

# Project Report

## Accommodation Web Portal

**Group Name:**  
Double Ninety

**Group Member:**

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## **Overview - Architecture / design of the overall system & functionalities**

Our project's goal is to develop a concise and user-friendly web application which allows accommodation providers to present their holiday accommodation on our website easily, and on the other hand, allow visitors to search the accommodation places precisely based on their requirements, to make an online reservation and to review their order. In addition, travelers can also post their renting requirements.

Three main deliverables of this project include:

### **1. Visitor System (Without Session)**

- The visitor can only search the accommodation information based on his preferences such as location, date and review.
- If the visitor would like to move on to the step, he will be asked to sign up or login.

### **2. Provider System**

- The provider will need to fill the form of his accommodation following the instruction so that he can present his idle accommodation online.
- The provider can increase the exposure of his accommodation by paying extra money for the advertisement.

### **3. Traveler System**

- The traveler can search the accommodation information based on his preferences such as location, rate and price.
- The traveler can add his preferred accommodation to the watching list.
- The traveler can add the chosen accommodation to the pending list.
- The traveler can book the accommodation and make a review to it.
- The traveler can also post his accommodation requirements.

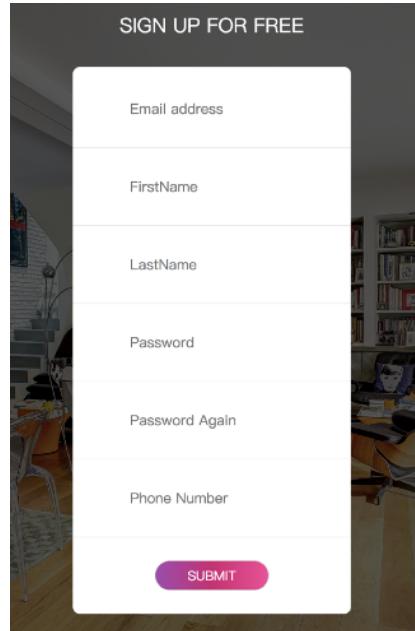
## **Description of the functionalities developed by the team**

In this web application that we delivered, there are 14 functionalities developed by our team. I will describe the details about our function and explaining why we should have this module in our project below.

### **1. Register function**

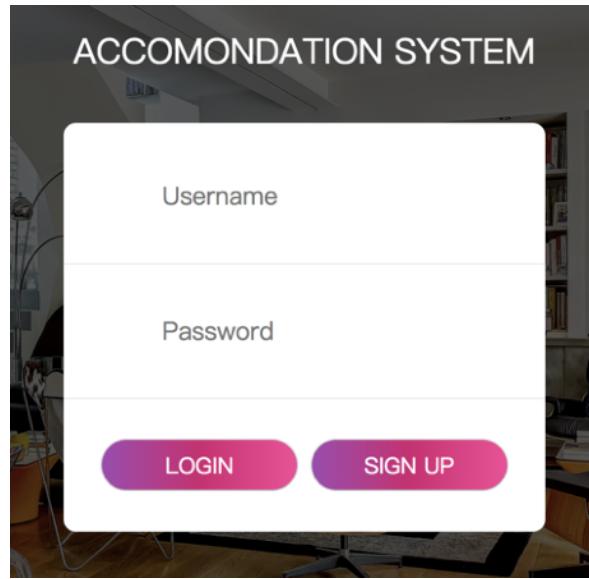
This function is about let the visitors of our website to be the user of our web application. In this function, visitor may insert their personal details such as

username, password, email address etc. After registration, users can login to their own account by username and password.



## 2. Login / Log out function

This function is about let the users to login or log out their own account of our web application. They can login with the username and password which they have registered.



## 3. Switch account type function

All users in our application will have two type in their Personal Profile page which is Traveller and Provider.

If we choose the traveller, then the webpage will show the history of the traveller and can review the accommodation which have already lived and

check the review the traveller has already make comment on it. After that, traveller can click the ‘Release Accommodation Needed Information’ to skip to the page to release the accommodation needed request.

If we choose the provider, then the webpage will show the owned accommodation of the provider and they can pay some money for their accommodation to show their accommodation in the advertisement page. After that, provider can click the ‘Release New Property’ to skip to the page to release the new property.

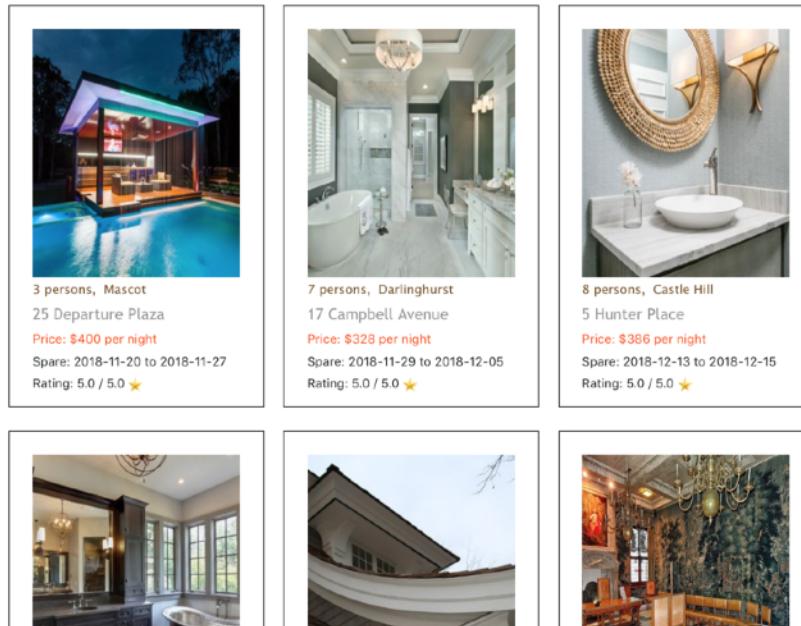
Personal Profile		Personal Profile																																				
Profile For : <input checked="" type="checkbox"/> Traveller <input type="checkbox"/> Provider		Profile For : <input type="checkbox"/> Traveller <input checked="" type="checkbox"/> Provider																																				
Name: Esmeralda Mao	Gender: male	Name: Esmeralda Mao	Gender: male																																			
Email: root@gmail.com	Phone: 495659009	Email: root@gmail.com	Phone: 495659009																																			
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<input type="button" value="Release Accommodation Needed Information"/>		<input type="button" value="Release New Property"/>																																				

#### 4. Recommendation function

This module is built to recommend traveler for the accommodation place. It will be presented on the home page, whatever if someone logs in or not.

