1.WAP to accept a number from the user and calculate even or odd.

```java
import java.util.Scanner;

class CheckEvenOdd
{
  public static void main(String args[])
  {
    int num;
    System.out.println("Enter an Integer number:");

    //The input provided by user is stored in num
    Scanner input = new Scanner(System.in);
    num = input.nextInt();

    /* If number is divisible by 2 then it's an even number
     * else odd number*/
    if ( num % 2 == 0 )
        System.out.println("Entered number is even");
     else
        System.out.println("Entered number is odd");
  }
}
```

OUTPUT

```
D:\Java_Homework>java CheckEvenOdd
Enter an Integer number:
56
Entered number is even
```

2. WAP to accept a number from the user and check whether the number is palindrome or not.

```
public class Palindrome {

    public static void main(String[] args) {

        int num = 121, reversedInteger = 0, remainder, originalInteger;

        originalInteger = num;

        // reversed integer is stored in variable
        while( num != 0 )
        {
            remainder = num % 10;
            reversedInteger = reversedInteger * 10 + remainder;
            num  /= 10;
        }

        // palindrome if orignalInteger and reversedInteger are equal
        if (originalInteger == reversedInteger)
            System.out.println(originalInteger + " is a palindrome.");
        else
            System.out.println(originalInteger + " is not a
palindrome.");
    }
}
```

OUTPUT

```
PS D:\Java_Homework> javac Palindrome.java
PS D:\Java_Homework> java Palindrome
121 is a palindrome.
```

3. WAP to accept a number from the user and check whether the number is armstrong or not.

```java
class Armstrong{
    public static void main(String[] args)  {
      int c=0,a,temp;
      int n=153;//It is the number to check armstrong
      temp=n;
      while(n>0)
      {
      a=n%10;
      n=n/10;
      c=c+(a*a*a);
      }
      if(temp==c)
      System.out.println("armstrong number");
      else
          System.out.println("Not armstrong number");
     }
  }
```

OUTPUT

```
PS D:\Java_Homework> javac .\Armstrong.java
PS D:\Java_Homework> java Armstrong
armstrong number
```

4. WAP to accept a number from the user and check whether the number is prime or not.

```
public class Primenumber{
        public static void main(String args[]){
         int i,m=0,flag=0;
         int n=3;//it is the number to be checked
         m=n/2;
         if(n==0||n==1){
          System.out.println(n+" is not prime number");
         }else{
          for(i=2;i<=m;i++){
           if(n%i==0){
            System.out.println(n+" is not prime number");
            flag=1;
            break;
           }
          }
          if(flag==0)   { System.out.println(n+" is prime number"); }
         }//end of else
       }
       }
```

OUTPUT

```
PS D:\Java_Homework> javac .\Primenumber.java
PS D:\Java_Homework> java Primenumber
3 is prime number
PS D:\Java_Homework>
```

5. WAP to accept a base and exponent and calculate the power

```java
public class Power {

    public static void main(String[] args) {

        int base = 3, exponent = 4;

        long result = 1;

        while (exponent != 0)
        {
            result *= base;
            --exponent;
        }

        System.out.println("Answer = " + result);
    }
}
```

OUTPUT

```
PS D:\Java_Homework> javac Power.java
PS D:\Java_Homework> java Power
Answer = 81
```

6.WAP to accept a number from the user and check whether the number is armstrong or not.

```
class Armstrong{
    public static void main(String[] args)  {
      int c=0,a,temp;
      int n=153;//It is the number to check armstrong
      temp=n;
      while(n>0)
      {
      a=n%10;
      n=n/10;
      c=c+(a*a*a);
      }
      if(temp==c)
      System.out.println("armstrong number");
      else
          System.out.println("Not armstrong number");
     }
  }
```

OUTPUT

```
PS D:\Java_Homework> javac  Armstrong.java
PS D:\Java_Homework> java  Armstrong
Not armstrong number
```

