**-Lab Week 3B-**

**Problem: Text Analyzer**

You are tasked with creating a text analysis program. The program should perform the following tasks on a given input text:

1. Check if the text starts with "Dear" (case-insensitive). If it does, display "Formal letter."
2. Check if the text ends with a question mark (?) and contains the word "help" (case-insensitive) anywhere in it. If both conditions are met, display "Request for help."
3. Count the number of times the word "Python" appears in the text (case-insensitive).
4. Find and display the index (position) of the first occurrence of the word "programming" (case-insensitive) if it exists. If it doesn't exist, display "No 'programming' found."
5. Check if the text contains both "Python" and "programming" (case-insensitive). If it does, display "Python programming mentioned."
6. Check if the text contains at least one digit and at least one letter (alphanumeric). If it does, display "Alphanumeric content found."

**Example:**

Please enter some text:

Dear Sir or Madam, I am writing to request your assistance with my Python programming project. It has been challenging, and I need some help. Can you help me? Thank you.

Formal letter.

Request for help.

The word 'Python' appears 1 time(s).

The word 'programming' starts at index 32.

Python programming mentioned.

Alphanumeric content found.

Paste the screenshot of your code below:

*print*("Please enter some text:")

text = *input*()

*print*()

text\_caseless = text.lower()

if text\_caseless.startswith("dear"):

*print*("Formal letter.")

if text\_caseless.endswith("?") and "help" in text\_caseless:

*print*("Request for help.")

*print*(*f*"The word 'python' appears {(pc := text\_caseless.count('python'))} time(s).")

if (i := text\_caseless.find("programming")) >= 0:

*print*(*f*"The word 'programming' starts at index {i}.")

if pc > 0:

*print*("Python programming mentioned.")

else:

*print*("No 'programming' found.")

if text\_caseless.isalnum():

*print*("Alphanumeric content found.")

Paste the screenshot of your output below:A screen shot of a computer

Description automatically generated