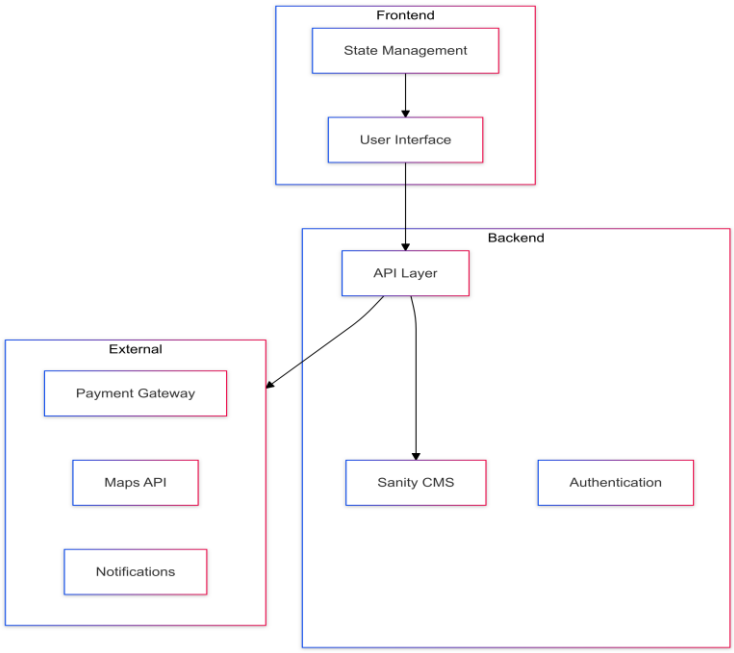
MORENT Car Rental Platform

Technical Specification Document

1. Technical Requirements

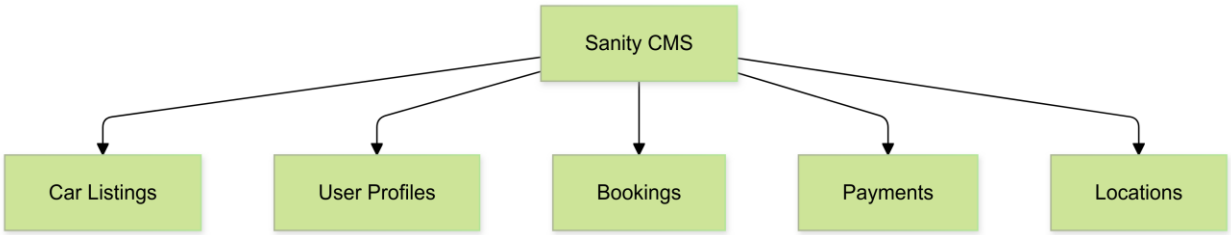
Frontend Requirements



Core Requirements:

- **Responsive Design**
  - Mobile-first approach
  - Device compatibility optimization
  - Flexible layout system
- **Key Pages Implementation**
  - Home page with search functionality
  - Category browsing interface
  - Detailed car rental views
  - Secure payment processing
  - Administrative dashboard

