

Portfolio_queries.sql

Sunday, 18 June 2023 10.18

--Total cases VS Total Deaths

```
SELECT location, date, total_cases, total_deaths,  
(total_deaths/total_cases)*100 AS death_percentage  
FROM  
`temporal-tiger-357907.PortfolioProject.CovidDeaths`  
WHERE total_deaths IS NOT null  
ORDER BY 1,2  
LIMIT 10
```

location	date	total_cases	total_deaths	death_percentage
Afghanistan	2020-03-24	40	1	2.5
Afghanistan	2020-03-25	42	1	2.380952381
Afghanistan	2020-03-26	74	1	1.351351351
Afghanistan	2020-03-27	74	1	1.351351351
Afghanistan	2020-03-28	80	2	2.5
Afghanistan	2020-03-29	91	2	2.197802198
Afghanistan	2020-03-30	106	3	2.830188679
Afghanistan	2020-03-31	114	4	3.50877193
Afghanistan	2020-04-01	166	4	2.409638554
Afghanistan	2020-04-02	192	4	2.083333333

--Total cases VS Total Deaths in Australia

--Shows likelihood of dying if you contract COVID in your country

```
SELECT location, date, total_cases, total_deaths,  
(total_deaths/total_cases)*100 AS death_percentage  
FROM  
`temporal-tiger-357907.PortfolioProject.CovidDeaths`  
WHERE location = "Australia"  
ORDER BY 2 DESC  
LIMIT 10
```

location	date	total_cases	total_deaths	death_percentage
Australia	2023-06-14	11454548	21303	0.18597853
Australia	2023-06-13	11454548	21303	0.18597853
Australia	2023-06-12	11454548	21303	0.18597853
Australia	2023-06-11	11454548	21062	0.183883202

Australia	2023-06-11	11454548	21063	0.183883292
Australia	2023-06-10	11454548	21063	0.183883292
Australia	2023-06-09	11454548	21063	0.183883292
Australia	2023-06-08	11454548	21063	0.183883292
Australia	2023-06-07	11454548	21063	0.183883292
Australia	2023-06-06	11454548	21063	0.183883292
Australia	2023-06-05	11423202	21063	0.18438788

--Total cases VS Population
--Shows what percentage of population got covid

```
SELECT location, date, total_cases, population,
(total_cases/population)*100 AS PercentPopulationInfected
FROM `temporal-tiger-357907.PortfolioProject.CovidDeaths`
WHERE location = "Australia"
ORDER BY 2 DESC
LIMIT 10
```

location	date	total_cases	population	PercentPopulationInfected
Australia	2023-06-14	11454548	26177410	43.75737707
Australia	2023-06-13	11454548	26177410	43.75737707
Australia	2023-06-12	11454548	26177410	43.75737707
Australia	2023-06-11	11454548	26177410	43.75737707
Australia	2023-06-10	11454548	26177410	43.75737707
Australia	2023-06-09	11454548	26177410	43.75737707
Australia	2023-06-08	11454548	26177410	43.75737707
Australia	2023-06-07	11454548	26177410	43.75737707
Australia	2023-06-06	11454548	26177410	43.75737707
Australia	2023-06-05	11423202	26177410	43.6376326

--Looking at countries with highest infection rate compared to population

```
SELECT location, MAX(total_cases) as
HighestInfectionCount, population, MAX((total_cases/population)) *100
as PercentPopulationInfected
FROM `temporal-tiger-357907.PortfolioProject.CovidDeaths`
GROUP BY location, population
ORDER BY PercentPopulationInfected DESC
LIMIT 10
```

location	HighestInfectionCount	population	PercentPopulationInfected
Cyprus	660854	896007	73.75545057

San Marino	24311	33690	72.1608786
Brunei	308777	449002	68.76962686
Austria	6079122	8939617	68.0020408
Faeroe Islands	34658	53117	65.24841388
Slovenia	1344388	2119843	63.41922491
Gibraltar	20550	32677	62.88827004
Martinique	229975	367512	62.57618799
South Korea	31904667	51815808	61.5732307
Andorra	48015	79843	60.13676841

--Showing countries with highest death count per population

```
SELECT location, MAX(total_deaths) as HighestDeathCount
FROM `temporal-tiger-357907.PortfolioProject.CovidDeaths`
WHERE continent is not null
GROUP BY location
ORDER BY HighestDeathCount DESC
LIMIT 10
```

location	HighestDeathCount
United States	1127152
Brazil	703291
India	531892
Russia	399339
Mexico	334240
United Kingdom	226977
Peru	220673
Italy	190625
Germany	174545
France	163787

