Chapter 5 Practice Set Questions by Munawar

Questions

1. Write a program to print the following pattern.

```
* * * * *

* * * *

* * *
```

Solution

```
//Question 1
int n=5;
for(int i=n;i>0;i--) {
    for(int j=0;j<i;j++) {
        System.out.print("*");
    }
    System.out.println("\n");
}</pre>
```

2. Write a program to sum first n even numbers using while loop.

Solution

```
//Question 2
// using while loop
int num=5;
int s=0;
int j=0;
while (j<num)
{
    s=s+(2*j);
    j++;
}

System.out.println("Sum of even number is ");
System.out.println(s);
// using for loop</pre>
```

```
// int n=5;
// int sum=0;
// for(int i=0;i<n;i++){
        sum =sum+(2*i);
        }
// System.out.println("Sum of even number is ");
// System.out.println(sum);</pre>
```

3. Write a program to print multiplication table of a given number n.

Solution

```
//Question 3
int table=5;
int number=10;
for(int i=1;i<=number;i++){
    System.out.print(table);
    System.out.print(" X ");
    System.out.print(i);
    System.out.print("=");
    System.out.println(table*i);
}</pre>
```

4. Write a program to print multiplication table of 10 in reverse order.

Solution

```
//Question 4 In Reverse Order
int t=5;
for(int i=10;i>0;i--) {
    System.out.print(t);
    System.out.print(" X ");
    System.out.print(i);
    System.out.print("=");
    System.out.println(t*i);
}
```

5. Write a program to find factorial of a given number using for loops.

Solution

Self-question

6. Repeat question 5 using while loop.

Solution

```
// Question 6
int repeat=5;
// Factorial 5!=5*4*2*1
int k=1;
int factorial=1;
while (k<=repeat) {
    factorial*=k;
    k++;
}
System.out.println(factorial);</pre>
```

7. Repeat question 1 using while loop.

Solution

Self-question

8. What can be done using one type of loop can also be done using the other two types of loops True or False.

Solution

Answer is true.

9. Write a program to calculate the sum of the numbers occurring in the multiplication table of 8.

Solution

```
// Question 9
int tab=5;
int numb=10;
int total Sum=0;
```

```
for(int i=1;i<=numb;i++) {
    total_Sum+=tab*i;
}
System.out.println(total_Sum);</pre>
```

- 10. A do while loop is executed.
- 1 At least once
- 2 At least twice
- 3 At most

Solution

At least once time execute do not depend the condition.

10. Repeat Question 2 using for loop.

Solution

// self-Question

Source code:

```
// Question 9
int tab=5;
int numb=10;
int total_Sum=0;
for(int i=1;i<=numb;i++){
    total_Sum+=tab*i;

}
System.out.println(total_Sum);
}
</pre>
```

Thank You