# **MLOPS ASSIGNMENT#1**

## **Group Members:**

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### **Link to the Original Repository:**

https://github.com/mattnedrich/GradientDescentExample

#### **Link to Our Repository:**

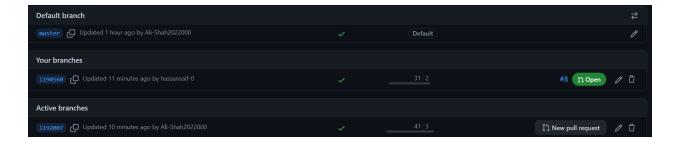
https://github.com/NUCES-ISB/i192007 i190560 A1

#### Introduction:

The repository we choose was related to implementing gradient descent manually. Gradient descent is the core of Machine learning, as well as deep learning algorithms mostly gradient descent in libraries, is provided abstractly and we do not need to implement it but this repository explains and manually implements it so that users can understand better the workflow of it.

# **Steps Followed in Assignment:**

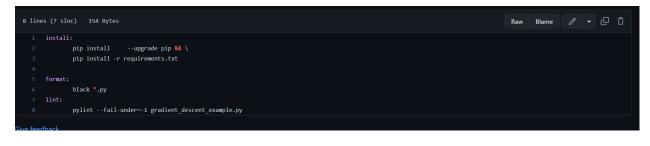
Creation of two separate branches of the repository

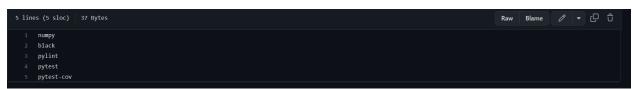


• Individual scaffolding in each branch separate workflows created in each branch

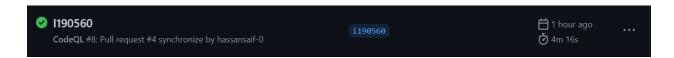


Generating Makefiles and completion of workflows





 Running the CodeQL for the repository and finding out security anlysis of repository.



2023-02-24T15:54:26.5720835Z ##[section]Starting: Prepare job analyze 2023-02-24T15:54:26.5722761Z Evaluating strategy

2023-02-24T15:54:26.5723529Z Creating job 'python'
2023-02-24T15:54:26.5723796Z Evaluating timeout
2023-02-24T15:54:26.5723838Z Evaluating cancel timeout
2023-02-24T15:54:26.5723881Z Evaluating continue on error
2023-02-24T15:54:26.5723918Z Evaluating target
2023-02-24T15:54:26.5725372Z ##[section]Finishing: Prepare job analyze

Above is the log for CodeQL analysis and no such security vulnerability was found in the repository possible cause was probably the code was too simple with no external much dependencies which eventually cause no security concerns in the repository.