1. Write an SQL query to solve the given problem statement.

Display the states, gender affected and the confirmed cases in their respective states where confirmed cases are more than 100.

(Hint: Retrieve states, genders, and confirmed cases from the "death\_and\_recovery" and "statewisedata" datasets, where confirmed cases exceed 100.)

* SELECT statewisedata.State\_UT, death\_and\_recovery.Gender, statewisedata.Confirmed

FROM statewisedata

JOIN death\_and\_recovery ON statewisedata.State\_UT = death\_and\_recovery.State

WHERE statewisedata.Confirmed > 100

GROUP BY State\_UT

LIMIT 9;

1. Write an SQL query to solve the given problem statement.

Which states have collected more than 1000 samples in a day? Provide the serial number, state name, and the total number of samples tested for each state, using data from the 'icmrtestingdata' and 'statewisedata' tables.

(Hint: Display the "Serial No.", "State\_UT", and "TotalSamplesTested" from "icmrtestingdata" and "statewisedata" datasets. Filter the results to show states with more than 1000 collected samples in a day. Combine data from icmrtestingdata and statewisedata tables using a join on the "sno" column)

* SELECT icmrtestingdata.sno, statewisedata.State\_UT, icmrtestingdata.TotalSamplesTested

FROM icmrtestingdata

JOIN statewisedata ON icmrtestingdata.sno = statewisedata.sno

WHERE icmrtestingdata.`TotalSamplesTested` > 1000;

1. Write an SQL query to solve the given problem statement.

Display the patient status in each state from the death\_and\_recovery table

(Hint: Retrieve the 'Patient\_status', 'City', and 'Age' columns from the 'death\_and\_recovery' table, self-joining the table based on the 'State' column to display the patient status in each state. Also order by state column for the first table.)

* SELECT t1.Patient\_status, t2.City, t1.Age

FROM death\_and\_recovery AS t1

JOIN death\_and\_recovery AS t2 ON t1.State = t2.State

ORDER BY t2.State ASC, t1.Age DESC;

1. Write an SQL query to solve the given problem statement.

Display the hospital beds along with their location where patients have recovered from covid-19 and those beds are made available to the needy patients waiting in the queue to get admitted.

(Hint: Display the "Patient Status," "State," "City," and "Beds\_Available" from the "death\_and\_recovery" and "hospitalbeds" datasets. Filter the results to show hospital beds available in the location where patients have recovered from COVID-19 and are waiting in the queue for admission.)

* SELECT hb.Beds\_Available, dr.Patient\_Status, dr.State, dr.City

FROM death\_and\_recovery dr

JOIN hospitalbeds hb ON dr.State = hb.State\_UT

WHERE dr.Patient\_Status = 'Recovered' AND hb.Beds\_Available > 0;

1. Write an SQL query to solve the given problem statement.

Display the total number of people in assam who have recovered

(Hint: Count the total number of people who have recovered in Assam from the "death\_and\_recovery" dataset by applying filters)

* SELECT COUNT(\*) AS total\_recovered

FROM death\_and\_recovery

WHERE State = 'Assam' AND Patient\_status = 'Recovered';

1. Write an SQL query to solve the given problem statement.

Show the state, hospitals and beds available where population beds and hospitals available are more than 1000.

(Hint: Display the "State\_UT," "Hospitals\_Available," and "Beds\_Available" from the "hospitalbeds" dataset. Filter the results to show states, hospitals, and beds where both hospitals available and population beds available are more than 1000.)

* SELECT State\_UT, Hospitals\_Available, Beds\_Available

FROM hospitalbeds

WHERE Hospitals\_Available > 1000 AND Population\_beds > 1000;

1. Write an SQL query to solve the given problem statement.

Show states where active cases are less than 50.

* SELECT State\_UT

FROM statewisedata

WHERE Active < 50;

1. Write an SQL query to solve the given problem statement.

Which dates are associated with the availability of beds, as captured in the 'datewisepatients' and 'hospitalbeds' tables?

(Hint: Display the distinct dates when beds are available by selecting the "Date" column from the "datewisepatients" and "hospitalbeds" datasets.)

* SELECT Distinct dw.date, hb.Beds\_Available

FROM datewisepatients AS dw

CROSS JOIN hospitalbeds AS hb;

1. Write an SQL query to solve the given problem statement.

Show the details of the number of samples tested across each timestamp

(Hint: Retrieve the 'UpdatedTimeStamp' and 'TotalSamplesTested' columns from the 'icmrtestingdata' table to show the details of the number of samples tested across each timestamp.)

