

Project Name: Covid Tracker

Members:

- Tejas Siddaramaiah
- Ken Lin
- Daniel Kibatullin

Applications:

1. Dashboard Application: Displaying “real-time” COVID-19 statistics.
2. Information Application: Providing educational content about COVID-19.
3. Notification Application: Sending alerts and updates about COVID-19.
4. Core Application: Basic Stuff

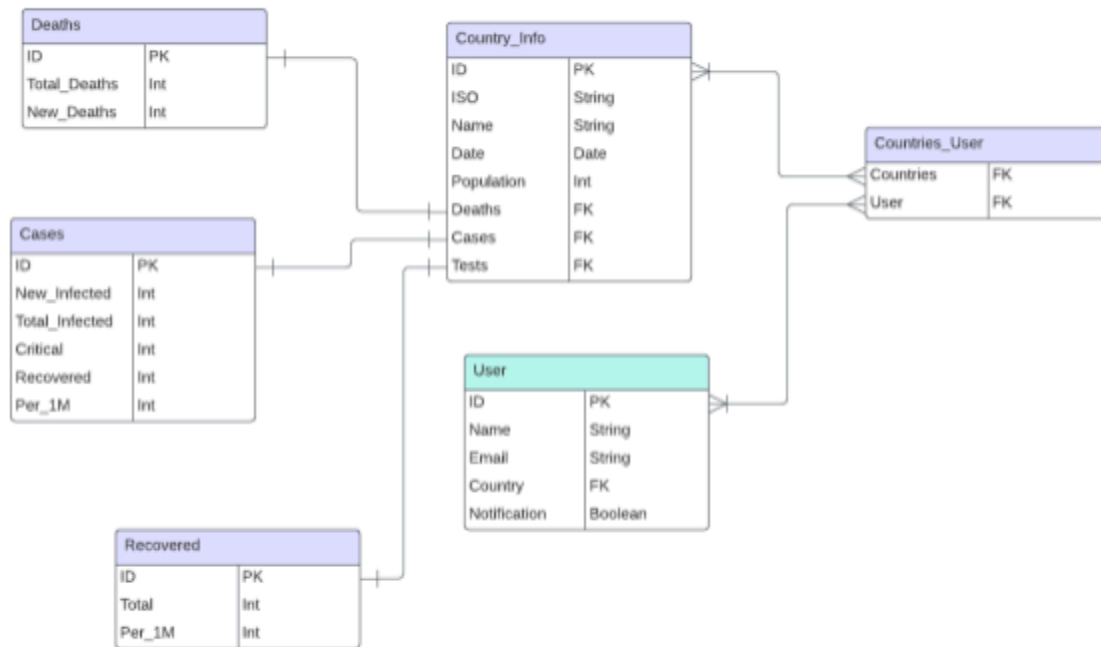
Components:

1. Dashboard Application:
  - Components to display real-time data such as case numbers, recoveries, and deaths.
  - Interactive charts and maps for visual representation.
  - Integration with the COVID-19 API by API-SPORTS for data retrieval.
2. Information Application:
  - Sections for articles and news updates about COVID-19.
  - Health guidelines and safety measures related to COVID-19.
  - FAQs and expert advice on COVID-19.
3. Notification Application:
  - System for push notifications and email alerts.
  - Configuration options for frequency and types of notifications.