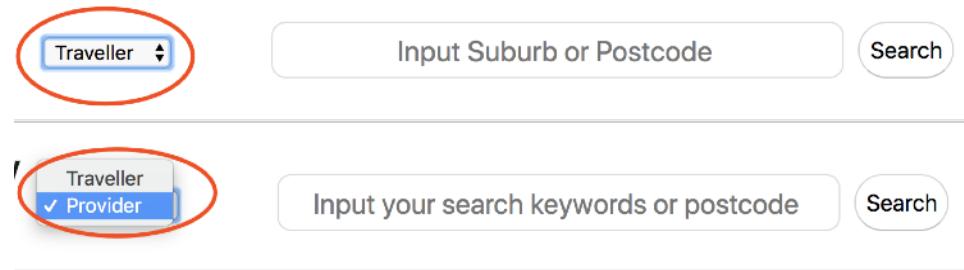
The recommendation is based on the average rate of a property, which is listed under the section head ‘Top rated Accommodation’.

Top-rated Accommodation :



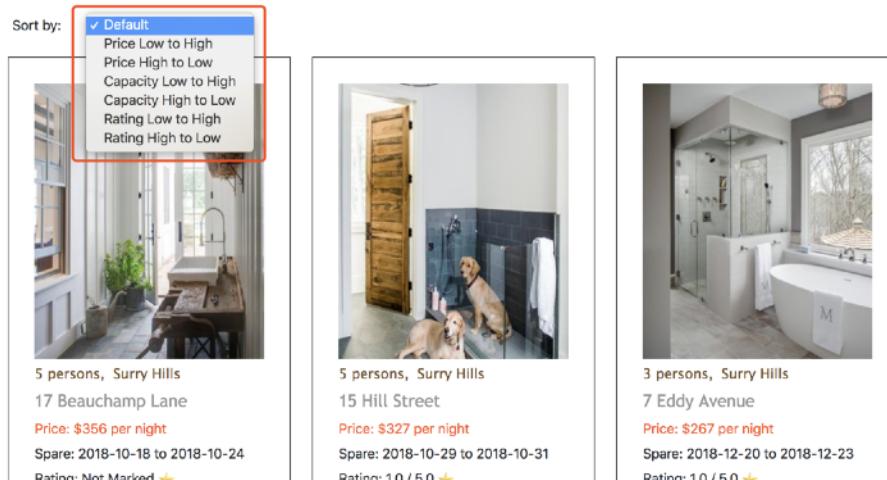
## 5. Search function

This function is for travellers to search accommodation which they want to rent. And providers also can search the needed accommodation which other travellers released. Users can both search the accommodation which they may want to rent and the accommodation requirements by postcode, suburb etc. After press the search button, it will jump to the Search Result page.



## 6. Filter function

In this function, our application will add a filter on the search result page. At first, all the result matching with the suburb will be shown on the search result page by advertisement. In the filter, we will set options of the price and rank of the accommodation. After selecting the criteria, the result will be filtered and then presented on the website.



## 7. Accommodation Display function

In this function, if a user clicks into an accommodation card, it will show you this accommodation's details. We also call google map API to show the google map of the place which is chosen in our webpage.

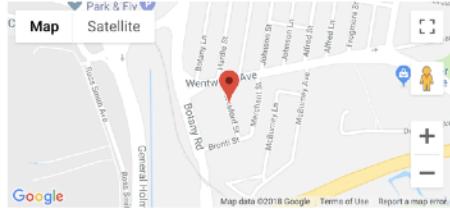
## 9 Beresford Street



Address:	9 Beresford Street
Suburb:	Mascot
Postcode:	2020
Capacity:	4 persons
Owner:	m@yahoo.com
Start Date	2018-10-18
End Date:	2018-10-23

### Description:

Lovely stay. Really well situated Everything is as described. Two hitches were the lack of privacy from the neighbours walking around outside your bedroom window when it was open for fresh air, and because it was really hot particularly in the afternoon when the sun streamed in we had to have everything wide open.



Add to Watching List

### 8. Book function (Watching list & Pending list)

After a traveller selects an accommodation and click the ‘Add to Watching List’ button, the system will jump into watching list. The traveller can review the accommodation in watching list for more consideration. After the traveller submit the book request in watching list, the state of the accommodation will be changed into pending and other travellers cannot search this accommodation. Otherwise the accommodation’s state will change back to ‘available’ state and the status in the personal profile will be changed into ‘cancelled’. Moreover, if there are more than one accommodation in your watching list, we add another function is that you can only choose one accommodation to your pending list.

#### Watching List

Tick	Suburb	Postcode	Address	Start Time	End Time	Remove
<input type="checkbox"/>	Surry Hills	2010	17 Beauchamp Lane	2018-10-18	2018-10-24	<button>Remove</button>
<input checked="" type="checkbox"/>	Newcastle	2300	11 Newcomen Street	2018-10-17	2018-10-20	<button>Remove</button>
<input type="checkbox"/>	Sydney	2000	29 De Mestre Place	2018-10-17	2018-10-22	<button>Remove</button>

Add to Pending List

Back

**Your Pending Transaction**



4 persons, Newcastle  
11 Newcomen Street  
**Price: 305 AUD**  
Pending Time: 2018-10-17 --- 2018-10-20  
Owner Email: wKip0M@qq.com

Pay      Cancel

## 9. Similar Suggestion function

This function will be shown under the accommodation detail which is chosen by the traveller. This will show some similar accommodation places as the accommodation show above.

Some Similar Near From You :



7 persons, Campbelltown  
19 Gilchrist Drive  
**Price: \$306 per night**  
Spare: 2018-11-05 to 2018-11-09  
Rating: 4.0 / 5.0 ★



4 persons, Campbelltown  
5 Warby Street  
**Price: \$332 per night**  
Spare: 2018-12-12 to 2018-12-15  
Rating: Not Marked ★



8 persons, Campbelltown  
7 Broughton Street  
**Price: \$311 per night**  
Spare: 2018-12-17 to 2018-12-19  
Rating: 2.5 / 5.0 ★

## 10. User Display / Edit function

This function is about the user's personal information. They can edit their detail information and it will be shown when they click Personal Profile button on the navigation bar.

## Personal Profile

Profile For : Traveller



Name:	Esmeralda Miao
Gender:	male
Email:	root@gmail.com
Phone:	495859069

Submit

### 11. Review & Comment function

This function is in traveller's Personal Profile page, traveller can review the accommodation which he has lived. And traveller can see the previous review which he gave before.

Your Review for this wonderful accomodation was:

Kris place was fantastic. Very clean and stylish place with everything you needed. In a great location, right near heaps of great places to eat! Kris was very accommodating and helpful letting us drop our bags off early and checking in on us regularly to make sure we had everything we needed. Would definitely stay here again!

Rating: 4.0 / 5.0

★★★★★

History:

Suburb	Price	Address	StartTime	EndTime	Status	Review
Surry Hills	314 AUD	27 Stanley Street	2018-07-29	2018-08-02	Finished	<a href="#">Check Review</a>

Review area:

Write your comment here...

