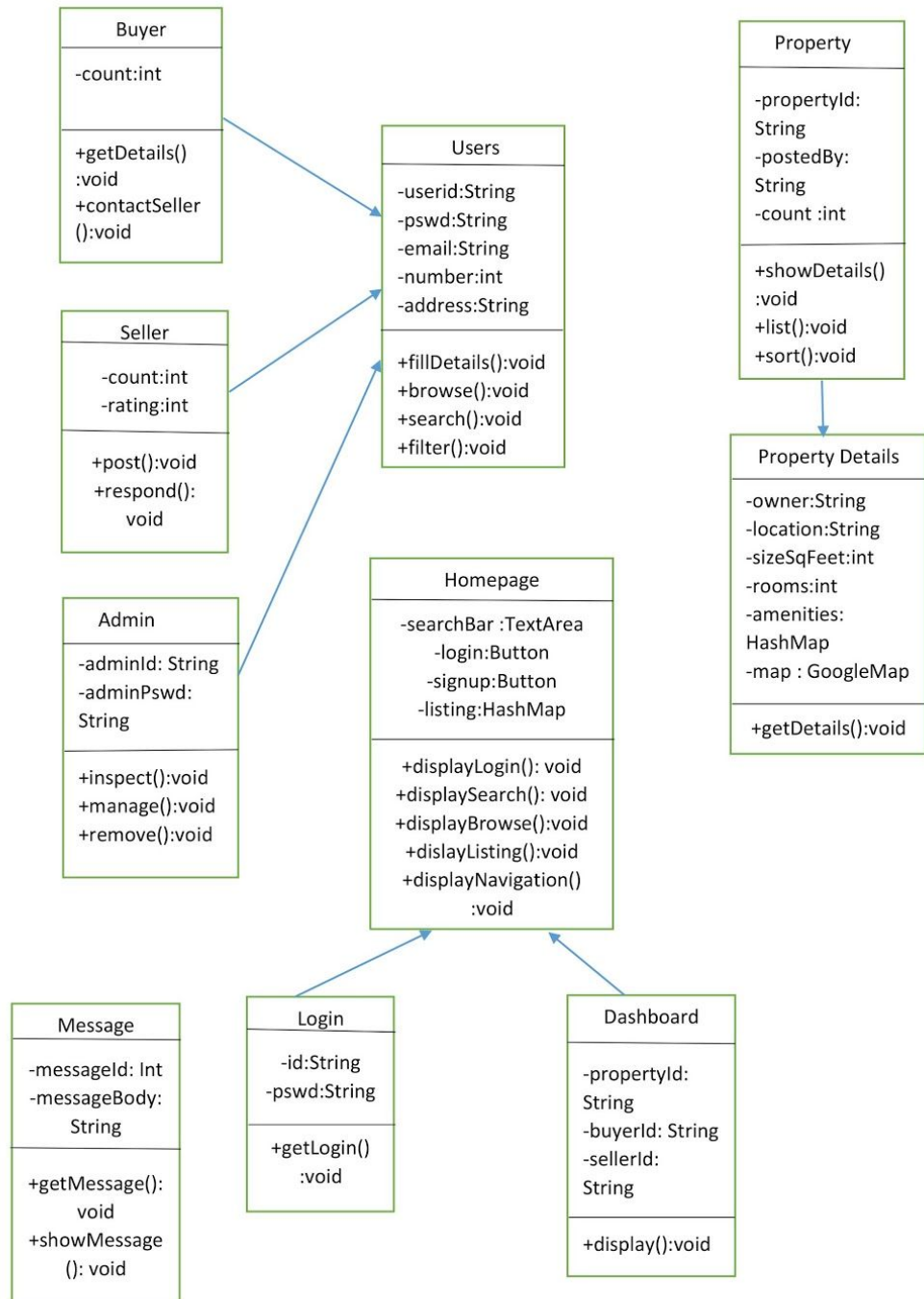
Ratings algorithm will use a simple aggregate of all ratings from all users and then divide by # of users that rated a particular user. Pretty trivial.