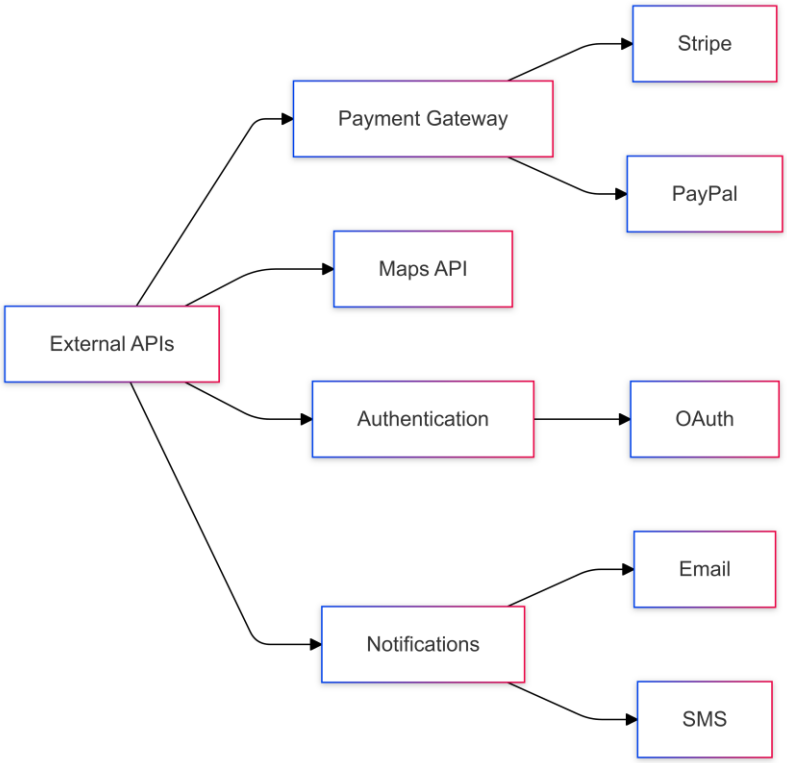
Backend Requirements (Sanity CMS)



Content Management:

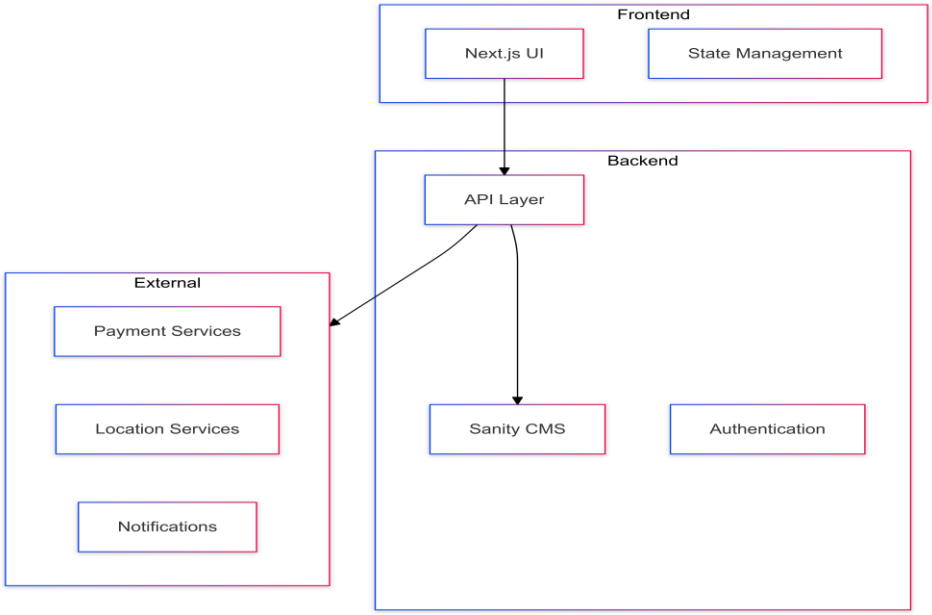
- Car listings and details
- User profile management
- Booking record tracking
- Payment information
- Location data handling

Third-Party Integrations



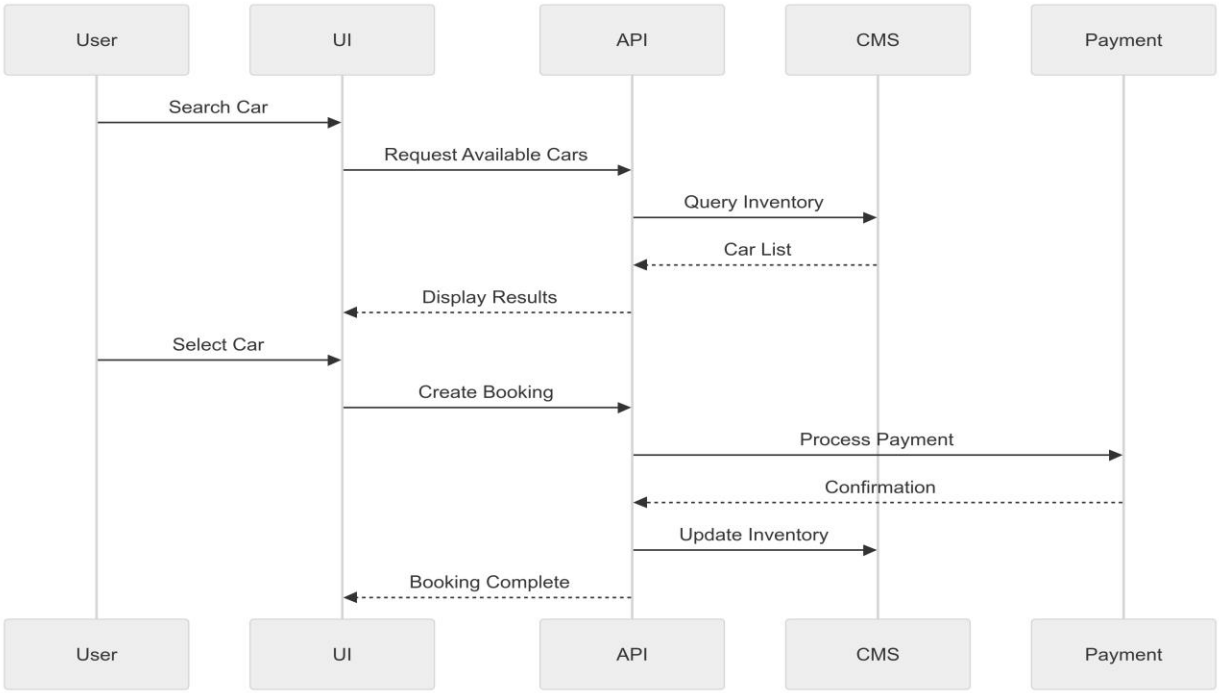
2. System Architecture

High-Level Architecture



Core Workflows

Booking Process



3. API Specification

Endpoints Overview

```
// Car Management
GET /api/cars
  Query: {
    location: string
    dates: DateRange
    category?: string
    price_range?: PriceRange
  }

GET /api/cars/:id
  Response: CarDetails

POST /api/bookings
  Body: {
    carId: string
    userId: string
    dates: DateRange
    location: string
  }

// User Management
POST /api/users
  Body: {
    name: string
    email: string
    license: string
    phone: string
  }

// Payment Processing
POST /api/payments
  Body: {
    bookingId: string
    amount: number
    method: PaymentMethod
  }
```

4. Data Schema

Car Schema

```
export default {
  name: 'car',
  type: 'document',
  fields: [
    {
      name: 'productId',
      type: 'string',
      title: 'Product ID'
    },
    {
      name: 'model',
```

```
      type: 'string',
      title: 'Car Model'
    },
    {
      name: 'category',
      type: 'string',
      title: 'Category'
    },
    {
      name: 'rentalPrice',
      type: 'number',
      title: 'Rental Price'
    },
    {
      name: 'features',
      type: 'array',
      of: [{type: 'string'}]
    },
    {
      name: 'availability',
      type: 'boolean'
    },
    {
      name: 'location',
      type: 'reference',
      to: [{type: 'location'}]
    }
  ]
}
```

Booking Schema

```
export default {
  name: 'booking',
  type: 'document',
  fields: [
    {
      name: 'bookingId',
      type: 'string'
    },
    {
      name: 'customerId',
      type: 'reference',
      to: [{type: 'customer'}]
    },
    {
      name: 'carId',
      type: 'reference',
      to: [{type: 'car'}]
    },
    {
      name: 'startDateTime',
      type: 'datetime'
```

```
    },
    {
      name: 'endDateTime',
      type: 'datetime'
    },
    {
      name: 'totalCost',
      type: 'number'
    },
    {
      name: 'status',
      type: 'string',
      options: {
        list: [
          'pending',
          'confirmed',
          'active',
          'completed',
          'cancelled'
        ]
      }
    }
  ]
}
```