Your rating for your accomodation experience is: terrible experience

★★★★★

Submit

History:

Suburb	Price	Address	StartTime	EndTime	Status	Review
Surry Hills	314 AUD	27 Stanley Street	2018-07-29	2018-08-02	Finished	<a href="#">Check Review</a>
Wollongong	396 AUD	29 Moore Lane	2018-07-23	2018-07-27	Finished	<a href="#">Check Review</a>
Darlinghurst	386 AUD	13 Hardie Street	2018-07-18	2018-07-21	Finished	<a href="#">Check Review</a>
Mascot	272 AUD	1 Henry Kendall Crescent	2018-10-14	2018-10-17	Cancelled	<a href="#">Cancelled</a>
Newcastle	305 AUD	11 Newcomen Street	2018-10-17	2018-10-20	Finished	<a href="#">Write Review</a>

What's more, in the accommodation details page, we can find the all the comments to this accommodation.

## 2 reviews from people who commented this accommodation

2.5/5.0  
★★★ ★



Fleta Eerkes

2018-08-19

★★★★★

A transformed and sprawling apartment. However, the poor customer service



Elenora Cashio

2018-09-25

★★★★★

Nicely renovated in a cool neighbourhood close to metro and lots of transit. Comfortable bed and well prepared small kitchen – I appreciated the coffee and tea. Host was super responsive and it was all great. I'd stay again.

## 12. Release requirements function

This function can let traveller release their rent requirement about the accommodation to let the provider know which kind of accommodation is needed recently. After traveller release this requirement, provider can search it by search bar.

### Accommodation Needed Release Information

Suburb:	<input type="text"/>
Postcode:	<input type="text"/>
Capacity:	<input type="text" value="1"/>
Start Time:	<input type="text" value="YYYY-MM-DD"/>
End Time:	<input type="text" value="YYYY-MM-DD"/>
Min Price:	<input type="text" value="Whole Number"/>
Max Price:	<input type="text" value="Whole Number"/>
Advanced Details:	<input type="text"/>

Submit

Back



UNSW  
SYDNEY

Provider

Kingsford

Search



Amanda

### Accommodation Needed Requirements

Suburb	Postcode	Capacity	Start Time	End Time	Min Price	Max Price
Kingsford	2062	3	2018-10-20	2018-10-21	300	500

## 13. Release new property & spare time function

This function let provider release new property and can add more spare time on their own property. This can let our application has more property on it. And

add to our database.

### Property Release Information

[Release New Property](#)

Address:

Suburb:

Postcode:

Capacity:

[Submit](#)

Owned Property :

Suburb	Address	Capacity	Add Time
Randwick	15 Chapel Street	8	<a href="#">Add Spare Time</a>
Start Time: YYYY-MM-DD	End Time: YYYY-MM-DD	Price: \$ Whole Numbers	<a href="#">Submit</a>
North Ryde	19 Brendon Street	4	<a href="#">Add Spare Time</a>

[Back](#)

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#### 14. Advertisement function

This function can let providers pay money for their owned accommodations. If one provider pays more money for one accommodation, it will appear on the advertisement part in our homepage.

## Personal Profile

Profile For :



Name:

Gender:

Email:

Phone:

**Owned Accommodation:**

Suburb	Address	Start Time	End Time	Advertisement	Pay
North Ryde	19 Brendon Street	2018-12-12	2018-12-22	200	\$15 <input type="button" value="Pay"/>

**Advertisement :**



4 persons, North Ryde  
19 Brendon Street  
Price: \$222 per night  
Spare: 2018-12-12 to 2018-12-22  
Rating: 2.5 / 5.0 ★



5 persons, Sydney  
29 De Mestre Place  
Price: \$265 per night  
Spare: 2018-10-17 to 2018-10-22  
Rating: 2.5 / 5.0 ★



4 persons, Mascot  
9 Beresford Street  
Price: \$380 per night  
Spare: 2018-10-18 to 2018-10-23  
Rating: Not Marked ★

## Implementation challenges:

### 1. Architecture

At the beginning, we decided to use the traditional MVC architecture with MongoDB, Express, jQuery and Node. However, we found that this will lead to a combination of logic and view codes in one page. Thus, we decided to separate front-end and back-end. Front-End adopts React.js and handles View and Controller, while Back-End still adopts Node.js and handles Model. In addition, RESTful API are the interface between them.

### 2. Back-End

JavaScript is a language different from python or java because it executes codes asynchronously. It results in huge problems when we try to do some operations that need to be run step by step. It cost us lots of time to learn the logic of ‘Callback’ and ‘Promise’ in order to execute codes at our will.

### 3. Database

In this project, we decided to use MongoDB as our database. However, it is a non-relational (NoSQL) data structure. On one hand, we take NoSQL's dynamic storing structure as an advantage; on the other hand, in order to manage relationships between data, we used Mongoose which is an Object Data Modeling (ODM) library for MongoDB and Node.js. Afterwards, during handling database operation, we used lots of tricks such as 'Populate' and 'Nested Array'.

### 4. Dummy Data

In this project, there should be some 'real' data shown on the website. This is not only for the testing and also for the demo. Due to the complex logic behind this project, making data become complex and difficult, including how to ensure the correction between the user and the property (for example, no conflict when the user decide to book an apartment) and how to write the valid spiders in order to crawl the house pictures.

### 5. Front-End

In this project, the framework we used in our project is React.js. Since this technology we did not use before, hence learning the new technology without tutoring is time consuming and difficult. Fortunately, by discussing with peers and self-learning , we finally learned how to use that framework to build our application

Another challenge that we met in front-end was we need to align our UI/UX design with front-end engineering construction. It is not easy because everyone in our team has different background.

## User documentation:

How to build and setup dependencies for running our project:

### Preparation:

Before running the website, you need to install **Python**, **MongoDB** and **Node.js** at first.

#### 1. Install Python and related packages

Please download the Python 3.x from [here](#) and install it. Then open the Terminal, type `**pip install <package name>**` or `**pip3 install <package name>**` to install the following packages in your Python 3 environment:

- a. **pymongo**
- b. **pandas**
- c. **numpy**

For example, type `**pip install pymongo**` to install package **pymongo**.

## 1. Install MongoDB

Please click the following link to install [MongoDB Community Edition](#) and there are three editions: Windows, Linux and macOS.

If you are using macOS, please strictly follow the instructions in this [link](#). We strongly recommend you install MongoDB with Homebrew and remember to set permissions.

After MongoDB is installed, please run '`mongod`' to start the server (if permission denied, you can run '`sudo mongod`'). Then, open another terminal and run '`mongo`' to ensure MongoDB can be successfully connected.

Please **ENSURE** the MongoDB successfully installed and it can work properly!

## 2. Install npm & Node

Since npm is installed with Node.js, please click this [link](#) to download Node.js and npm package. In addition, you can use the following command to check that you have node and npm installed.

