ISM 370

Module 4 Project

Requirements

Project Name	Credit Analysis
Project Due Date	Sunday by 11:59pm
Requirements	
For this project, you will submit two files. One is a Word document with information about your approach and analysis. The second is your python project file that includes the code you used to explore the data. For this project, you will work with a dataset that includes information about credit users and credit accounts. Use the included credit.csv data description text file to learn more about the data and each variable. Requirements: 1. View the "credit.csv data description.txt" file to learn about this dataset. 2. Read in the credit.csv into your Python project. Print overall descriptive statistics for the data. In your Word document, for number 1, write down at least three interesting facts or insights learned from the descriptive statistics. 3. Think more about this credit data and the information you have. In your Word document, for number 2 and write down something about credit users or credit usage that you would like to learn from this data. 4. Group the data by PAY_1 and show the mean for BILL_AMT1? What insights do you gain from this output? Write down one or more insights in your Word document for number 3. 5. Group the data by PAY_2 and show the mean for AGE? What insights do you gain from this output? What insights do you gain from this output? Write down one or more insights in your Word document for number 4. What might be going on to cause the large deviance in age for those who are in category 8 in PAY_2? View the number of unique ages in PAY_2 by using the .nunique() method on the AGE column when it is grouped by PAY_2. How can this information help you understand what is causing the large deviance for those who are in category 8 in PAY_2? Write down your thoughts on this as number 5 in your Word document. 6. Take two subsets of the data. The first subset should only include the data for females (SEX == 2). The second subset should include the data for males (SEX == 1). Apply the .nunique() method to PAY_1 and PAY_6 for each subset. What do you learn from this analysis and these outputs? Write down your insights as number 6 in your Word document. 6. In your Word document, list number 7 and answer this question: At this point have you produced the facts and information you need to learn what you hoped to learn in number 3 above (the thing you identified in number 1 in your Word document? If so, explain what you learned and reference the data (facts) that gave you this information. If not, identify what other data you would need or what else you may need to do to learn the information. If it can be done with this dataset and the tools you currently have, complete the analysis to obtain the information and write what you learned.	
Grading	

Completing both the analysis and the writing requirements completely and well are necessary to earn high marks on this project. Deficiency in either will result in lower marks. You are welcome to add additional functionality and to utilize your creativity in making the program even better.
Deliverable
Submit your Word document and your Python file to Canvas.