**WayPoint Installation Guide**

**Part 1: Software Needed**

Install the following:

1. VSCode <https://code.visualstudio.com/>

2. Node.js and npm <https://nodejs.org/>

3. React Native CLI <https://reactnative.dev/docs/environment-setup>

4. Xcode <https://apps.apple.com/ca/app/xcode/id497799835>

5. CocoaPods <https://guides.cocoapods.org/using/getting-started.html>

6. PostgreSQL (Postgres.app or Homebrew) <https://postgresapp.com/> or <https://formulae.brew.sh/formula/postgresql>

7. pgAdmin (GUI for PostgreSQL) – https://www.pgadmin.org/download/

8. Ruby <https://www.ruby-lang.org/en/downloads/>

**Part 2: Backend Setup**

**Step 1:** Clone the GitHub repository and open the backend folder.  
Repository URL:  
<https://github.com/russellhanj/W25_4495_S1_SimoneL>

**Step 2:** Open the Implementation/backend folder in VSCode.

**Step 3:** Create a Python virtual environment.  
In your terminal (inside the backend folder), run the following:

* For macOS:  
  python3 -m venv venv  
  Then activate it using:  
  source venv/bin/activate

**Step 4:** Install backend dependencies.  
With the virtual environment activated, run:  
pip install -r requirements.txt

**Step 5:** Create a new PostgreSQL database using pgAdmin.

* Open **pgAdmin**
* Connect to your PostgreSQL server
* Right-click on "Databases" → Select **Create** → **Database**
* Name your database (e.g., waypoint\_db)
* Keep the default owner as your local username (e.g., russellhanjosef)
* Click **Save**

**Step 6:** Create a .env file in the root of the backend folder.  
Include the following variables (replace values with your own):

# PostgreSQL Database

DATABASE\_URL=postgresql://<your\_db\_username>@localhost:5432/<your\_db\_name>

# API Keys

GOOGLE\_PLACES\_API\_KEY=<your\_google\_places\_api\_key>

GOOGLE\_MAPS\_API\_KEY=<your\_google\_maps\_api\_key>

EVENTBRITE\_API\_KEY=<your\_eventbrite\_api\_key>

OPENWEATHERMAP\_API\_KEY=<your\_openweathermap\_api\_key>

OPENAI\_API\_KEY=<your\_openai\_api\_key>

# Environment Settings

DEBUG=True # Change to False in production

# AWS S3 (Image Upload)

AWS\_ACCESS\_KEY\_ID=<your\_aws\_access\_key>

AWS\_SECRET\_ACCESS\_KEY=<your\_aws\_secret\_key>

AWS\_BUCKET\_NAME=<your\_s3\_bucket\_name>

AWS\_REGION=<your\_s3\_region>

**Step 7:** Start the PostgreSQL server on your local machine.

* If you installed Postgres via **Postgres.app**, open the app and make sure the server is running.
* If you used **Homebrew**, run:  
  brew services start postgresql
* You can confirm it's running by connecting through a tool like psql or your DB client.

**Step 8:** Once PostgreSQL is running, start the FastAPI backend.  
Use the command:  
uvicorn main:app --reload

**Backend GitHub Reference:** <https://github.com/russellhanj/W25_4495_S1_SimoneL/tree/main/Implementation/backend>

Part 3: Frontend Setup

**Step 1:** Open the Implementation/frontend folder using VSCode.

**Step 2:** Install the project’s JavaScript dependencies.  
In the terminal, type npm install and press Enter.

**Step 3:** Install Bundler if it's not already installed.  
In the terminal, type gem install bundler and press Enter.

**Step 4:** Inside the frontend folder, install the Ruby dependencies using Bundler by typing bundle install.

**Step 5:** Navigate to the ios folder and install iOS-specific dependencies using CocoaPods.  
Type cd ios, then type bundle exec pod install, and finally return to the root folder by typing cd ...

**Step 6:** Create a .env file inside the root of the frontend folder.  
Paste the template below and replace the values with your actual API keys and Firebase configuration:

GOOGLE\_PLACES\_API\_KEY=<your\_google\_places\_api\_key>

GOOGLE\_MAPS\_API\_KEY=<your\_google\_maps\_api\_key>

OPENAI\_API\_KEY=<your\_openai\_api\_key>

FIREBASE\_API\_KEY=<your\_firebase\_api\_key>

FIREBASE\_PROJECT\_ID=<your\_firebase\_project\_id>

FIREBASE\_DATABASE\_URL=<your\_firebase\_database\_url>

FIREBASE\_STORAGE\_BUCKET=<your\_firebase\_storage\_bucket>

FIREBASE\_MESSAGING\_SENDER\_ID=<your\_firebase\_messaging\_sender\_id>

FIREBASE\_APP\_ID=<your\_firebase\_app\_id>

FIREBASE\_IOS\_BUNDLE\_ID=<your\_ios\_bundle\_id>

**Step 7:** Run the app on the iOS simulator by typing npx react-native run-ios.

Make sure the backend and PostgreSQL server are already running before launching the app.

**Frontend GitHub Reference:**  
<https://github.com/russellhanj/W25_4495_S1_SimoneL/tree/main/Implementation/frontend>