To check if you have Node.js installed, run this command in your terminal:

```
node -v
```

To confirm that you have npm installed you can run this command in your terminal:

```
npm -v
```

## Setup and Run project on localhost:

1. Type '`mongod`' in your Terminal to ensure you open the MongoDB.
2. Please open another Terminal in your own laptop and type:  
`'git clone https://git@bitbucket.org/doubleninty/comp9900-mern.git'`  
to download our project repository.
3. Then, type '`cd comp9900-mern/`' to enter the folder.
4. Type: '`npm install`' to install our server-side dependencies.
5. Type: '`npm run client-install`' to install our client-side dependencies.
6. Type: '`cd Datamodel`' to enter the folder '`comp9900-mern/Datamodel/`'.
7. Type '`node plz_run_me_first.js`', it will insert the dummy data into the database. If there is no error shown in the terminal, this means success.
8. Type '`cd ..`' to go back to the upper folder `comp9900-mern`.
9. If you use macOS, type '`pwd`' to ensure you are under this path  
`'<YOUR_PATH>/comp9900-mern/'`
10. Type: '`npm run dev`' to run the client & server with concurrently.

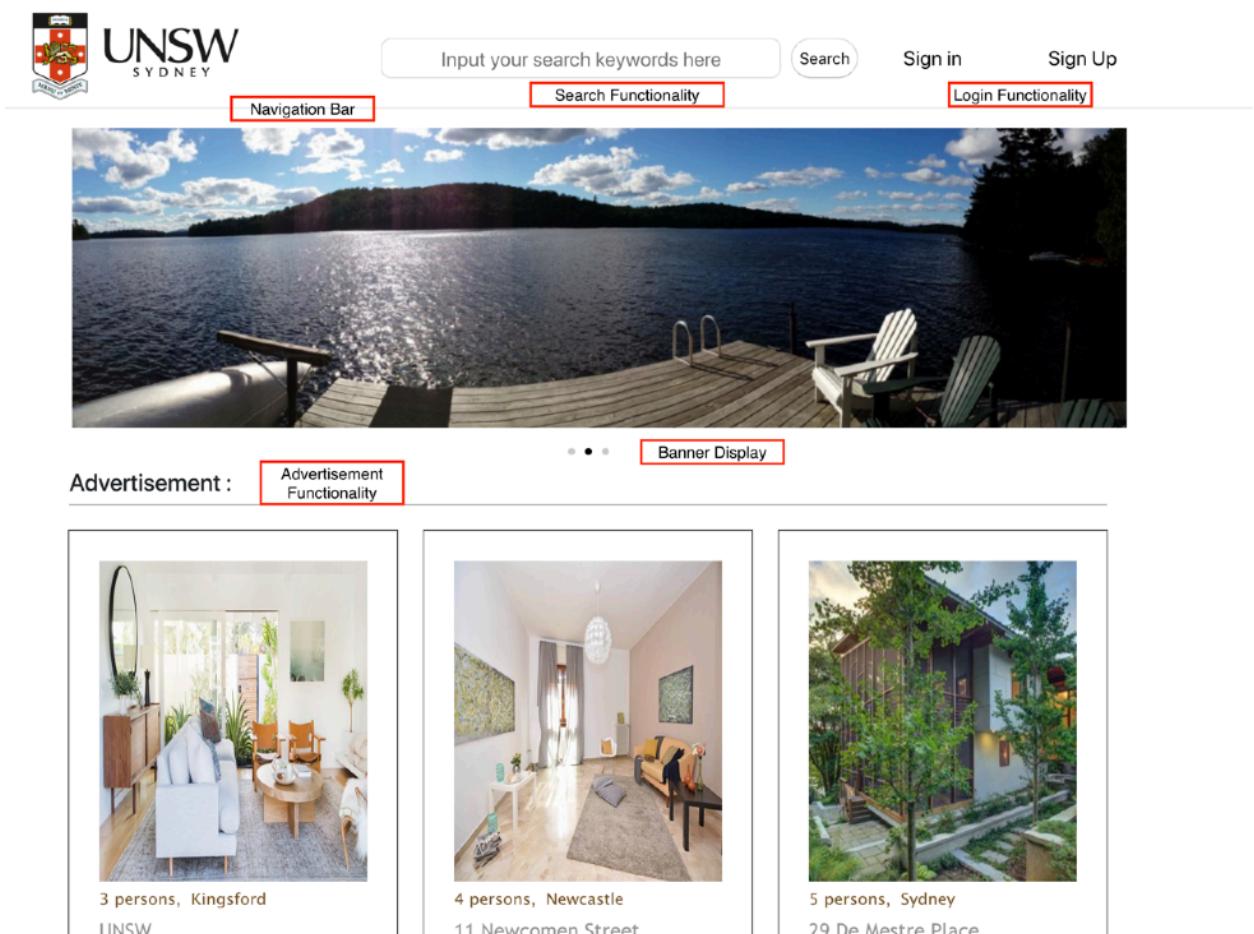
11. If the chrome window does not pop up, please open your own browser and type `<http://127.0.0.1:3000>` in the address bar.

Configure:

1. If you want to stop running our project, please press Ctrl + C to interrupt the program.

### User Documentation:

When you first running our project in your browser, you may see our “homepage” like this:



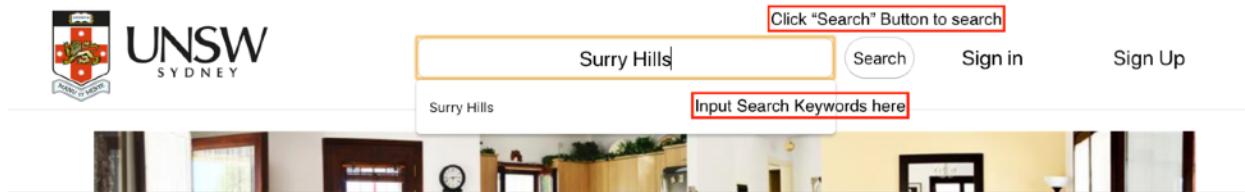
On the Upper part of our homepage, you may find there is a “navigation bar” on the top side, here you may can **search** the available accommodation by input **suburb keywords or postcode**.

#### 1. Search Functionalities demonstration:

- Search accommodation by suburb:
  - Input suburb keyword “Surry Hills” to search bar and click “Search” button

- Search accommodation by postcode:

- Input postcode keyword “**2052**” to search accommodation where are located in postcode 2052



Now you may find the search result like this:

The screenshot shows the search results page for "Surry Hills". At the top, there is a search bar with the placeholder "Input your search keywords here" and a "Search" button. To the right are "Sign in" and "Sign Up" links. Below the search bar is the title "Search Result of property in Surry Hills". On the left, a "Sort by:" dropdown is set to "Default" with a "Search Filter Functionality" button highlighted by a red box. The results are displayed in three cards:

- Property 1:** Image of a room with a desk and plants. Details: 5 persons, Surry Hills, 17 Beauchamp Lane, Price: \$356 per night, Spare: 2018-10-18 to 2018-10-24, Rating: Not Marked ★
- Property 2:** Image of a bathroom with two dogs. Details: 5 persons, Surry Hills, 15 Hill Street, Price: \$327 per night, Spare: 2018-10-29 to 2018-10-31, Rating: 1.0 / 5.0 ★
- Property 3:** Image of a bathroom with a large tub. Details: 3 persons, Surry Hills, 7 Eddy Avenue, Price: \$267 per night, Spare: 2018-12-20 to 2018-12-23, Rating: 1.0 / 5.0 ★

Below the first card, there are two more cards partially visible, each showing a thumbnail image.

