Programming Assignment 2

Linear Regression and SVM (100 points)

Instructions

- The deadline for the assignment is June 4, 2023, at 23:59:59 PDT.
- Please use Python 3.5 or 3.6 (for full support of typing annotations).
- In this programming assignment, you will apply Linear Regression and SVM on the National Institute of Diabetes and Digestive and Kidney Disease dataset and Iris Dataset respectively from SciKit Learn.
- We have provided the bootstrap code and you are expected to complete the classes and functions.
- Download the .ipynb file of Programming Assignment 2 from DEN.
- DO NOT CHANGE THE OUTPUT FORMAT. DO NOT MODIFY THE CODE UNLESS
 WE INSTRUCT YOU TO DO SO. A homework solution that mismatches the provided
 setup, such as format, name initializations, etc., will not be graded. It is your
 responsibility to make sure that your code runs well on google Colab.
- Assignment submission will be via courses.uscden.net. By the submission date, there
 will be a folder named 'Programming Assignment 2' set up in which you can submit
 your file.
- You can submit multiple times, but only the last submission counts. That means if you
 finish some problems and want to submit something first and update later when you
 finish, that's fine.

Please also follow the rules below:

- The file should be named as firstname_lastname_USCID.ipynb (e.g., John_Davis_8675309045.ipynb).
- Do not have any spaces in your file name when uploading it.
- Please include your name and USCID in the header of your file as well.

Collaboration: You may discuss with your classmates. However, you need to implement your own solutions and submit them separately. Please consult the syllabus for what is and is not acceptable collaboration. Review the rules on academic conduct in the syllabus: a single instance of plagiarism can adversely affect you significantly more than you could stand to gain.