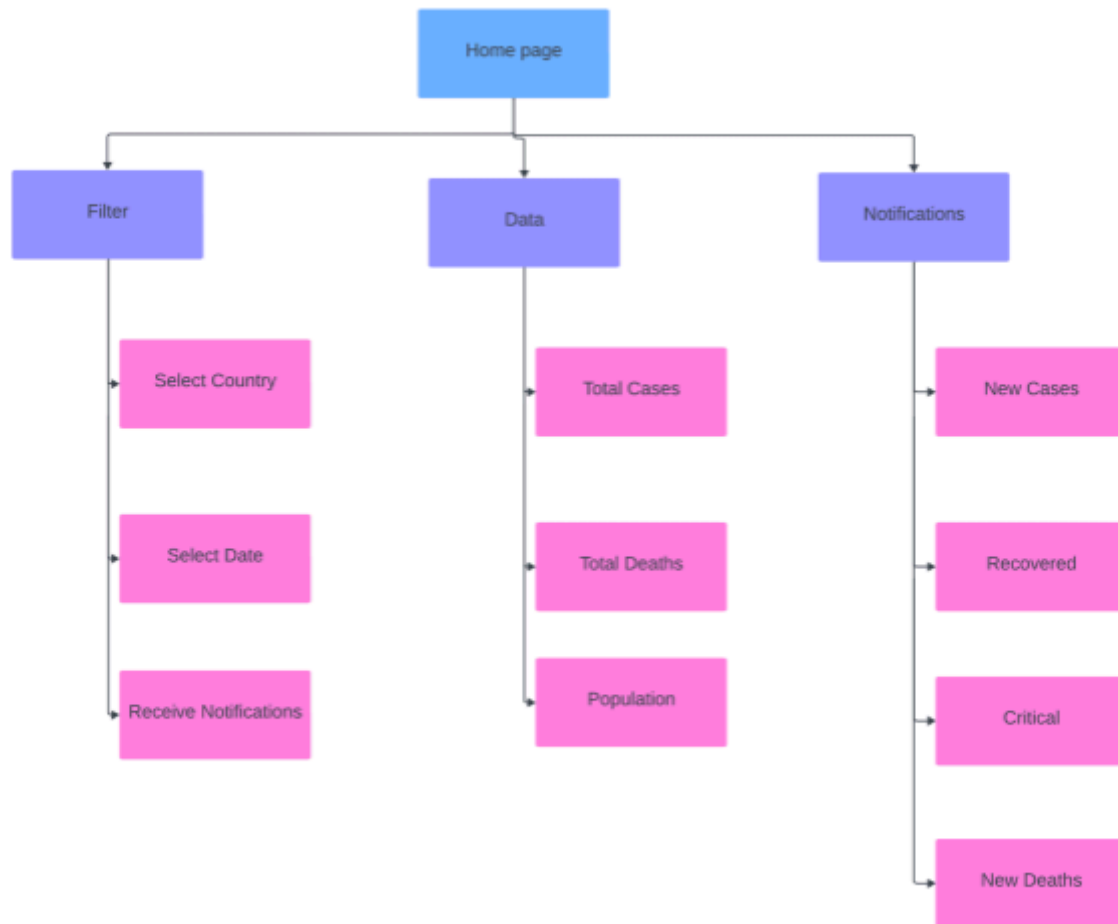
Relationships Between Components:

- The Dashboard and Notification applications will be interconnected through the COVID-19 API data.
- The Information application will provide detailed insights that can be linked in notifications for further reading.

## Database Design:



## Site Map:



## Task Breakdown:

### 1. Frontend Development:

- Dashboard UI: Daniel
- Information Page UI: Ken

### 2. Backend Development:

- API Integration and Data Management: Tejas

### 3. Testing and QA:

- Functionality and Performance Testing: Tejas, Ken, Daniel

## APIs:

- 1.) COVID-19 data API by API-SPORTS on RapidAPI  
(<https://rapidapi.com/api-sports/api/covid-193>)

Base URL: 'https://api-sports.io/v1'

Rate Limit: 500,000 per month

### Endpoints and Usage:

#### 1. Historical Data Endpoint:

- Path: '/history'
- Method: 'GET'
- Parameters:
  - 'country': The ISO code or name of the country.
  - 'day': The date in the format YYYY-MM-DD.
- Description: Retrieves historical data for COVID-19 statistics such as cases, deaths, and tests for a specific country on a given date.
- Response Format: JSON

### Error Handling:

- Errors returned from the API will be logged and displayed to the admin user for troubleshooting.
- Appropriate user-friendly messages will be displayed to the end-users in case of an API error.