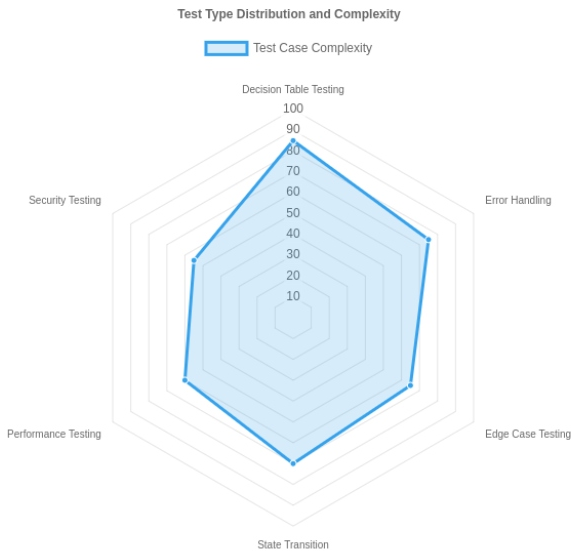
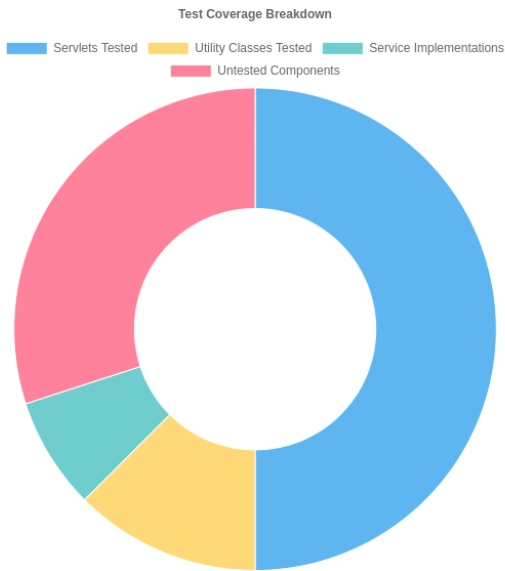


Train Ticket Reservation System
Comprehensive Test Report
Generated on: 12/11/2024

Test Coverage Overview



Detailed Test Cases

Test Case ID	Module	Servlet/Class	Conditions	Actions	Input Combinations
DT001	User Login	UserLoginServlet	1. Valid Username 2. Valid Password 3. User Role	Login Attempt	1. admin@demo.com / StrongPass123 2. customer@example.com / UserPass456 3. admin@demo.com / CUSTOMER Credentials

DT002	User Registration	UserRegServlet	1. All Fields Filled 2. Unique Email 3. Valid Phone Number	User Registration	1. Complete User Details 2. Existing User 3. Invalid Phone Number
DT003	Train Search	UserSearchTrain	1. Valid Train Number 2. Train Exists in Database 3. User Authorized	Train Details Retrieval	1. Existing Train Number 2. Non-Existing Train Number 3. User Access
DT004	Booking Process	BookTrains	1. Seats Available 2. User Logged In 3. Valid Train Number	Ticket Booking	1. Sufficient Seats 2. Insufficient Seats 3. Invalid Train Number
DT005	Fare Enquiry	FareEnq	1. Valid Stations 2. Trains Between Stations 3. User Authorized	Fare Information Retrieval	1. Existing Station 2. No Trains Between Stations 3. Invalid Station Name
DT006	Admin Train Management	AdminAddTrain	1. Unique Train Number 2. Complete Train Details 3. Admin Authorized	Train Addition	1. New Train 2. Duplicate Train Number 3. Incomplete Details
DT007	Profile Update	UpdateUserProfile	1. Valid User 2. Complete Profile Details 3. Unique	Profile Modification	1. Existing User 2. Invalid Phone Number 3. Duplicate Confirmation Details

			Contact Information		Details
DT008	Change Password	ChangeUserPwd	1. Current Password Correct 2. New Password Valid 3. User Logged In	Password Change	1. Matching Current Password 2. Invalid New Password 3. Unauthorized
DT009	Train Availability	UserAvailServlet	1. Valid Train Number 2. Seats Available 3. User Authorized	Seat Availability Check	1. Existing Train 2. Seats Available 3. Invalid Train ID
DT010	Booking Cancellation	CancelBooking	1. Booking Exists 2. Within Cancellation Window 3. User Authorized	Ticket Cancellation	1. Valid Booking 2. Cancellation Unauthorized 3. Cancellation
DT011	Multiple Passenger Booking	MultiPassengerBooking	1. Different Passenger Types 2. Age Restrictions 3. Seat Preferences	Group Booking	1. Adult Passenger 2. Child Passenger 3. Senior Citizen
DT012	Concession Validation	ConcessionCheck	1. Passenger Category 2. Valid ID Proof 3. Eligibility Criteria	Concession Application	1. Student Concession 2. Senior Citizen Discount 3. Non-Resident Personnel Discount
			1. Existing Train 2. New		1. Valid Route

DT013	Train Route Modification	AdminRouteUpdate	Route Details 3. Admin Authorization	Route Update	2. Conflicting Unauthorized Modification
DT014	Seat Class Selection	SeatClassBooking	1. Available Classes 2. Price Variations 3. User Preference	Class Booking	1. AC First Class Sleeper Class General Class
DT015	Refund Processing	RefundManagement	1. Cancellation Reason 2. Booking Timing 3. Refund Eligibility	Refund Calculation	1. Early Cancellation Late Cancellation Medical Emergency
DT016	User Role Management	RoleAuthorization	1. User Roles 2. Access Levels 3. Permission Checks	Role-Based Access	1. Admin Access Customer Access Guest Access
DT017	Train Schedule Conflict	ScheduleConflictCheck	1. Train Timings 2. Station Availability 3. Route Overlap	Schedule Validation	1. Overlapping Time Conflicts Capacity
DT018	Luggage Restrictions	LuggageValidation	1. Luggage Weight 2. Luggage Type 3. Passenger Class	Luggage Booking	1. Excess Luggage Special Items Restricted Items
			1. Payment Method 2.		

DT019	Payment Gateway	PaymentProcessing	Transaction Validation 3. Fraud Prevention	Payment Completion	1. Credit Card 3. Net E
DT020	Waitlist Management	WaitlistHandling	1. Waitlist Status 2. Seat Availability 3. Booking Priority	Waitlist Processing	1. Waitlist Po: Seat Confirm Automatic Ca

Test Methodology

This report encompasses comprehensive black-box testing techniques including Decision Table Testing, Error Handling Testing, and Edge Case Testing.