

GRAB YOUR TICKETS APPLICATION- ADMIN

Grab Your Tickets Admin Backend Documentation

Project Overview

Project Name: Grab Your Tickets

Team: Backend Development Team

Version: 1.0

Date: [Insert Date]

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1. Introduction

The Grab Your Tickets application aims to provide a platform for users to browse and book movie tickets as well as tickets for various events. This documentation specifically outlines the backend functionalities accessible to administrators for managing various aspects of the system, including theatres, films, events, payments, showtimes, and seats.

2. Technologies Used

- Java Spring Boot
- Spring Security
- Hibernate
- MySQL (SQL database)
- Git (version control system)

3. Admin Functionalities

3.1 Theatres Management

3.1.1 Add Theatre

- Description: Allows administrators to add a new theatre (cinema) to the platform.
- Steps:
 1. Collect theatre details including name, location, and other relevant information.
 2. Verify the accuracy of the collected data.
 3. Save the theatre details to the database.
- Permissions Required: ADMIN

3.1.2 Update Theatre

- Description: Enables administrators to modify existing theatre details.
- Steps:
 1. Retrieve the theatre to be updated based on its ID.
 2. Update the theatre details with the new information.
 3. Validate the updated data.
 4. Save the updated theatre details to the database.
- Permissions Required: ADMIN

3.1.3 Delete Theatre

- Description: Allows administrators to remove a theatre (cinema) from the platform.
- Steps:
 1. Find the theatre to be deleted based on its ID.
 2. Confirm the deletion action.
 3. Delete the theatre from the database.

- Permissions Required: ADMIN

3.2 Films Management

3.2.1 Add Film

- Description: Permits administrators to add a new film (movie) to the platform.

- Steps:

1. Gather film details including title, description, release date, genre, etc.
2. Validate the input data.
3. Save the film details to the database.

- Permissions Required: ADMIN

3.2.2 Update Film

- Description: Allows administrators to modify existing film details.

- Steps:

1. Retrieve the film to be updated based on its ID.
2. Fetch the updated film details.
3. Validate the updated data.
4. Update the film details in the database.

- Permissions Required: ADMIN

3.2.3 Delete Film

- Description: Enables administrators to remove a film (movie) from the platform.

- Steps:

1. Retrieve the film to be deleted based on its ID.
2. Delete the film from the database.

- Permissions Required: ADMIN

3.3 Events Management

3.3.1 Add Event

- Description: Permits administrators to add a new event to the platform.
- Steps:
 1. Gather event details including name, description, date, venue, ticket price, etc.
 2. Validate the input data.
 3. Save the event details to the database.
- Permissions Required: ADMIN

3.3.2 Update Event

- Description: Allows administrators to modify existing event details.
- Steps:
 1. Retrieve the event to be updated based on its ID.
 2. Fetch the updated event details.
 3. Validate the updated data.
 4. Update the event details in the database.
- Permissions Required: ADMIN

3.3.3 Delete Event

- Description: Enables administrators to remove an event from the platform.
- Steps:
 1. Retrieve the event to be deleted based on its ID.
 2. Delete the event from the database.
- Permissions Required: ADMIN

3.4 Payment Handling

3.4.1 Process Payment

- Description: Allows administrators to

process payments for bookings.

- Steps:

1. Retrieve the booking for which payment needs to be processed.
2. Calculate the payment amount.
3. Process the payment transaction.
4. Update the booking status accordingly.

- Permissions Required: ADMIN

3.4.2 Refund Payment

- Description: Enables administrators to refund payments for cancelled bookings.

- Steps:

1. Retrieve the booking for which payment needs to be refunded.
2. Calculate the refund amount.
3. Process the refund transaction.
4. Update the booking status accordingly.

- Permissions Required: ADMIN

3.5 Showtimes Management

3.5.1 Add Showtime

- Description: Permits administrators to add a new showtime for a film or event.

- Steps:

1. Select the film or event for which the showtime needs to be added.
2. Specify the show date and time.
3. Validate the input data.

4. Save the showtime details to the database.

- Permissions Required: ADMIN

3.5.2 Update Showtime

- Description: Allows administrators to modify existing showtime details.

- Steps:

1. Retrieve the showtime to be updated based on its ID.
2. Fetch the updated showtime details.
3. Validate the updated data.
4. Update the showtime details in the database.

- Permissions Required: ADMIN

3.5.3 Delete Showtime

- Description: Enables administrators to remove a showtime from the platform.

- Steps:

1. Retrieve the showtime to be deleted based on its ID.
2. Delete the showtime from the database.

- Permissions Required: ADMIN

3.6 Seats Management

3.6.1 Add Seat

- Description: Permits administrators to add a new seat to a theatre.

- Steps:

1. Select the theatre to which the seat belongs.
2. Specify the seat number.
3. Select the class type (GOLD, SILVER, PREMIUM).
4. Mark the seat as available or unavailable.

5. Save the seat details to the database.

- Permissions Required: ADMIN

3.6.2 Update Seat

- Description: Allows administrators to modify existing seat details.

- Steps:

1. Retrieve the seat to be updated based on its ID.
2. Fetch the updated seat details.
3. Validate the updated data.
4. Update the seat details in the database.

- Permissions Required: ADMIN

3.6.3 Delete Seat

- Description: Enables administrators to remove a seat from the platform.

- Steps:

1. Retrieve the seat to be deleted based on its ID.
2. Delete the seat from the database.

- Permissions Required: ADMIN

4. Security Considerations

- Access to admin functionalities is restricted to users with ADMIN role.
- Role-based access control is implemented using Spring Security.
- Ensure secure handling of user authentication and authorization tokens.

5. Additional Notes

- Validate all inputs thoroughly to prevent injection attacks and data corruption.
- Implement logging mechanisms to track admin activities for auditing purposes.

- Regularly review and update security measures to mitigate potential vulnerabilities.
- Perform thorough testing of admin functionalities to ensure robustness and reliability.
- Utilize Git for version control, ensuring proper branching strategies and commit hygiene.