Lecture 1: Descriptive Statistics by Excel

Tasks

1. ***Dataset 1*** displays the comparative data on GDP per labour in 10 small states countries between 1975 and 1990. The figures are in thousands of USD, based on current exchange rates. Having completed the data entry, do not forget to save it.

2. Use Data set 1 and calculate the following descriptive statistics for each variable:

   a) the sample size (i.e. count)

   b) the summation of each column (i.e. sum)

   c) the minimum and maximum values (i.e. min and max)

   d) the mean, median and mode[1] (i.e. average, median and mode)

   e) the variance (i.e. var), standard deviation (i.e. stdev), and coefficient of variation (i.e. stdev/mean)

3. Redo question 2 by clicking Data Analysis and then Descriptive Statistics (Make sure you tick the box in front of Summary Statistics before clicking OK). This will provide you a full table of summary statistics[2].

4. Choose date and the data of any country of your choice (i.e. *Cyprus*) and copy - paste it in another Worksheet.

   a) Sort the data of the year and GDP per labour of Cyprus in *descending order*. (Tips: Data > Sort)

   b) Calculate the descriptive statistic for Cyprus. (Tips: Data Analysis > Descriptive Statistics)

   c) Create a frequency distribution table and draw a histogram for the same country. (Tips: Data Analysis > Histogram).

   d) Choose another country. (i.e. *Singapore*) and repeat part (a), (b), and (c).

5. Plot the scatter diagrams for the following countries in Data set 2:

   a) Cyprus and Malta

   b) Singapore and Taiwan

   c) Lesotho and Seychelles

   d) Botswana and Mauritius

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[1] ***Mode:*** The score that occurs most frequently in the dataset. ***Median:*** A way to quantify the center of a distribution is to look at the middle score when scores are ranked.

[2] ***To activate the Data Analysis*** first click on the (>) button is at the top of the window. Then choose ***more comments*** and then **Excel Options** button at the bottom of the windows which will allow you to make adjustment to Excel. Then, click Add-**ins** and from the Add-ins menu chose **Analysis Tool Pak** and **Go** button.