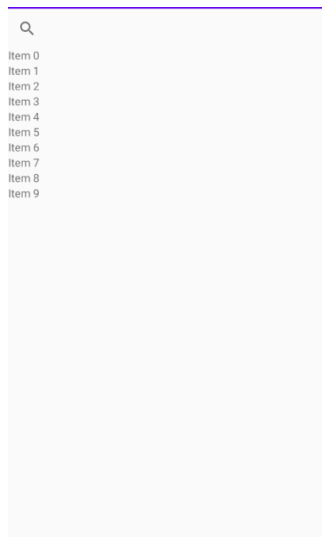


# CMPS 312 Mobile Application Development

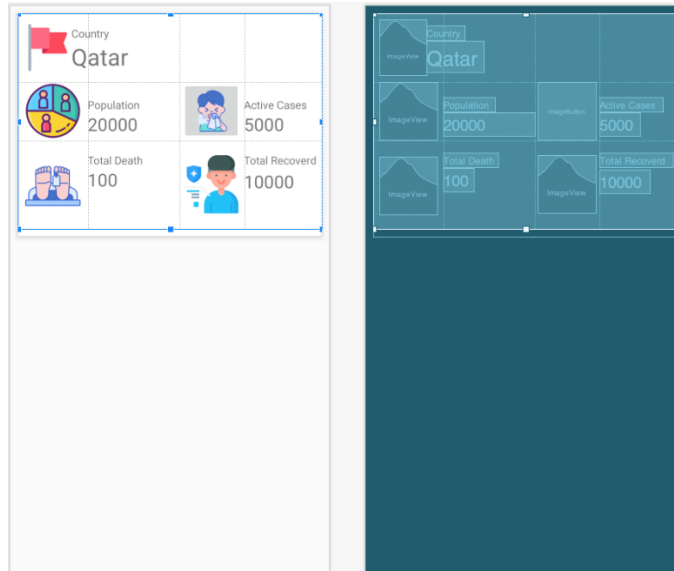
## In-Lab Assessment 2 - CovidTracker App

In this in lab assignment you will design and build a CovidTracker App to allow users to list and search covid-19 stats per country.

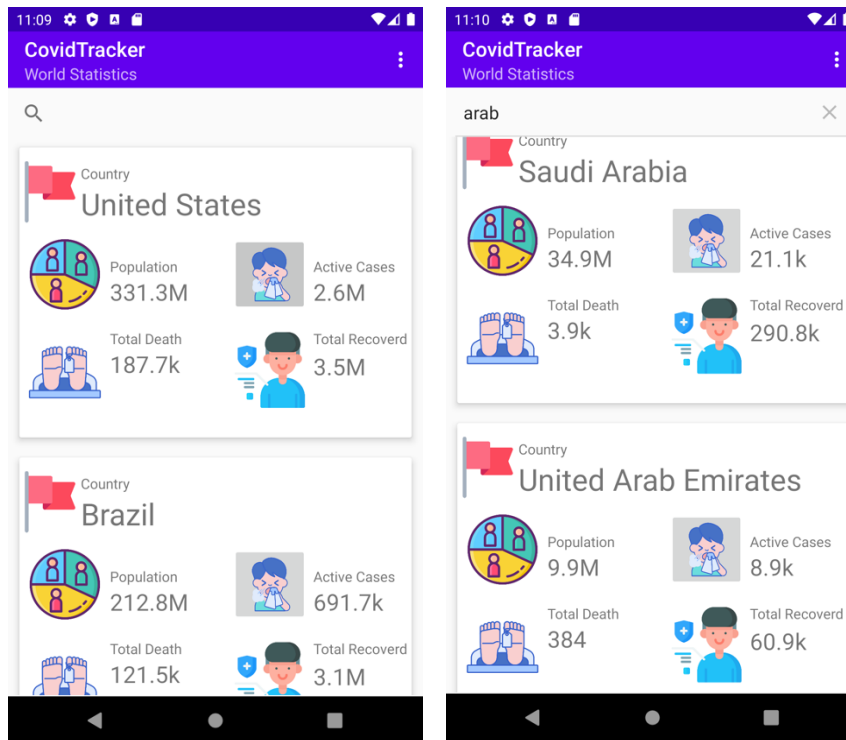
1. Sync Lab GitHub repo and copy **Assessment2** folder into your repository.
2. Open the project **CovidTracker App** in Android Studio.  
The project has the following folders and files:
  - a. **layout:** the activity layout
  - b. **drawables:** images needed for this app.
  - c. **assets:** has **covid-stats.json**
3. Create **CovidStats** data class to hold covid stats data as described in the json file.
4. Create object named **CovidStatRepository** which has a single property **covidStats** of type list. Add **initCovidStats(context:Context)** function to read and parse the data from covid-stats.json into **covidStats** list.
5. Open **activity\_main.xml** layout file and add a **RecyclerView** and set its id to **covidStatsRv**.
6. The activity layout design should look as shown below.