If you scroll down, you can see the pagination functionalities that can help user to get different page.



5 persons, Surry Hills  
21 Sophia Lane  
Price: \$398 per night  
Spare: 2018-10-27 to 2018-11-03  
Rating: 4.5 / 5.0 ★



6 persons, Surry Hills  
19 Beauchamp Lane  
Price: \$317 per night  
Spare: 2018-11-02 to 2018-11-09  
Rating: Not Marked ★



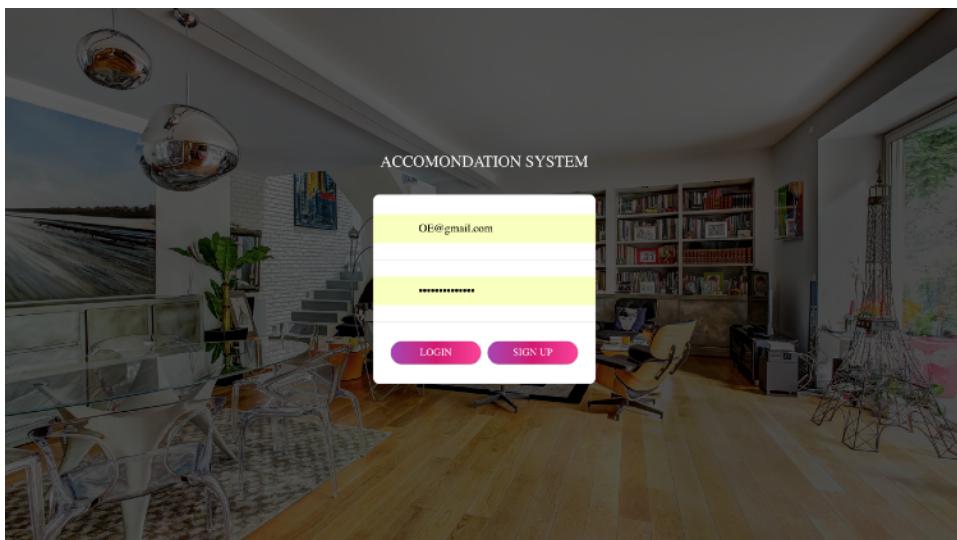
7 persons, Surry Hills  
13 Ann Street  
Price: \$322 per night  
Spare: 2018-11-05 to 2018-11-11  
Rating: 1.0 / 5.0 ★

Pagination Functionality

First Previous 1 2 3 Next Last

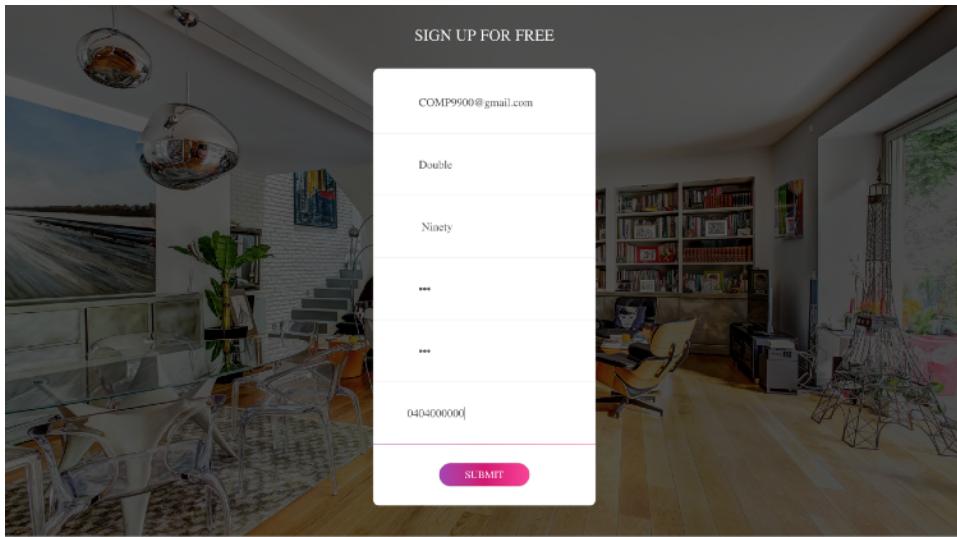
## 2. Login / Sign Up functionalities

If you click the “sign in/ sign up” button, you may jump to the login page or sign up page like this:

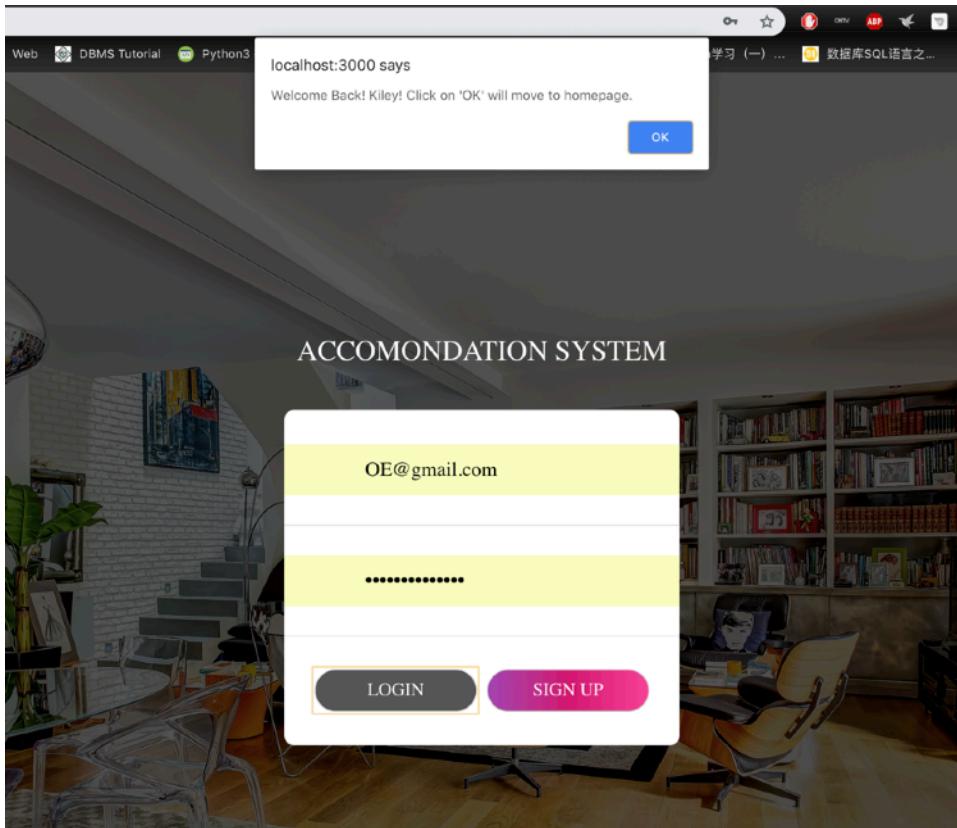


Here you may can use any user information that you can get in **mongoDB** or use a tool called **Robo 3T** to visualise database.(Root account: [root@gmail.com](mailto:root@gmail.com) password: root)

Below is the example for sign up function, here we did some necessary check for register



If you login to our system using user's information that we have stored into our system, you may get the information that indicates that you successfully logged in:



Now we will back to our homepage

### 3. Accommodation Details functionality

If you randomly click one accommodation, you may jump to the “Accommodation Details Page”, where you can check all information about this property and reviews written by other users.