--Global numbers - Death percentage by date

```
SELECT date, SUM(new_cases) AS totalcases, SUM(new_deaths) AS
totaldeaths, (SUM(new_deaths)/SUM(new_cases))*100 AS DeathPercentage
FROM `temporal-tiger-357907.PortfolioProject.CovidDeaths`
WHERE continent is not null AND new_cases <> 0
GROUP BY date
ORDER BY date DESC
LIMIT 10
```

date	totalcases	totaldeaths	DeathPercentage
2020-02-10	100000	10	0.010000000

2023-06-13	106686	12	0.011247961
2023-06-12	28034	140	0.499393593
2023-06-11	59592	544	0.912874211
2023-06-10	31083	111	0.357108387
2023-06-09	35764	112	0.313164076
2023-06-08	24967	67	0.268354228
2023-06-07	36189	71	0.196192213
2023-06-06	40803	117	0.286743622
2023-06-05	67027	280	0.417742104
2023-06-04	48492	473	0.975418626

--Global numbers – Total Death percentage

```
SELECT SUM(new_cases) AS totalcases, SUM(new_deaths) AS totaldeaths,
(SUM(new_deaths)/SUM(new_cases))*100 AS DeathPercentage
FROM `temporal-tiger-357907.PortfolioProject.CovidDeaths`
WHERE continent is not null AND new_cases <> 0
```

totalcases	totaldeaths	DeathPercentage
767999907	6913334	0.900173807

--Looking at total population VS vaccinations

```
WITH PopvsVac AS
(
SELECT dea.continent, dea.location, dea.date,
vac.population, vac.new_vaccinations,
SUM(vac.new_vaccinations) OVER (PARTITION BY dea.location ORDER BY
dea.date) AS RollingPeopleVaccinated
FROM
`temporal-tiger-357907.PortfolioProject.CovidVaccinations` vac
INNER JOIN `temporal-tiger-357907.PortfolioProject.CovidDeaths` dea
ON dea.location = vac.location
AND dea.date = vac.date
WHERE dea.continent is not null
ORDER BY dea.location, dea.date
)
SELECT *, (RollingPeopleVaccinated/population)*100 AS
VaccinationRatePercentage FROM PopvsVac
```

1	continent	location	date	population	new_vaccina	RollingPeopl	VaccinationRatePercentage
508	Asia	Afghanistan	2021-05-23	41128772			
509	Asia	Afghanistan	2021-05-24	41128772			
510	Asia	Afghanistan	2021-05-25	41128772			

511	Asia	Afghanistan	2021-05-26	41128772			
512	Asia	Afghanistan	2021-05-27	41128772	2859	2859	0.006951338
513	Asia	Afghanistan	2021-05-28	41128772		2859	0.006951338
514	Asia	Afghanistan	2021-05-29	41128772		2859	0.006951338
515	Asia	Afghanistan	2021-05-30	41128772		2859	0.006951338
516	Asia	Afghanistan	2021-05-31	41128772		2859	0.006951338
517	Asia	Afghanistan	2021-06-01	41128772		2859	0.006951338
518	Asia	Afghanistan	2021-06-02	41128772		2859	0.006951338
519	Asia	Afghanistan	2021-06-03	41128772	4015	6874	0.016713361
520	Asia	Afghanistan	2021-06-04	41128772		6874	0.016713361
521	Asia	Afghanistan	2021-06-05	41128772		6874	0.016713361
522	Asia	Afghanistan	2021-06-06	41128772		6874	0.016713361
523	Asia	Afghanistan	2021-06-07	41128772		6874	0.016713361
524	Asia	Afghanistan	2021-06-08	41128772		6874	0.016713361
525	Asia	Afghanistan	2021-06-09	41128772		6874	0.016713361
526	Asia	Afghanistan	2021-06-10	41128772		6874	0.016713361
527	Asia	Afghanistan	2021-06-11	41128772		6874	0.016713361
528	Asia	Afghanistan	2021-06-12	41128772		6874	0.016713361
529	Asia	Afghanistan	2021-06-13	41128772		6874	0.016713361
530	Asia	Afghanistan	2021-06-14	41128772		6874	0.016713361
531	Asia	Afghanistan	2021-06-15	41128772		6874	0.016713361

--Creating View for later Visualization

```

CREATE VIEW `temporal-
tiger-357907.PortfolioProject.VaccinatedPeoplePercentage`
AS
WITH PopvsVac AS
(
SELECT dea.continent, dea.location, dea.date,
vac.population, vac.new_vaccinations,
SUM(vac.new_vaccinations) OVER (PARTITION BY dea.location ORDER BY
dea.date) AS RollingPeopleVaccinated
FROM
`temporal-tiger-357907.PortfolioProject.CovidVaccinations` vac
INNER JOIN `temporal-tiger-357907.PortfolioProject.CovidDeaths` dea
ON dea.location = vac.location
AND dea.date = vac.date
WHERE dea.continent is not null
ORDER BY dea.location, dea.date
)
SELECT *, (RollingPeopleVaccinated/population)*100 AS
VaccinationRatePercentage FROM PopvsVac

```