

APPLICATION TO INSTALL

RUBY 3.1.2 or 3.1.4 - <https://www.ruby-lang.org/>

Ruby is a dynamic, object-oriented programming language known for its simplicity and productivity, often used for web development.

NOTE: Install ruby through command line in a terminal instead of a direct download.

SQLITE3 - <https://www.sqlite.org/>

SQLite3 is a lightweight, serverless, self-contained, and open-source relational database management system (RDBMS) that does not require a separate server process and is commonly used in embedded systems and as a local database for applications.

NOTE: Install sqlite3 through command line in a terminal instead of a direct download.

RUBY ON RAILS - <https://rubyonrails.org/>

Ruby on Rails is a web application framework written in Ruby that follows the convention over configuration (CoC) and don't repeat yourself (DRY) principles, emphasizing simplicity and productivity.

NOTE: Install rails through command line in a terminal instead of a direct download.

NGROK - <https://ngrok.com/>

Ngrok is a tunneling and reverse proxy service that exposes local servers to the internet, facilitating secure and temporary access to locally hosted web applications.

- Sign up.
- Authenticate your account.

ANDROID STUDIO - <https://developer.android.com/studio>

NOTE: For the simulator purpose only, not coding.

Android Studio is the official integrated development environment (IDE) for Android app development, equipped with an emulator for testing and running Android applications on virtual devices.

EXPO GO –

Install Expo Go on your phone through app store for iphone or google play for android

COMMAND LINE

NGROK

To start the application and view the forwarding URL:

```
ngrok http 3000
```

RAILS (backend side)

First, there are two files to verify and possibly modify to ensure that the Ruby version matches the one installed on your computer:

1. `.ruby-version`: Change the Ruby version to match the one you have installed.
 - a. Example: `ruby-3.1.2`
2. `Gemfile.rb`: At line 4, update the Ruby version to match the one installed on your computer.
 - a. Example: `ruby-3.1.2`

Both files should have the same Ruby version.

Installing packages from the Gemfile (like `package.json`):

```
bundle install
```

Creating the database:

- Dropping the database (only if you want to restart from scratch)

```
rails db:drop
```
- Creating the database

```
rails db:create
```
- Creating the tables

```
rails db:migrate
```
- Seeding the database

```
rails db:seed
```
- Command line chained together:

```
rails db:drop db:create db:migrate db:seed
```

Starting the server

`rails server` or `rails s`

Starting client side (expo)

`npm start`

Routes

If you want to see the routes of all the endpoint, you can do the command line:

`rails routes`

Or, they are in the Postman collection that you import into Postman.

FILES TO MODIFY

USING NGROK

If you are using a phone as a device, you will use ngrok to create a tunnel between the URL provide by ngrok and your localhost.

Server-side folder/file

```
./config/environments/development.rb
```

Modify this line:

```
config.hosts << " YOUR NGROK FORWARDED URL WITHOUT HTTP://"
```

NOTE: Every time you are stopping ngrok and start it again, the forwarding URL will change. Remember to change it in the development.rb file otherwise, your calls to the endpoints won't work.

.ENV

Since we are forwarding an URL, we need a way to use it in the frontend. We will install a library

(package) called: `react-native-dotenv`

With that package, you can create a .env file in the root of your expo project.

NOTE: Use the variable EXPO_PUBLIC_NGROK_URL in your .env file.

Write the full forwarding URL in the .env file. Here an example, you URL should be different:

```
EXPO_PUBLIC_NGROK_URL='https://1234-423-524-42g2.ngrok-free-.app'
```

USING ANDROID SIMULATOR

With the simulator, you can write your fetch using localhost:3000, like in your MERN project.

Now you should be able to fetch:

```
fetch(`http://localhost:3000/api/login`, {...}
```

or

```
fetch(`${process.env.EXPO_PUBLIC_NGROK_URL}/api/login`, {...}
```

WINDOWS USERS

Since you have installed Ruby and Rails on WSL (or Windows), to properly start the application with your phone, you need to install the required package: `@expo/ngrok@^4.1.0`

Into **package.json**, add this line in the script section:

```
"tunnel": npx expo start --tunnel
```

Now start the project with: `npm run tunnel`