

## Project 3

### Project Description:

This program that reads single or multiple input file and search the words in the input file that satisfy conditions provided by the user as command line arguments with python. This code when run using the terminal will prompt the user to enter a word he/she wants to look for in any .txt file. After that, the program will go through the whole .txt file which should be in the same directory as the code, and then search for all the occurrences of the word and report it along with the line number and which word in the it is. The file name/names will be taken as command line arguments. The is not case sensitive, for example if searching for the word "fish", even "FISH" can come in the occurrences. The code would basically read the file line by line to search for the word desired by the user to be displayed with the line and word number. Sample input files named sample 1.txt and sample2.txt found online are provided for testing the code with. The code will print N/A if a word is not found in the specified file/files.

### Running Code Example:

Example 1: Code execution without case difference.

```
C:\Users\Jayesh Mohite\Desktop>projectJ3.py sample1.txt
Enter the word you want to search for: non
File Name      Line Number    Word Number    Word
sample1.txt    4              5              non
```

Example 2: Code execution with case difference and multiple files.

```
C:\Users\Jayesh Mohite\Desktop>projectJ3.py sample1.txt sample2.txt
Enter the word you want to search for: INcididunt
File Name      Line Number    Word Number    Word
sample1.txt    1              13             incidunt
sample2.txt    1              13             incidunt
sample2.txt    100            13             incidunt
sample2.txt    1099           13             incidunt
sample2.txt    2099           13             incidunt
sample2.txt    3899           13             incidunt
```

Example 3: Code execution where the word does not exist in all files provided.

```
C:\Users\Jayesh Mohite\Desktop>projectJ3.py sample1.txt sample2.txt
Enter the word you want to search for: fuguiguihioihioh
File Name      Line Number    Word Number     Word
sample1.txt    N/A            N/A             fuguiguihioihioh
sample2.txt    N/A            N/A             fuguiguihioihioh
```