Flight Ticket Booking Using RestApi

FlightModelClass

package com.example.demo.model;

import jakarta.persistence.Entity;

import jakarta.persistence.Id;

import jakarta.persistence.Table;

@Entity

@Table(name="FlightDetails")

public class FlightModel {

@Id

private int flightId;

private String flightName;

private String fromCity;

private String toCity;

private String departureTime;

private String arrivalTime;

private String travelDuration;

private int economyFare;

private int businessFare;

public FlightModel() {

super();

// TODO Auto-generated constructor stub

}

public FlightModel(int flightId, String flightName, String fromCity, String toCity, String departureTime,

String arrivalTime, String travelDuration, int economyFare, int businessFare) {

super();

this.flightId = flightId;

this.flightName = flightName;

this.fromCity = fromCity;

this.toCity = toCity;

this.departureTime = departureTime;

this.arrivalTime = arrivalTime;

this.travelDuration = travelDuration;

this.economyFare = economyFare;

this.businessFare = businessFare;

}

public int getFlightId() {

return flightId;

}

public void setFlightId(int flightId) {

this.flightId = flightId;

}

public String getFlightName() {

return flightName;

}

public void setFlightName(String flightName) {

this.flightName = flightName;

}

public String getFromCity() {

return fromCity;

}

public void setFromCity(String fromCity) {

this.fromCity = fromCity;

}

public String getToCity() {

return toCity;

}

public void setToCity(String toCity) {

this.toCity = toCity;

}

public String getDepartureTime() {

return departureTime;

}

public void setDepartureTime(String departureTime) {

this.departureTime = departureTime;

}

public String getArrivalTime() {

return arrivalTime;

}

public void setArrivalTime(String arrivalTime) {

this.arrivalTime = arrivalTime;

}

public String getTravelDuration() {

return travelDuration;

}

public void setTravelDuration(String travelDuration) {

this.travelDuration = travelDuration;

}

public int getEconomyFare() {

return economyFare;

}

public void setEconomyFare(int economyFare) {

this.economyFare = economyFare;

}

public int getBusinessFare() {

return businessFare;

}

public void setBusinessFare(int businessFare) {

this.businessFare = businessFare;

}

}

BookingsModelClass

package com.example.demo.model;

import jakarta.persistence.Entity;

import jakarta.persistence.Id;

import jakarta.persistence.Table;

*@Entity*

*@Table*(name="BookingDetails")

public class BookingModel {

*@Id*

private int bookingId;

private int flightId;

private String fromCity;

private String toCity;

private String customerName;

private String paymentStatus;

private String bookingDate;

private String travelDate;

private int contactNumber;

private int totalAmount;

public BookingModel() {

super();

// **TODO** Auto-generated constructor stub

}

public BookingModel(int bookingId, int flightId, String fromCity, String toCity, String customerName,

String paymentStatus, String bookingDate, String travelDate, int contactNumber, int totalAmount) {

super();

this.bookingId = bookingId;

this.flightId = flightId;

this.fromCity = fromCity;

this.toCity = toCity;

this.customerName = customerName;

this.paymentStatus = paymentStatus;

this.bookingDate = bookingDate;

this.travelDate = travelDate;

this.contactNumber = contactNumber;

this.totalAmount = totalAmount;

}

public int getBookingId() {

return bookingId;

}

public void setBookingId(int bookingId) {

this.bookingId = bookingId;

}

public int getFlightId() {

return flightId;

}

public void setFlightId(int flightId) {

this.flightId = flightId;

}

public String getFromCity() {

return fromCity;

}

public void setFromCity(String fromCity) {

this.fromCity = fromCity;

}

public String getToCity() {

return toCity;

}

public void setToCity(String toCity) {

this.toCity = toCity;

}

public String getCustomerName() {

return customerName;

}

public void setCustomerName(String customerName) {

this.customerName = customerName;

}

public String getPaymentStatus() {

return paymentStatus;

}

public void setPaymentStatus(String paymentStatus) {

this.paymentStatus = paymentStatus;

}

public String getBookingDate() {

return bookingDate;

}

public void setBookingDate(String bookingDate) {

this.bookingDate = bookingDate;

}

public String getTravelDate() {

return travelDate;

}

public void setTravelDate(String travelDate) {

this.travelDate = travelDate;

}

public int getContactNumber() {

return contactNumber;

}

public void setContactNumber(int contactNumber) {

this.contactNumber = contactNumber;

}

public int getTotalAmount() {

return totalAmount;

}

public void setTotalAmount(int totalAmount) {

this.totalAmount = totalAmount;

}

}

PassengerModel

package com.example.demo.model;

import jakarta.persistence.Entity;

import jakarta.persistence.Id;

import jakarta.persistence.Table;

*@Entity*

*@Table*(name="PassengerDetails")

public class PassengerModel {

*@Id*

private long passengerId;

private String passengerName;

private int age;

private String gender;

public PassengerModel() {

super();

// **TODO** Auto-generated constructor stub

}

public PassengerModel(long passengerId, String passengerName, int age, String gender) {

super();

this.passengerId = passengerId;

this.passengerName = passengerName;

this.age = age;

this.gender = gender;

}

public long getPassengerId() {

return passengerId;

}

public void setPassengerId(long passengerId) {

this.passengerId = passengerId;

}

public String getPassengerName() {

return passengerName;

}

public void setPassengerName(String passengerName) {

this.passengerName = passengerName;

}

public int getAge() {

return age;

}

public void setAge(int age) {

this.age = age;

}

public String getGender() {

return gender;

}

public void setGender(String gender) {

this.gender = gender;

