Time Series Analysis

The datasets can be downloaded here can be downloaded here:

https://drive.google.com/drive/folders/1SIaXBbpd9Sgti_TKum57sekJW4-2er3o

1. There are two datasets. You are required to merge them into a single dataframe such that we have co2 emissions and the terawatt hours consumed by each country over the years.
2. Ensure that the data is 'cleaned' before proceeding further.
3. Select 2 countries to investigate trends in emissions. Briefly explain the reason for your choices.
4. Identify any trends in annual co2 emissions from oil (per capita) over the years. Compare the trends for two countries.
5. For the two selected countries, forecast using simple exponential smoothing the expected "co2 emissions from oil (per capita)" for the most recent five years, use the RMS metric to indicate the accuracy of your forecast.

   (a) Choose the alpha that results in the lowest RMS.

   (b) Plot a graph showing the actual value and the forecasted values.
6. Repeat Question 4 for 'Coal Consumption - TWh' and another column of your choice. Explain why you chose those two columns