**Assignment 2**

Use the artist layer of Matplotlib to replicate the bar chart below to visualize the percentage of the respondents' interest in the different data science topics surveyed.

To create this bar chart, you can follow the following steps:  
Sort the dataframe in descending order of Very interested. Convert the numbers into percentages of the total number of respondents. Recall that 2,233 respondents completed the survey.

As for the chart:  
Round percentages to 2 decimal places  
use a figure size of (20, 8),  
bar width of 0.8,  
use color #5cb85c for the Very interested bars, color #5bc0de for the Somewhat interested bars, and color #d9534f for the Not interested bars,  
use font size 14 for the bar labels, percentages, and legend,  
use font size 16 for the title, and,  
display the percentages above the bars as shown above, and remove the left, top, and right borders.

**Code Solution:**

Import pandas as pd  
dfsorted=df.sort\_values (['Very Interested'], ascending=[False])  
dfsorted.head()



dfsorted['Very Interested']=round((dfsorted['Very Interested'] / 2233)\*100,2)  
dfsorted['Somewhat Interested']=round((dfsorted['Somewhat Interested'] / 2233)\*100,2)  
dfsorted['Not Interested']=round((dfsorted['Not Interested'] / 2233)\*100,2)  
dfsorted



import matplotlib as mpl  
import matplotlib.pyplot as plt  
ax = dfsorted.plot(kind='bar', alpha=0.35, figsize=(20, 8),width=0.8, color=['#5cb85c', '#5bc0de', '#d9534f'])  
ax.set\_title('Percentage of Respondents Interest in Data Science Area',fontsize=16)  
ax.set\_ylabel('Number')  
ax.set\_xlabel('Topics')  
ax.legend(fontsize = 14)  
ax.set\_frame\_on(False)  
ax.set\_xlabel(False).set\_visible(False)  
ax.axes.get\_yaxis().set\_visible(False)  
ax.set\_xticklabels(('Data Analysis / Statistics','Machine Learning','Data Visualization','Big Data (Spark / Hadoop)','Deep Learning','Data Journalism'))

Here is the full graph