## **5. High-level UML Diagrams**

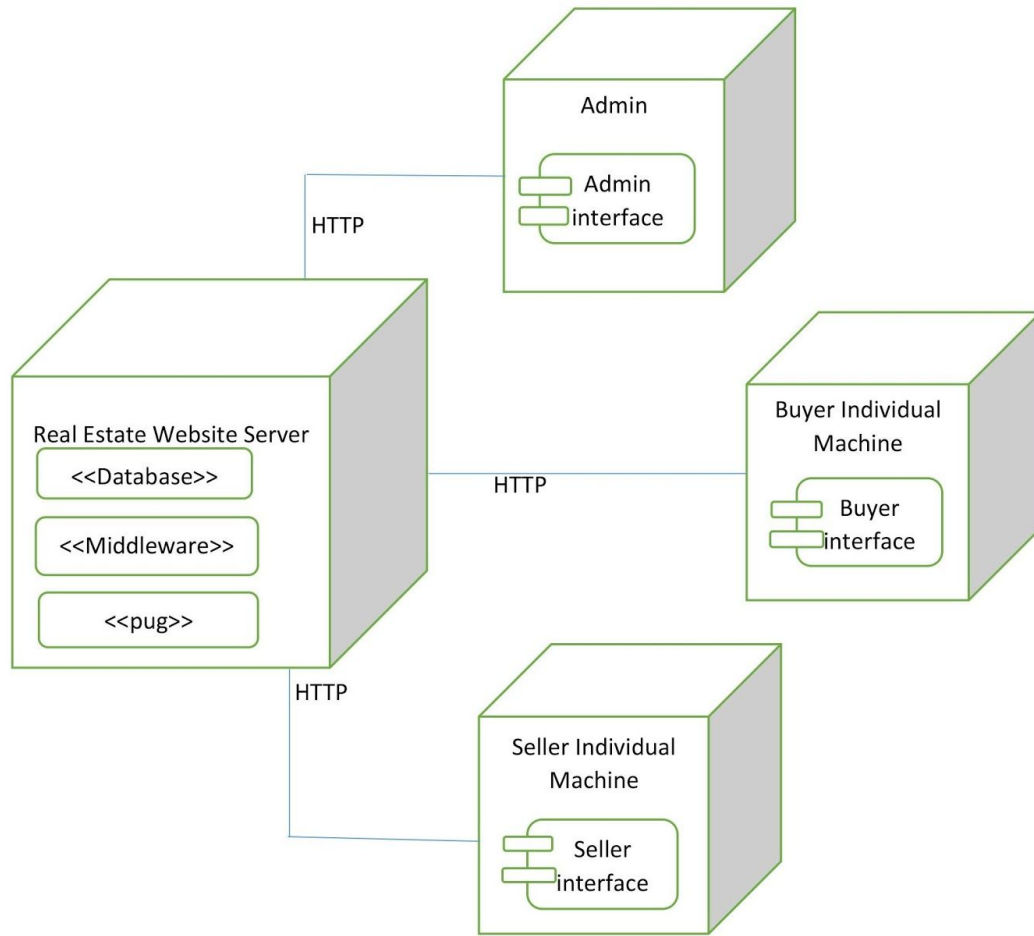
### **Class Diagram**

Featured on next page.





## Deployment Diagram



## **6. Risks of the Project**

For this project, there are a few risks we would like to discuss. The two broad types of risks I think are relevant to our group are *technical risks* and *legal/content risks*.

### **Technical Risks**

This project is introducing the members of our team to many new frameworks & tools that we are not well acclimated with, and that has imposed some difficulties on us already. Currently our technical issue is figuring out the implementation of various parts of the website's database, and this issue is taking up some amount of time. It is likely that issues similar to this will crop up as development on the website continues, so we note this risk as one that will exist throughout the project's duration. The reader of this paragraph may well claim that this risk directly relates to *scheduling risk* as well (in that solving technical issues creates the necessity for a time extension for the various project milestones), however our group has yet to fail to submit a milestone on time, so I do not believe that scheduling risks are all that likely.

### **Legal/Content Risks**

The other possible risk we observe is related to copyright- our website will require the use of plenty of images of houses, some of which will be copyrighted by vengeful copyright vultures who would like to make a quick buck off of poor students using their images. While we do think the risk of copyright infringement is low, as the website will be pretty much inaccessible unless you have knowledge of it beforehand, we suppose the chance of occurrence is not 0, so we list it as a possible risk.