## 23 Gardeners Road

Accommodation Details Display Functionality



Accommodation Photos Banner

## Description:

Lovely stay. Really well situated Everything is as described. Two hitches were the lack of privacy from the neighbours walking around outside your bedroom window when it was open for fresh air, and because it was really hot particularly in the afternoon when the sun streamed in we had to have everything wide open.

Accommodation Description

Address:	23 Gardeners Road
Suburb:	Mascot
Postcode:	2032
Capacity:	5 persons
Owner:	ZeGf@qq.com
Start Date:	2018-12-07
End Date:	2018-12-14
	<a href="#">Accommodation Details</a>



Geographic Information

Add to Watching List

Add to Watching List Button

## 2 reviews from people who commented this accommodation

3.0/5.0



Tressie Bridgewater

2018-08-02



Nicely renovated in a cool neighbourhood close to metro and lots of transit. Comfortable bed and well prepared small kitchen – I appreciated the coffee and tea. Host was super responsive and it was all great. I'd stay again.



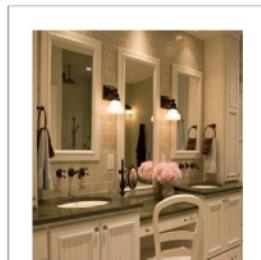
Liza Tomopoulos

2018-09-13



A exciting and stark apartemnt. However, the poor customer service

## Some Similar Near From You :



Besides, you may can click “Add to watching list” to your watching list if you want to rent this house probably.

Now we are going to try to add this property to our watching list

#### 4. Watching / Pending List functionalities (Booking Available Accommodation System)

If we clicked “Add to watching List” Button, you may find that we are reminded that this accommodation has been added to watching list.

Now, you can put your mouse over the name of user in the top right of navigation bar,

You may find that the user’s menu has been extended, please click “watching list” to jump to your watching list.

The screenshot shows a travel booking website interface. At the top, there is a header with the UNSW Sydney logo, a dropdown menu labeled "Traveller", a search bar with placeholder "Input Suburb or Postcode", a "Search" button, a user profile picture of a person named "Kiley", and a "Watching List" button. Below the header, the title "Watching List" is displayed. A table lists a single item: "Mascot" (Suburb), "2032" (Postcode), "23 Gardeners Road" (Address), "2018-12-07" (Start Time), and "2018-12-14" (End Time). To the right of the address, there is a "Remove" button. To the left of the suburb, there is a "Ticked Selector" checkbox. At the bottom of the table, there are buttons for "Add to Pending List", "Back", "Convert your property to pending list", and "Back to Homepage".

You may can click “Remove” to remove the chosen booking transaction.

You may can tick the selector in the left of every record to choose the watched transaction to pending list.

You may click “Back” to return the homepage.

You may click the “Add to pending list” to add the chosen watched transaction to pending list.

When you clicked “Add to pending list”, you may find the “Add to pending list” button has been changed to “Please check your transaction in pending list”, now, you may can choose click it to go to pending list.

The screenshot shows the same travel booking website interface as before, but the "Watching List" page now displays a message: "Please check your transaction in Pending List". Below this message, there is a button labeled "Click here to jump to Pending List".

## Your Pending Transaction



5 persons, Mascot  
23 Gardeners Road  
Price: 341 AUD  
Pending Time: 2018-12-07 --- 2018-12-14  
Owner Email: ZeGf@qq.com

Pay your transaction(Transaction will be successfully added to database)

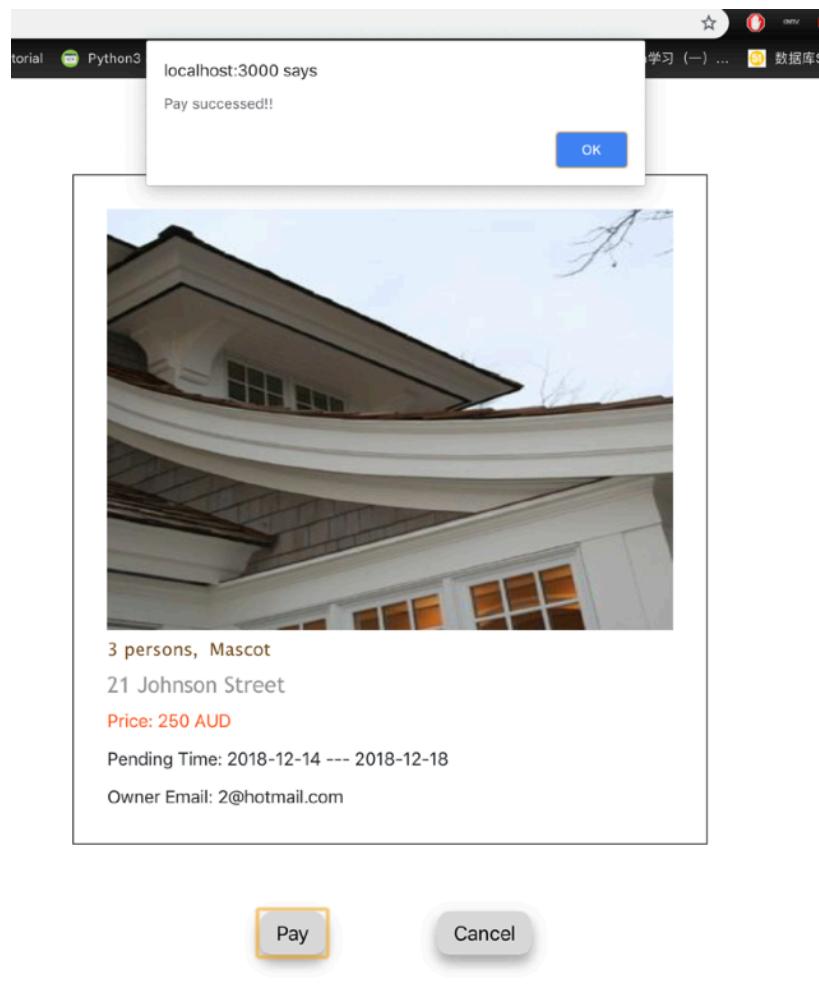
Pay

Cancel

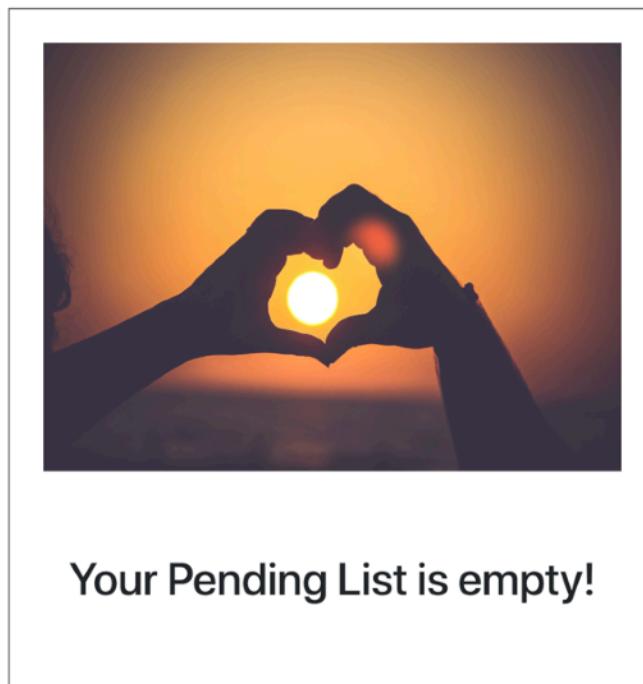
Cancel your transaction with provider

Here you can choose pay your money to provider, which means the transaction will be successfully completed, and it will be recorded to database.

Now, for demonstration, I will choose “cancel” to cancel our transaction ,and then I will add another property to property again, finally ,I will click pay to finish our booking.



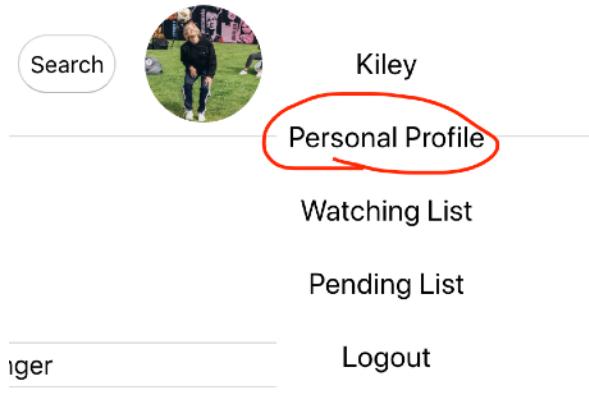
## Your Pending Transaction



Your Pending List is empty!

[Back to Watching List](#)

Now we click “Back to watching list” to back to our watching list. You may find that your watching list is empty, now we are going to check our transaction in profile, please click “personal profile”



### 5. Personal Profile and Posting Functionalities

Now we are moving to personal profile, here we designed a lot of functionalities that user can make interaction with our application.

You may notice that there is a toggle selector where you can switch your role from traveller to provider or vice versa

Now we are going to walk through the functionalities that we designed for user as traveller.

#### History:

Suburb	Price	Address	StartTime	EndTime	Status	Review
Pyrmont	308 AUD	17 Herbert Street	2018-10-05	2018-10-09	Finished	<button>Check Review</button>
Campbelltown	315 AUD	7 Broughton Street	2018-08-26	2018-08-31	Finished	<button>Check Review</button>
Parramatta	290 AUD	13 Hassall Street	2018-08-13	2018-08-18	Finished	<button>Check Review</button>
North Ryde	392 AUD	7 David Avenue	2018-08-06	2018-08-10	Finished	<button>Check Review</button>
Baulkham Hills	261 AUD	3 Beazley Place	2018-07-20	2018-07-26	Finished	<button>Check Review</button>
Newcastle	363 AUD	11 Newcomen Street	2018-07-26	2018-07-30	Finished	<button>Check Review</button>
Surry Hills	324 AUD	9 Bedford Street	2018-07-11	2018-07-15	Finished	<button>Check Review</button>
Mascot	341 AUD	23 Gardeners Road	2018-12-07	2018-12-14	Cancelled	<button>Cancelled</button>
Mascot	250 AUD	21 Johnson Street	2018-12-14	2018-12-18	Finished	<button>Write Review</button>

[Release Accommodation Needed Information](#)

Here you may notice that all transaction about this user has been listed in the “history” table.

There are four different status for a transaction:

**Cancelled:** The booking transaction was failed.

**Success but not review written:** The transaction was successfully booked, however the transaction has not been commented by traveller, it will displayed “Write Review” in Review area.

**Success and the review has been written:** The transaction was successfully booked, and the review has been written.

**Pending:** The transaction has been added to watching list, need user to check in pending list.

If you clicked the “Write review” you may find that there is a review window popped up on the above area like this:

### Review area:

Write your comment here...

Your rating for your accomodation experience is: normal

★★★★★

Submit

If you clicked the “Check Review”, your review will be popped up as well, however, you probably could not edit in review area, like this:

#### Your Review for this wonderful accomodation was:

Edyth apartment was clean, comfortable, and in a great location. He communicates quickly and is very accommodating. Thanks again!

Rating: 3.0 / 5.0

★★★★★

Now, you can click the bottom button to jump to our “release accommodation needed information functionality”

#### History:

Suburb	Price	Address	StartTime	EndTime	Status	Review
Pyrmont	308 AUD	17 Herbert Street	2018-10-05	2018-10-09	Finished	<a href="#">Check Review</a>
Campbelltown	315 AUD	7 Broughton Street	2018-08-26	2018-08-31	Finished	<a href="#">Check Review</a>
Parramatta	290 AUD	13 Hassall Street	2018-08-13	2018-08-18	Finished	<a href="#">Check Review</a>
North Ryde	392 AUD	7 David Avenue	2018-08-06	2018-08-10	Finished	<a href="#">Check Review</a>
Baulkham Hills	261 AUD	3 Beazley Place	2018-07-20	2018-07-26	Finished	<a href="#">Check Review</a>
Newcastle	363 AUD	11 Newcomen Street	2018-07-26	2018-07-30	Finished	<a href="#">Check Review</a>
Surry Hills	324 AUD	9 Bedford Street	2018-07-11	2018-07-15	Finished	<a href="#">Check Review</a>
Mascot	341 AUD	23 Gardeners Road	2018-12-07	2018-12-14	Cancelled	<a href="#">Cancelled</a>
Mascot	250 AUD	21 Johnson Street	2018-12-14	2018-12-18	Finished	<a href="#">Write Review</a>

Release Accommodation Needed Information

After clicked the button, we are moved to the release information page,

## Accommodation Needed Release Information

Suburb:	<input type="text"/>
Postcode:	<input type="text"/>
Capacity:	<input type="text" value="1"/>
Start Time:	<input type="text" value="YYYY-MM-DD"/>
End Time:	<input type="text" value="YYYY-MM-DD"/>
Min Price:	<input type="text" value="Whole Number"/>
Max Price:	<input type="text" value="Whole Number"/>
Advanced Details:	<input type="text"/>

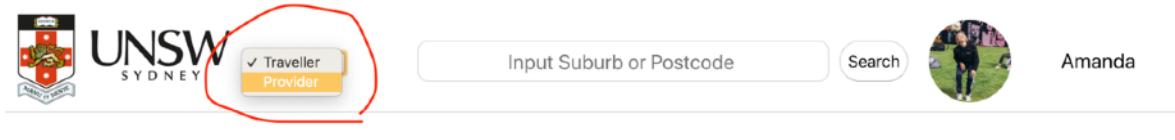
Submit

Back

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Here you can input your personal demands and post them.

If you want to check others post, you may switch search role from traveler to provider:



Then you may input search suburb keywords and postcode keywords to search area. For example, I did post a demand in “Kingsford”, now I am going to search it.

When I typed “Kingsford” in this area, you may see:



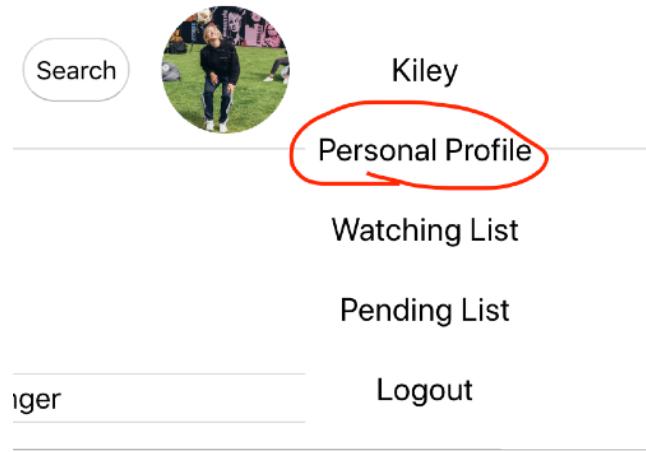
## Accommodation Needed Requirements

Suburb	Postcode	Capacity	Start Time	End Time	Min Price	Max Price
Kingsford	2052	3	2018-10-20	2018-10-21	300	500

Above is all functionalities that we designed for a traveller

Now we are going to introduce the functionalities that we designed for a provider.

Back to Personal Profile via clicking user menu in the top right section of navigation bar:



You can change your role in personal profile like this:

Personal Profile

Profile For :  Traveller  Provider



Name:	Amanda Tor
Gender:	female
Email:	OE@gmail.com
Phone:	499009900

Submit

You may can check the property that you owned here:

Profile For :

Name: Amanda Tor  
Gender: female  
Email: OE@gmail.com  
Phone: 499009900

Owned Accommodation:

Suburb	Address	Start Time	End Time	Advertisement	Pay
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Release New Property

And if you clicked the “Release New Property” button, we can get into the property release information page like this:

localhost:3000/release/provider

localhost:3000 says  
New Property information Released!

OK

Search

Amanda

### Property Release Information

Release New Property

Address: UNSW Drum Lab  
Suburb: Kingsford  
Postcode: 2033  
Capacity: 4

Submit

Owned Property :

Suburb	Address	Capacity	Add Time
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Back

Now you may can input the information about the property that you want to post on our website. When you submit your post request, it will pop up a message to remind that you post successfully.

And back to the management page (click ok), you may can add available accommodation transaction date and price via clicking “add spare time”, like below:

## Property Release Information

Release New Property

Owned Property :

Suburb	Address	Capacity	Add Time
Kingsford	UNSW Drum Lab	4	<input type="button" value="Add Spare Time"/>
Start Time: 2018-10-20		End Time: 2018-10-21	Price: \$ 600
			<input type="button" value="Submit"/>

Click Submit to submit your post, now, you may can search the property that you just put by input search suburb or postcode in navigation search bar, in the demo example, I search “Kingsford” to search this property.

The screenshot shows a search interface for "Search Result of property in Kingsford". At the top, there's a logo for UNSW Sydney, a "Traveller" button, a search bar containing "Kingsford", a "Search" button, and a user profile for "Amanda". Below the search bar, there's a sorting option "Sort by: Price High to Low". Three property cards are displayed:

- Property 1:** UNSW Drum Lab, Kingsford. Capacity: 4 persons. Price: \$600 per night. Spare: 2018-10-20 to 2018-10-21. Rating: Not Marked ★. This card is highlighted with a red circle.
- Property 2:** 25 Bunnerong Road, Kingsford. Capacity: 5 persons. Price: \$389 per night. Spare: 2018-11-13 to 2018-11-18. Rating: 3.0 / 5.0 ★.
- Property 3:** 29 Isis Lane, Kingsford. Capacity: 3 persons. Price: \$384 per night. Spare: 2018-12-26 to 2018-12-30. Rating: 3.0 / 5.0 ★.

Here, your post has been displayed in the search result!

### 6. Advertisement Function(Payment Function)

Now we are going to top up to our “UNSW Drum Lab” accommodation, to make it show up in the front page.

Back to our personal profile, switch your role from “traveller” to “provider”, you may find there is a record that you can check, also you can top up money for your property.

Since our advertisement in homepage sorted by the money that user pay for their property they owned, hence, the more money you top up, the higher probability that your property show up on homepage.

Now I am going to do the demonstration to top up our property:

### Personal Profile

Profile For :



Name:	Amanda Tor
Gender:	female
Email:	OE@gmail.com
Phone:	499009900

**Owned Accommodation:**

Suburb	Address	Start Time	End Time	Advertisement	Pay
Kingsford	UNSW Drum Lab	2018-10-20	2018-10-21	0	<input checked="" type="button" value="\$15"/> \$25 <input type="button" value="\$50"/> <input checked="" type="button" value="\$100"/>

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After many topped up, our advertisement value has been : 300 (if you want to see it show up, I recommend that you top up at least 300 as we randomly initialise advertisement value for some property in database)

### PERSONAL PROFILE

Profile For :



Name:	Amanda Tor
Gender:	female
Email:	OE@gmail.com
Phone:	499009900

**Owned Accommodation:**

Suburb	Address	Start Time	End Time	Advertisement	Pay
Kingsford	UNSW Drum Lab	2018-10-20	2018-10-21	300	<input type="button" value="\$15"/> \$25 <input type="button" value="\$50"/> <input checked="" type="button" value="\$100"/>

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Now, click the top-left “UNSW” to back our homepage, you will see the property that we just topped showed up on the first place of advertisement area.

Advertisement :



4 persons, Kingsford  
UNSW Drum Lab  
Price: \$600 per night  
Spare: 2018-10-20 to 2018-10-21  
Rating: Not Marked ★



4 persons, Newcastle  
11 Newcomen Street  
Price: \$305 per night  
Spare: 2018-10-17 to 2018-10-20  
Rating: 2.5 / 5.0 ★



5 persons, Sydney  
29 De Mestre Place  
Price: \$265 per night  
Spare: 2018-10-17 to 2018-10-22  
Rating: 2.5 / 5.0 ★

### References of All third-party resources used in the project implementation

- Google API
- React Express Starter: [https://github.com/bradtraversy/react\\_express\\_starter](https://github.com/bradtraversy/react_express_starter)
- Bootstrap v4.1.3