Introduction To Python Programming

Assignment-1

1. Write a python program to display following messages.

   Hello "ITERIAN"
   Welcome to Siksha 'O' Anusandhan Family.
   Welcome to "Introduction to Computer Laboratory"
   Python is fun for All !!

2. Write a python program to store your Bank account no, name and balance in three different variables and display their value on the screen as given:

   My name is Amit Kumar bearing account number 123456 having balance 7654.98

3. Write a python program to exchange the values of two variables of integer type X and Y

4. Write a python program to exchange the value of 4 variables W,G,K,A such that the value of W will move to A, A to K, K to G and finally G to W. Exchange using with and without using extra variables

5. What do each of the following print?
   a. print(5)
   b. print(float(25)/6)
   c. print(float(25/6))
   d. print(5/4)
   e. print(5//4)
   f. print(5.0//4)
   g. print(5//4.0)
   h. print(25//6.7)
   i. print(5+'6')
   j. print(5+7+'9')
   k. print("92"+7+5)
   l. print(2+"9")
   m. print("2" + "bc")
   n. print(2 + 3 + "bc")
   o. print("(2+3)" + "bc")
   p. print("bc" + '(2+3)')
   q. print("bc" + "2" + 3)
   r. print('b')
   s. print('b' + 'c')
   t. print(str(4)); print(ord('c'))
   u. print(str ('a' +4))

Python ord() function returns the Unicode code of a given single character. It is a modern encoding standard that aims to represent every character in every language.
Unicode includes:
- ASCII characters (first 128 code points(control and printable characters)
- Emojis, currency symbols, accented characters, etc.

6. Suppose that a variable is defined as a = 3.14159. What do each of the following print?
   a. print(a)
   b. print(a+1)
   c. print(8/int(a))
   d. print(8/a)

e. print(int (8/a))

7. Evaluate the following expressions with the given values of A and B:
   a. (A>B) and (A<B) when A=2,B=6
   b. (A>B) and not (A<B) when A=7,B=6
   c. (A==B or A>=B) when A=9,B=6

8. Find Output
   a. print(10 !=9 and not 29 >= 29)
   b. print('hi' > 'hio' and 'hi' > 'hello')
   c. print(10 !=9 and not 29 >= 29 and 'ME' > 'me' or 'you' < 'Yap' and 8 <= 4.3)

9. Evaluate the following expressions involving arithmetic, relational and logical operators:
   a. -3 % -10 + 10 < 50 and 29 >= 29
   b. 7 ** 2 <= 5 // 9 % 3 or 'bye' < 'Bye'
   c. 3 % -10 < 8 and -25 > 1 * 8 // 5
   d. 5 ** 2 // 2+ 7 > 8 or 9 != 10
   e. 2//3 < 6 and 'I am doing MCA' > 'I am not doing MCA'
   f. 10 + 6 * 2 ** 2 != 9//4-3 and 29 >= 29/9
   g. 'hello' * (5-1) > 'hello' and 'college'< 'collin'
   h. 4%10 + 5//6 > 20%6

10. Use 2 print statements to print the following in one line:
    My name is Sitara. My section number is B.

11. Calculate the multiplication and sum of two numbers

12. Calculate net salary with following information:

    Basic salary=7000
    HRA=20% OF basic
    DA=50% of basic
    TA=20% of basic
    Net salary=basic+HRA+DA+TA

13. Print true if a given number is greater than another given number(use 2 variables to store the numbers).

14. Print the following pattern without using loop

```
*
* *
* * *
* * * *
```

15. Assume a string variable str1 contains "1" initially i.e. str1="1"

Write a python program to print the following output using string concatenation. (You can take extra string variables)

```
1

1  2  1

1  2  1  3  1  2  1
```

1 2 1 3 1 2 1 4 1 2 1 3 1 2 1