Assignment - 1
Compiler Construction (CSC3201)
BSCS 5 - Fall 2023
Submission Deadline: **Friday, October 20th, 2023**

Write a program in java that should recognize the lexemes (operators) given in the table below and output the correct token name and the attribute value for them:

Lexeme	Token Name	Attribute Value
<	RELOP	LT
<=	RELOP	LE
==	RELOP	EQ
<>	RELOP	NE
>=	RELOP	GE
>	RELOP	GT

- Your program will be written in one .java file.
- It will take one line of input on command prompt.
- It should analyze the input character by character.
- It should **NOT** use any regex or any other pre-written library functions for recognizing lexemes/tokens.
- If input contains a lexeme that is not listed in the above table, then it should display it as error and as unrecognized lexeme.

Sample Input line:

```
<> >    == ++ <=
```

Sample output on screen:

```
LEXEME   TOKEN NAME   ATTRIBUTE VALUE
------   ----------   ---------------
<>       RELOP        NE
>        RELOP        GT
==       RELOP        EQ
++  Error: Unrecognized Lexeme
<=       RELOP        LE
```

Submission Instructions:
- Submit your *.java* file in email to: khawaja.mohiuddin@szabist.pk (not @szabist.edu.pk)
- Email Subject should mention: **Assignment-1**, your **Section**, **Registration Id** and **Full Name**.
- If multiple emails sent for same assignment, 2 marks will be deducted on each extra email.
- If your .java file does not compile, you will get zero.
- If copied or partially copied code sent, you will get zero.
- Late submissions will get 2 marks deducted per day.
- Questions will be asked during evaluation by running your code in class.