7. Create **list\_item\_covidstats.xml** layout as per the design shown below. This layout will be used by each item in the RecyclerView.

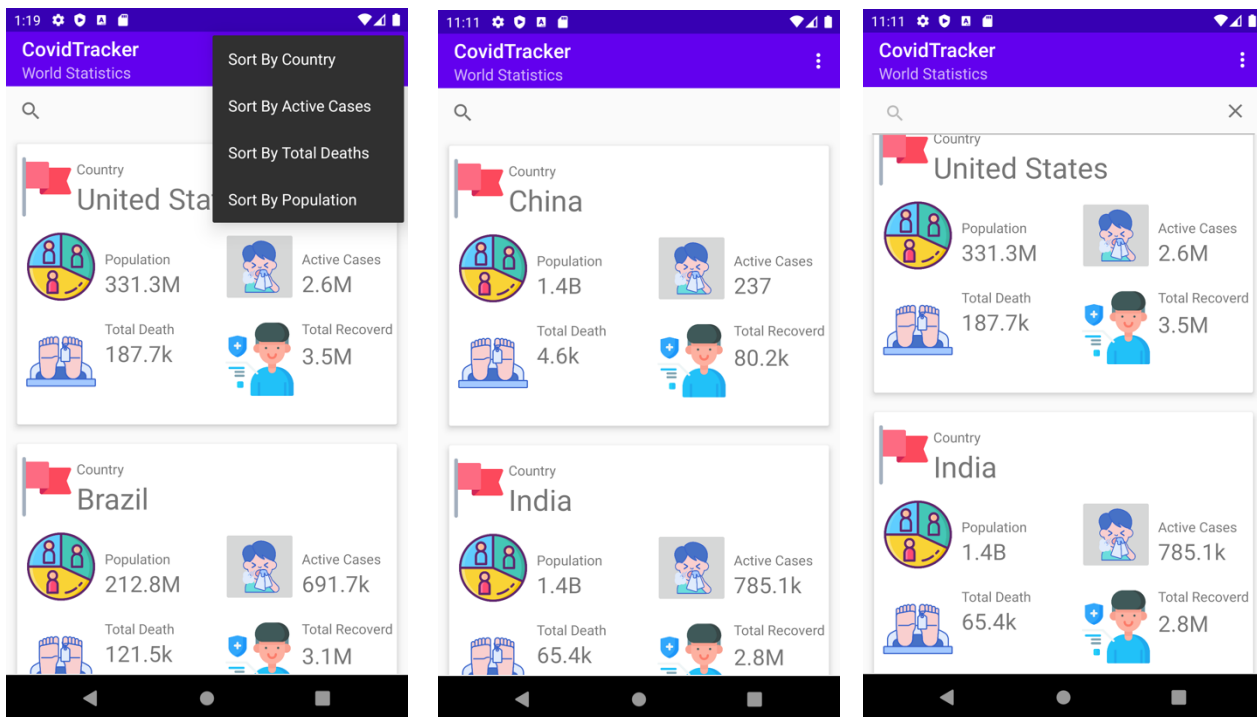


8. Create **CovidStatsAdapter** class that extends **RecyclerView.Adapter** to provide **CovidStatsViewHolder** and to display it in covidStats details.
9. Modify the **MainActivity** to set the adapter for **covidStatsRv** to **CovidStatsAdapter** and the layout manager to use a Linear Layout.



10. Modify the main\_activity layout to add a SearchView. Implement the search to filter the covidStats based on the country name entered in the search box.

11. Add a **Toolbar** with 4 menu options to allow the user to sort data by country, active cases, population and total deaths as shown in the images below.



12. Push your work to GitHub and test your app as you make progress.