1) After running the following code, what does the variable bacon contain?

bacon = 22

bacon + 1

The solution is 22 after running the code

2) What should the values of the following two terms be?

'spam' + 'spamspam'

'spam' * 3

The solution is:

spamspamspam

Spamspamspam

3) How can you tell the difference between break and continue?

The break statement is used when all the forthcoming iterations are to be terminated whereas the 'continue' statement is used to skip a particular iteration and continue with the next iteration.

4) In a for loop, what is the difference between range (10), range (0, 10), and range (0, 10, 1)?

Range (10) means the range of the for loop is from 0 to 10 including 0 and 10.

Range (0,10) also means the same that the range is from 0 to 10.

Range(0,10,1) means that the range is from 0 to 10 with 1 value increment.

5) Using a for loop, write a short program that prints the numbers 1 to 10 Then, using a while loop, create an identical program that prints the numbers 1 to 10.

USING FOR LOOP

```
for i in range(1,11,1):
    print(i)
```

USING WHILE LOOP

```
a=1
while a<11:
    print(a)
    a+=1</pre>
```

6) Given a number x, determine whether the given number is Armstrong number or not.

```
Input: 153
```

Output: Yes 153 is an Armstrong number.

```
111+555+333=153
```

```
n=int(input("Enter a number"))
sum=0
```

```
t=n
while n>0:
    r=n%10
    sum=sum+(r*r*r)
    n=n//10
if sum==t:
    print("It is an Armstrong
number")
else:
    print("It is not an Armstrong
number")
```

7) Program to find Sum of squares of first n natural numbers.

```
n=int(input("Enter a number"))
sum=0
t=n
for i in range(1,n+1):
    sum=sum+(i*i)
print(sum)
```

8) Program to Reverse words in a given String in Python.

```
str = input("Enter a string:")
words = str.split()
revstr = list(reversed(words))
print("The reversed string is:")
print(" ".join(revstr))
```

9) Given a list of numbers, write a Python program to find the sum of all the elements in the list.

```
Input: [10,12,13]
Output: 35

list1 = []
sum=0
n = int(input("Enter number of elements : "))
for i in range(0, n):
    element = int(input())
    list1.append(element)
    sum=sum+element
print(list1)
print(sum)
```

10) Write a Python program to print all even numbers between 10-1000.

```
for i in range(10,1001):
    if(i%2==0):
        print(i)
```