Titanic and Covid 19

Titanic Dataset

Use the Titanic dataset from the `library(explore)` or

```
library(tidyverse)
library(knitr)

# Read in the data
titanic <- read_csv("data/titanic.csv")
```

and solve the following tasks:

According to Wikipedia, there was an estimated 2,224 passengers and crew onboard the Titanic when it sank. How many of them do we have information for in this dataset? Of the people we have data for, how many of them survived and how many did not? What is the overall survival rate?

How many passengers on the Titanic were males and how many were females? What do you find when you break it down by ticket class?

How many passengers of each sex survived and how many of them did not? What is the survival rate for passengers of each sex?

Show the age distribution per ticket class, per sex. What do you find?

Which ticket class did most of the largest families get? And which ticket class has the lowest proportion of female passengers who travelled solo out of all the female passengers in that class? Note: Comment on your findings below code chunks containing the necessary graph to answer each question.

COVID-19 Map

Download data on the number of COVID-19 deaths per 1 million inhabitants in European countries in January 2022 and January 2023 (e.g., https://ourworldindata.org/covid-deaths).

Filter the database, find and recode country names using the `library(countrycode)`, use data from the `library(maps)`, combine it with your database on deaths per 1 million inhabitants, and display these deaths using the ggplot function in a map that will only show Europe, not the whole world.

Visualization using other `libraries (tmaps or plotly)` is allowed. Interactivity of the map is an extra 5 points.