

## JOMEL M. SEVILLE

Q1. /\* Dates highest case increase on a national level\*/

```
SELECT
J.date
,J.new_total_confirmed_cases
FROM bigquery-public-data.covid19_italy.national_trends J
ORDER BY
2 DESC;
```

Row	date	new_total_confirmed_cases
1	2022-01-11 17:00:00 UTC	220532
2	2022-01-06 17:00:00 UTC	219441
3	2022-01-18 17:00:00 UTC	212004

Q2. /\*registered month with highest average current cases count, on a national level\*/

```
SELECT
DATE_TRUNC(J.date,MONTH) AS month
,J.total_current_confirmed_cases
,AVG (J.total_current_confirmed_cases) AS avg_total_cases
FROM bigquery-public-data.covid19_italy.national_trends J
GROUP BY
1,2
ORDER BY
3 DESC
LIMIT
1;
```

Row	month ▾	total_current_confirmed_cases ▾	avg_total_cases ▾
1	2022-01-01 00:00:00 UTC	2734906	2734906.0

Q3. /\*Shows the count of unique provinces\*/

```
SELECT COUNT(DISTINCT(P.province_code)) AS ctrprovince
FROM bigquery-public-data.covid19_italy.data_by_province P;
```

Row	ctrprovince
1	149

Q4. /\*Days registered a case increase of more than 10000 on national level\*/

```
SELECT
COUNT(J.date) AS count_days
FROM bigquery-public-data.covid19_italy.national_trends J
WHERE
J.new_total_confirmed_cases > 10000;
```

Row	registered_days
1	590

Q5. /\*Query that show unique regions. Order alphabetically\*/

```
SELECT
J.region_name
FROM bigquery-public-data.covid19_italy.data_by_region J
ORDER BY
1 ASC;
```

Row	region_name
1	Abruzzo
2	Abruzzo
3	Abruzzo
4	Abruzzo
5	Abruzzo

Q6. /\*dates and region(s) have the highest deaths to tests ratio? Consider only August 2020 and December 2020. Limit the output to show only 5 rows\*/

```
SELECT
J.date
,J.region_name
,J.region_code
,J.deaths
,J.tests_performed
,J.deaths/tests_performed AS death_test_ratio
FROM bigquery-public-data.covid19_italy.data_by_region J
WHERE
DATE(J.date)BETWEEN DATE('2020-08-01') AND DATE('2020-08-31')
OR DATE(J.date) BETWEEN DATE('2020-12-01') AND DATE ('2020-12-31')
ORDER BY
death_test_ratio DESC
LIMIT 5;
```

JOB INFORMATION		RESULTS		JSON	EXECUTION DETAILS		EXECUTION GRAPH		PREVIEW
Row	date	region_name	region_code	deaths	tests_performed	death_test_ratio			
1	2020-08-01 17:00:00 UTC	Lombardia	3	16807	1308507	0.012844409697...			
2	2020-08-02 17:00:00 UTC	Lombardia	3	16815	1316219	0.012775229654...			
3	2020-08-03 17:00:00 UTC	Lombardia	3	16818	1320427	0.012736788932...			
4	2020-08-04 17:00:00 UTC	Lombardia	3	16819	1326123	0.012682835604...			
5	2020-08-05 17:00:00 UTC	Lombardia	3	16824	1335383	0.012598632751...			

Q7. /\*Write the query to get the total case increase for each region, for December 2020\*/

```

SELECT
J.date
,J.region_name
,J.region_code
,J.total_confirmed_cases
FROM `bigquery-public-data.covid19_italy.data_by_region` J
WHERE
DATE(J.date) BETWEEN DATE('2020-12-01') AND DATE ('2020-12-31');

```

Row	date	region_name	region_code	total_confirmed_cases
1	2020-12-01 17:00:00 UTC	Piemonte	1	169133
2	2020-12-02 17:00:00 UTC	Piemonte	1	170701
3	2020-12-03 17:00:00 UTC	Piemonte	1	172931
4	2020-12-04 17:00:00 UTC	Piemonte	1	175063

Q8. /\*query to get the average number of new cases per month for regions 1,4,7, and 10? Show only months and regions where average new cases > 100\*/

```

SELECT
  DATE_TRUNC(J.date, MONTH) as month
  ,J.region_name
  ,J.region_code
  ,AVG (J.new_current_confirmed_cases) AS avg_new_current_cases
FROM `bigquery-public-data.covid19_italy.data_by_region` J
WHERE
  J.region_code IN ('1','4','7','10')
GROUP BY
  1,2,3
HAVING
  AVG(J.new_current_confirmed_cases) > 100
ORDER BY
  2;

```

Row	month	region_name	region_code	avg_new_current_cases
1	2020-10-01 00:00:00 UTC	Liguria	7	215.87096774193546
2	2020-11-01 00:00:00 UTC	Liguria	7	126.16666666666669
3	2021-12-01 00:00:00 UTC	Liguria	7	265.80645161290323
4	2022-01-01 00:00:00 UTC	Liguria	7	1112.7419354838712

Results per page:

50

```

Q9. /*Which region registered the highest average hospitalization rate for 2021?*/
SELECT
J.date
,J.region_name
,J.region_code
,AVG (J.total_hospitalized_patients/J.total_current_confirmed_cases) AS avg_hospitalization_rate
FROM bigquery-public-data.covid19_italy.data_by_region J
WHERE
DATE(J.date) BETWEEN DATE('2021-01-01') AND ('2021-12-31')
GROUP BY
1,2,3
ORDER BY
avg_hospitalization_rate DESC;

```

JOB INFORMATION		RESULTS	JSON	EXECUTION DETAILS	EXECUTION GRAPH	PREVIEW
Row	date	region_name	region_code	avg_hospitalization		
1	2021-04-15 17:00:00 UTC	P.A. Bolzano	21	0.380530973451...		
2	2021-04-14 17:00:00 UTC	P.A. Bolzano	21	0.325757575757...		
3	2021-04-16 17:00:00 UTC	P.A. Bolzano	21	0.284644194756...		
4	2021-04-13 17:00:00 UTC	P.A. Bolzano	21	0.277955271565...		

Q10.