**How to install and run the code**

We ran this code in google colab.

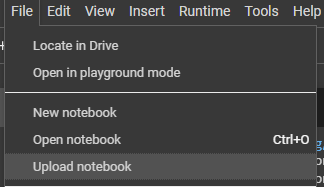
First, open a new notebook in google colab.

Upload to the drive the project folder containing the dataset and the folders to which voice clips and lip animations will be added. (LipNet folder)

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After that, upload the project notebook by clicking on File->upload notebook

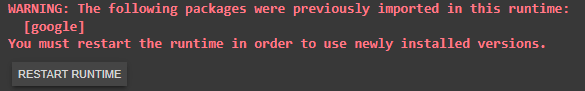


The following installations must be performed:

!pip install tensorflow==2.10

**This installation must be done before running the program**

Click on “RESTAT RUNTIME”



After initializing the runtime, click on “Run all”

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After that, you must create a connection to the drive in order to add the data set on which the training was performed:

from google.colab import drive

drive.mount('/content/gdrive')

**Download the dataset:**

#download dataset from url link and extratced it to drive

url = 'https://drive.google.com/uc?id=1YlvpDLix3S-U8fd-gqRwPcWXAXm8JwjL'

output = 'data.zip'

gdown.download(url, output, quiet=False)

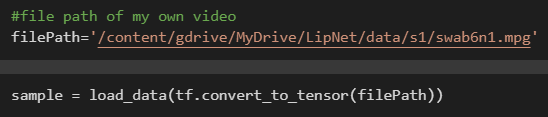
gdown.extractall('data.zip')

**Loading the trained model:**

model.load\_weights('/content/gdrive/MyDrive/LipNet/models/checkpoint')

At the end of the program execution, a random video will be selected to demonstrate the program execution.

**Loading video for prediction:**

After all these steps it is possible to predict what is said from any video we want, by combining the second algorithm we will also get a voice output.

The final output of the program will look like this:

