

Real Time Courier Tracking Mobile Application

Proposer

N.N.D.G. Liyanage [10707256]

Proposed supervisor

Dr. Rasika Ranaweera

Problem statement

My proposal for the final year project is a Real Time Courier Tracking Mobile Application to improve connectivity between courier service provider and customer. Using courier service for delivery is expanding business service in Sri Lanka. Courier services are being used widely by the people in Sri Lanka. So, using an app for courier service industry can be a boost. So, by using an app the following problems can be eradicated easily.

- ✓ The first problem is difficulty in finding the location of customer and courier service and vice versa.
- ✓ There is no correct idea of the time between the goods are handed over to the courier service and to the customer. That means wastage of time and the courier service provider can't manage the delivery of goods within working hours.
- ✓ The third problem is the customer has no correct idea whether delivery charges are paid or not. Until courier service provider meets the customer.
- ✓ The fourth problem is the people in remote areas are unaware of the closest courier service center.

Project description

Real time courier tracking mobile application is an android and iOS based mobile application. I have developed this project in React native and Node.js. The main purpose of react is to be fast, scalable, and simple. I will choose to build tracking API with Google API.

I hope to develop this app to use by courier service, courier service provider and the customer. The main objective of developing mobile application on the courier tracking system facilities' both the customer and the courier service. With the increase of using courier service the demand of a simple and easier methods for courier industry has been increased. Because of these I would like to propose my project to develop an app on courier tracking system. I hope this app would help all to minimize the problems arising with the use of courier service.

In this project there are various types of modules available to manage courier, delivery and customer. Courier module can manage courier, Tracking module is normally developed for managing tracking, Customer module manages customer operations , Delivery module has been implemented to manage delivery.

Modules of the Courier Tracking System

- ✓ Courier Module: All the operations related to courier, is managed by this module.
- ✓ Tracking Module: Tracking module is used to manage the tracking.
- ✓ Customer Module: It has been developed for managing customer.
- ✓ Delivery Module: It manages the delivery.
- ✓ Office Module: Office operations will be managed by office module.

Features of Courier Tracking Mobile Application

- ✓ Just like in any other app, it all starts with a login. Among all possible login options (like social, password less , email, etc.) I recommended sticking to the phone number or email and password login.
- ✓ Courier tracking mobile application is based on app, from which user can easily manage Tracking details, and Customer details.
- ✓ Admin user will be able to track all information of Courier, Tracking etc.
- ✓ Search module has been implemented to search courier, delivery, office.
- ✓ Admin has rights to edit, add, delete, and update records of customer, delivery, and office.
- ✓ The courier service provider will be able to show the numbers of parcels to be delivered per day in a convenient way that can be delivered by a map in the order of address and distance.
- ✓ After the logging app the customer must create an account a QR code is sent to the customer by courier service after filling the details. After the customer receiving the parcel the courier service provider must scan the QR code. Then a message sent to the courier service after every successful delivery.
- ✓ I hope to be implementing push notification feature when you develop a courier tracking system. Its main purpose is to keep courier service providers updated on the most important matters (New delivery orders, Changes in current orders, Status updates). It helps couriers never miss and timely react to anything important.
- ✓ This app allows the customer to pay the delivery fee cash or online payment methods.

- ✓ This set of features is the very special part of the courier tracking mobile application.

From here a courier can access an active order.

- Oder Number
- Oder Description
- Name of the recipient
- The recipient's mobile phone number
- Estimated delivery time
- Payment details
- Pick-up location
- Drop-up location
- Notes

Project keywords

React Native, Node.js, Firebase (Languages) QR Reader, Push Notification (Technology)
, Android, iOS, Google API (Tracking system).

Requirements

I have to learn about React Native and database connection thoroughly.

Finance

Cost for internet facilities and for required software.

External organizations

None

Other staff

None