* SELECT UpdatedTimeStamp, SUM(TotalSamplesTested) AS TotalSamplesTested

FROM icmrtestingdata

WHERE UpdatedTimeStamp IS NOT NULL AND TotalSamplesTested IS NOT NULL

GROUP BY UpdatedTimeStamp;

1. Write an SQL query to solve the given problem statement. Display the number of males and females who have recovered

* SELECT Gender, COUNT(\*) AS RecoveryCount

FROM death\_and\_recovery

WHERE Patient\_Status = 'Recovered'

GROUP BY Gender;

1. Write an SQL query to solve the given problem statement. List the states where the population is greater than the number of beds available in descending order of serial number.

(Hint: Retrieve the 'State\_UT' and 'Beds\_Available' columns from the 'hospitalbeds' table, where the number of available beds is less than the population. Sort the results in descending order based on the 'sno' column.)

* SELECT State\_UT, Beds\_Available

FROM hospitalbeds

WHERE Population\_beds > Beds\_Available

ORDER BY sno DESC;

1. Write an SQL query to solve the given problem statement. What is the total number of samples tested, total number of positive cases, and the difference between the total samples tested and total positive cases in the 'icmrtestingdata' table?

(Hint: Retrieve the 'TotalSamplesTested', 'TotalPositiveCases', and the difference between 'TotalSamplesTested' and 'TotalPositiveCases' columns from the 'icmrtestingdata' table.)

* SELECT

TotalSamplesTested, TotalPositiveCases, (TotalSamplesTested - TotalPositiveCases) AS Difference

FROM icmrtestingdata;

1. Write an SQL query to solve the given problem statement. Find the number of hospital beds available in each state.

(Hint:Retrieve the 'Beds\_Available' and 'State\_UT' columns from the 'hospitalbeds' table, self-joining the table based on the 'State\_UT' column to find the number of hospital beds available in each state.)

* SELECT State\_UT, SUM(Beds\_Available) AS TotalBedsAvailable

FROM hospitalbeds

GROUP BY State\_UT;

1. Write an SQL query to solve the given problem statement. Display the total number of beds available in Tamil Nadu

* SELECT SUM(Beds\_Available) AS TotalBedsAvailable

FROM hospitalbeds

WHERE State\_UT = 'Tamil Nadu';

1. Write an SQL query to solve the given problem statement. Display the total number of beds available in India.

* SELECT SUM(Beds\_Available) AS TotalBedsAvailable

FROM hospitalbeds;

1. Write an SQL query to solve the given problem statement. What are the distinct values of 'TotalSamplesTested', 'TotalPositiveCases', and 'UpdatedTimeStamp' in the 'icmrtestingdata' table?

* SELECT DISTINCT TotalSamplesTested, TotalPositiveCases, UpdatedTimeStamp

FROM icmrtestingdata;

1. Write an SQL query to solve the given problem statement. Display the total confirmed cases till 31-March in Maharashtra.

* SELECT SUM(Confirmed) AS TotalConfirmedCases, State\_UT

FROM statewisedata

WHERE State\_UT = 'Maharashtra' AND Last\_Updad\_time <= '2023-03-31';

1. Write an SQL query to solve the given problem statement. Calculate the summing distribution of males and females aged 0 to 49 who have been impacted by COVID-19.

(Hint: Use the SQL aggregate function to calculate the sum of the "Female" and "Male" columns from the agedistribution\_2016\_estimates table.. Use the filter to select the rows based on the desired age groups.)

* SELECT SUM(Male), SUM(Female)

FROM agedistribution\_2016\_estimates

WHERE Age\_group IN ('0-4', '15-19', '20-24', '25-29', '30-34', '35-39', '40-44', '45-49');

1. Write an SQL query to solve the given problem statement. Find out the recovery rate among the states and display it along with the names of the states and the number of recovered & active cases.

* SELECT Recovered, Active, State\_UT, (Recovered/Active)\*100

FROM statewisedata;

1. Write an SQL query to solve the given problem statement. Display the states along with the ratio of Beds available against the total population beds

(Hint: Retrieve the 'State\_UT', 'Beds\_Available', 'Population\_beds' columns, and calculate the ratio of 'Beds\_Available' against 'Population\_beds' from the 'hospitalbeds' table.)

* SELECT State\_UT,

Beds\_Available,

Population\_beds,

Beds\_Available / Population\_beds AS Bed\_Ratio

FROM hospitalbeds;

1. Write an SQL query to solve the given problem statement. What are the different patient statuses and the corresponding cities recorded in the 'death\_and\_recovery' table, after joining it with the 'statewisedata' table based on the matching State\_UT values?

(Hint: Retrieve unique patient statuses and cities from the "death\_and\_recovery" and "statewisedata" tables by joining them on the state abbreviation. Filter the results by selecting only those with an age that exists in the "death\_and\_recovery" table.)

* SELECT DISTINCT d.Patient\_status, d.City

FROM death\_and\_recovery d

JOIN statewisedata s ON d.State = s.State\_UT

WHERE d.Age IS NOT NULL;