}

}

FLightRepo

package com.example.demo.repository;

import org.springframework.data.jpa.repository.JpaRepository;

import com.example.demo.model.FlightModel;

public interface FlightRepo extends JpaRepository<FlightModel, Integer> {

}

BookingsRepo

package com.example.demo.repository;

import org.springframework.data.jpa.repository.JpaRepository;

import com.example.demo.model.BookingModel;

public interface BookingRepo extends JpaRepository<BookingModel, Integer>{

}

Passenger Repo

package com.example.demo.repository;

import org.springframework.data.jpa.repository.JpaRepository;

import com.example.demo.model.PassengerModel;

public interface passengerRepo extends JpaRepository<PassengerModel, Integer> {

}

FlightService

package com.example.demo.service;

import java.util.List;

import java.util.Optional;

import org.springframework.beans.factory.annotation.Autowired;

import org.springframework.stereotype.Service;

import com.example.demo.model.FlightModel;

import com.example.demo.repository.FlightRepo;

@Service

public class FlightService {

@Autowired

FlightRepo fr;

// AddoneFlight

public FlightModel addinfo(FlightModel fm)

{

return fr.save(fm);

}

public List<FlightModel> addninfo(List<FlightModel> fm)

{

return (List<FlightModel>)fr.saveAll(fm);

}

//DisplayAllFlight

public List<FlightModel> showinfo()

{

return fr.findAll();

}

//DisplayById

public Optional<FlightModel> showid(int id)

{

return fr.findById(id);

}

//updateFlight

public FlightModel changeinfo(FlightModel fm)

{

//

return fr.saveAndFlush(fm);

}

//DeleteAllFLight

public void deleteinfo()

{

fr.deleteAll();

}

//deleteFlightbyid

public void deletepvid(int id)

{

fr.deleteById(id);

}

}

FlightController

package com.example.demo.controller;

import java.util.List;

import java.util.Optional;

import org.springframework.beans.factory.annotation.Autowired;

import org.springframework.web.bind.annotation.DeleteMapping;

import org.springframework.web.bind.annotation.GetMapping;

import org.springframework.web.bind.annotation.PathVariable;

import org.springframework.web.bind.annotation.PostMapping;

import org.springframework.web.bind.annotation.PutMapping;

import org.springframework.web.bind.annotation.RequestBody;

import org.springframework.web.bind.annotation.RestController;

import com.example.demo.model.FlightModel;

import com.example.demo.service.FlightService;

@RestController

public class FlightController {

@Autowired

FlightService fs;

@PostMapping("add")

public FlightModel addflight(@RequestBody FlightModel fm)

{

return fs.addinfo(fm);

}

@PostMapping("addall")

public List<FlightModel> addFlights(@RequestBody List<FlightModel> fm)

{

return (List<FlightModel>) fs.addninfo(fm);

}

@GetMapping("show")

public List<FlightModel> displayFlights()

{

return fs.showinfo();

}

@GetMapping("show/{id}")

public Optional<FlightModel> displayFlight(@PathVariable int id)

{

return fs.showid(id);

}

@DeleteMapping("deleteall")

public String removeFlights()

{

fs.deleteinfo();

return "ALl Flights are Successfully Deleted";

}

@PutMapping("update")

public FlightModel modify(@RequestBody FlightModel fm)

{

return fs.changeinfo(fm);

}

@DeleteMapping("delete/{id}")

public String deleteById(@PathVariable int id)

{

fs.deletepvid(id);

return "Successfully deleted row with id:"+Integer.toString(id);

}

}

ApplicationProperties

spring.datasource.url=jdbc:mysql://localhost:3306/FlightTicketBooking

spring.datasource.username=root

spring.datasource.password=Llionell7339@

spring.datasource.driver-class-name=com.mysql.cj.jdbc.Driver

spring.jpa.properties.hibernate.format\_sql=true

spring.jpa.show-sql=true

spring.jpa.properties.hibernate.dialect=org.hibernate.dialect.MySQL8Dialect

spring.jpa.hibernate.ddl-auto=update

Sample Data

[

    {

        "flightId": 1,

        "flightName": "Airbus A330",

        "fromCity": "Madurai",

        "toCity": "Chennai",

        "departureTime": "09.00",

        "arrivalTime": "12.00",

        "travelDuration": "3.00 hrs",

        "economyFare": 3000,

        "businessFare": 5000

    },

    {

        "flightId": 2,

        "flightName": "Boeing 747",

        "fromCity": "NewDelhi",

        "toCity": "Kolkata",

        "departureTime": "13.30",

        "arrivalTime": "15.00",

        "travelDuration": "2.00 hrs",

        "economyFare": 2500,

        "businessFare": 4000

    },

    {

        "flightId": 3,

        "flightName": "Bombardier CRj",

        "fromCity": "Madurai",

        "toCity": "coimbatore",

        "departureTime": "16.00",

        "arrivalTime": "17.30",

        "travelDuration": "1.30 hrs",

        "economyFare": 1500,

        "businessFare": 2500

    },

    {

        "flightId": 4,

        "flightName": "Airbus A320",

        "fromCity": "Madurai",

        "toCity": "Cochin",

        "departureTime": "10.00",

        "arrivalTime": "13.00",

        "travelDuration": "3.00 hrs",

        "economyFare": 4000,

        "businessFare": 6000

    },

    {

        "flightId": 5,

        "flightName": "Cessna 172",

        "fromCity": "Madurai",

        "toCity": "Bangalore",

        "departureTime": "15.00",

        "arrivalTime": "16.45",

        "travelDuration": "1.45 hrs",

        "economyFare": 3000,

        "businessFare": 5000

    }

]