(https://profile.intra.42.fr)

Remember that the quality of the defenses, hence the quality of the of the school on the labor market depends on you. The remote defences during the Covid crisis allows more flexibility so you can progress into your curriculum, but also brings more risks of cheat, injustice, laziness, that will harm everyone's skills development. We do count on your maturity and wisdom during these remote defenses for the bene fits of the entire community.

SCALE FOR PROJECT FT_LINEAR_REGRESSION (/PROJECTS/42CURSUS-FT_LINEAR_REGRESSION)

You should evaluate 1 student in this team

Git repository

Introduction

Please follow the following rules :

- Remain polite, courteous, respectful and constructive throughout the evaluation process. The well-being of the community depends on it.

- Identify with the person (or the group) evaluated the eventual dysfunctions of the work. Take the time to discuss and debate the problems you have identified.

- You must consider that there might be some difference in how your peers might have understood the project's instructions and the scope of its functionalities. Always keep an open mind and grade him/her as honestly as possible. The pedagogy is valid only and only if peer-evaluation is conducted seriously.

Guidelines

- Only grade the work that is in the student or group's GiT repository.

- Double-check that the GiT repository belongs to the student or the group. Ensure that the work is for the relevant

project and also check that "git clone" is used in an empty folder.

- Check carefully that no malicious aliases was used to fool you and make you evaluate something other than the content of the official repository.

- To avoid any surprises, carefully check that both the evaluating and the evaluated students have reviewed the possible scripts used to facilitate the grading.

- If the evaluating student has not completed that particular project yet, it is mandatory for this student to read the entire subject prior to starting the defence.

- Use the flags available on this scale to signal an empty repository, non-functioning program, a norm error, cheating etc. In these cases, the grading is over and the final grade is 0 (or -42 in case of cheating). However, with the exception of cheating, you are encouraged to continue to discuss your work (even if you have not finished it) in order to identify any issues that may have caused this failure and avoid repeating the same mistake in the future.

- Remember that for the duration of the defence, no segfault, no other unexpected, premature, uncontrolled or unexpected termination of the program, else the final grade is 0. Use the appropriate flag.

You should never have to edit any file except the configuration file if it exists. If you want to edit a file, take the time to explicit the reasons with the evaluated student and make sure both of you are okay with this.

- You must also verify the absence of memory leaks. Any memory allocated on the heap must be properly freed before the end of execution.

You are allowed to use any of the different tools available on the computer, such as leaks, valgrind, or e_fence. In case of memory leaks, tick the appropriate flag.

Attachments

 subject.pdf (https://cdn.intra.42.fr/pdf/pdf/13331/en.subject.pdf)

 data.csv (/uploads/document/document/2108/data.csv)

Preliminaries

Preliminaries

Please first check the following element:
- Check again that you are checking what is on the git repository - No cheat, check if the student knows his subject and his code.
- There should be 2 programs, one to predict the price and the other to train the model

Please check that if a librairy has been used by the student it is not already implemented in it. If it s the case, stop everything, push the cheat flag and stop the evaluation.

Yes No

First section

Mandatory part

Prediction before training

Launch the prediction programme. It should ask you for a mileage: Enter a value that is not null

The programme should display the result of its prediction and should print the value 0 because the training hasnt started.

Please verify that the equation is : theta0 + (theta1 * x).

Yes No

Training phase

Ask the student to show you its implementation of the linear regression algorithm. Check that the function in the subject is well implemented and that the program save theta0 and theta1 at the end.

N'oubliez pas que si vous ne voyez pas l'équation mais qu'à la place une fonction comme numpy.polyfit a été utilisée, c'est un cas de triche et donc un flag Cheat.

Don't forget that if you dont see the equation and you see numpy.polyfit or something that look like it. It s that the student is cheating.

Yes No

Read the csv

The training program should read the csv file and use it for training itself.

Yes No

Simultaneous assignation

It s a bit complex : You should check that theta0 and theta1 are set simultaneously during the training phase.

For this verify that the result of the 2 equations during the training phase are saved in temporaries variable before setting theta0 and theta1 at the end of each loop.

Yes No

Prediction after training

Relaunch the prediction program. Reenter the same mileage as before. This time it should give you a price. Enter a value from the csv file.

The program should give you a price for each mileage. Is it following the csv prices? The difference between the csv and the prediction is normal. If the price is exactly the same all the time, we are maybe in a case of over-fitting. (a bonus point if the student can explain what it is).

Yes No

Bonus

Partie Bonus

Bonus

You can count 5 bonus max:

- A graphique that show the data
- A graphique that show the result of the program in the same graphic as above

- A program to get the precision of the algorithm
- ...

Rate it from 0 (failed) through 5 (excellent)

Ratings

Don’t forget to check the flag corresponding to the defense

Ok

Outstanding project

Empty work

No author file

Invalid compilation

Norme

Cheat

Crash

Forbidden function

Conclusion

Leave a comment on this evaluation

Finish evaluation