**SkyFinder – Airplane Aggregator Application**

**Objective:** SkyFinder is a web-based application that aggregates and displays data related to flights and airlines from different sources. The application provides users with a single platform to search, compare, and book flights based on their preferences such as price, duration, and ratings.

**Key Features:**

* User registration and login
* Users can search for flights by giving input like origin, destination, and travel date.
* The user doesn’t need to be logged in to search for flight.
* By default, the application will suggest users the best departing flights based on price, duration, and previous user ratings of their journey experience.
* Users can sort the flights based on price (Low to High), Duration (Low to High), and Ratings (High to Low).
* User could book the flight only if he is logged in, otherwise it will open login page.
* User can see list of flight bookings made through his account.
* User can cancel his flight booking by going to bookings page.
* User can manage his profile, update his personal details, and password.
* User will be logged out of the application after 2 mins of inactivity.
* Email notifications to the user when he creates an account, books a flight, and cancels a flight booking.
* Admin can view all the users and delete the users.
* Admins of the respective airplane companies can add new flight information, update flight data like status, delete flight (CRUD).

**Technologies Used:**

Backend: Spring Boot, Spring REST, Spring JPA, Spring Security, JWT, Hibernate,

Frontend: React

Database: H2

**Architecture**

SkyFinder

Backend Aggregator



ReactJS

Frontend

Postman

Postman

Postman

JetStream

Backend Airplane Company



HorizonAir

Backend Airplane Company



SkyWave

Backend Airplane Company



**Terminology**



* Spring Boot + Spring REST + Spring JPA + Spring Security + JWT + Database
* Front End Technology communicating with Spring Boot Application via REST API

* Front End Technology –React JS / Postman