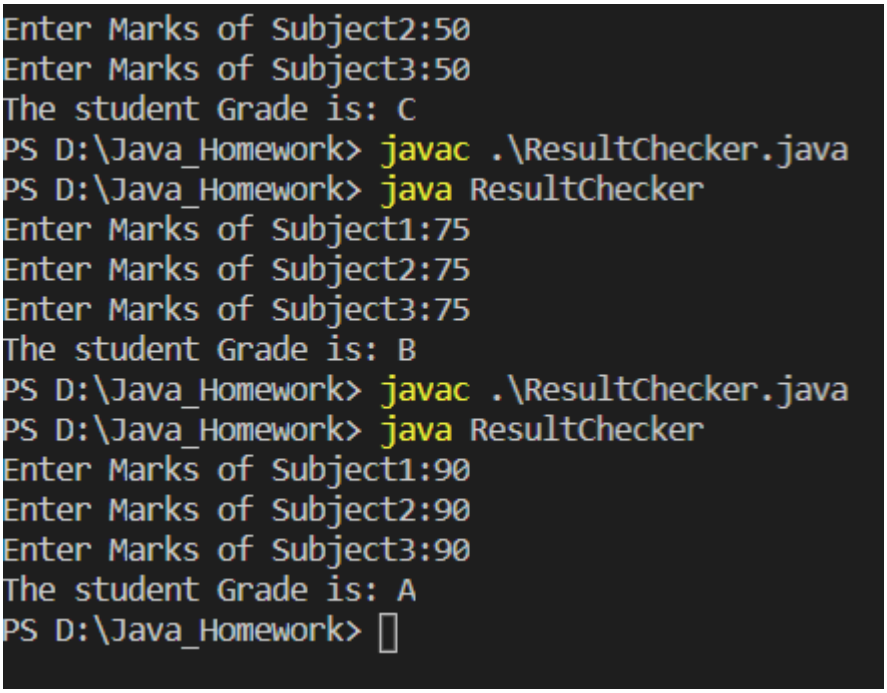
7.WAP to accept rollno, name, marks of 3 subject and calculate percentage and grade(Distiction, First class, Second class, Pass class or FAIL).

```
import java.util.Scanner;

public class ResultChecker
{
    public static void main(String args[])
    {
        int marks[] = new int[6];
        int i;
        float total=0, avg;
        Scanner scanner = new Scanner(System.in);


        for(i=0; i<3; i++) {
           System.out.print("Enter Marks of Subject"+(i+1)+":");
           marks[i] = scanner.nextInt();
           total = total + marks[i];
        }
        scanner.close();
        //Calculating average here
        avg = total/3;
        System.out.print("The student Grade is: ");
        if(avg>=80)
        {
            System.out.print("A");
        }
        else if(avg>=60 && avg<80)
        {
           System.out.print("B");
        }
        else if(avg>=40 && avg<60)
        {
            System.out.print("C");
        }
        else
        {
            System.out.print("D");
        }
    }
}
```

OUTPUT


Enter Marks of Subject2:50
Enter Marks of Subject3:50
The student Grade is: C
PS D:\Java_Homework> javac .\ResultChecker.java
PS D:\Java_Homework> java ResultChecker
Enter Marks of Subject1:75
Enter Marks of Subject2:75
Enter Marks of Subject3:75
The student Grade is: B
PS D:\Java_Homework> javac .\ResultChecker.java
PS D:\Java_Homework> java ResultChecker
Enter Marks of Subject1:90
Enter Marks of Subject2:90
Enter Marks of Subject3:90
The student Grade is: A
PS D:\Java_Homework>

8.WAP to accept three number from the user and print maximum and minimum number.

```
import java.util.Scanner;
public class LargestAndSmallest
{
  public static void main(String[] args)
  {
    Scanner sc= new Scanner(System.in);    //System.in is a standard
input stream
    System.out.print("Enter first number- ");
    int num1= sc.nextInt();
    System.out.print("Enter second number- ");
    int num2= sc.nextInt();
    System.out.print("Enter third number- ");
    int num3= sc.nextInt();

        if( num1 >= num2 && num1 >= num3)
                System.out.println(num1+" is the Greatest");

        else if (num2 >= num1 && num2 >= num3)
                System.out.println(num2+" is the Greatest");

        else
                System.out.println(num3+" is the Greatest");
  }
}
```

OUTPUT

```
Enter Marks of Subject2:50
Enter Marks of Subject3:50
The student Grade is: C
PS D:\Java_Homework> javac .\ResultChecker.java
PS D:\Java_Homework> java ResultChecker
Enter Marks of Subject1:75
Enter Marks of Subject2:75
Enter Marks of Subject3:75
The student Grade is: B
PS D:\Java_Homework> javac .\ResultChecker.java
PS D:\Java_Homework> java ResultChecker
Enter Marks of Subject1:90
Enter Marks of Subject2:90
Enter Marks of Subject3:90
The student Grade is: A
PS D:\Java_Homework>
```

9. WAP to accept a number and print the multiplication table of a number.

```java
import java.util.Scanner;
public class Multiply
{
    public static void main(String[] args)
    {
        Scanner s = new Scanner(System.in);
    System.out.print("Enter number:");
    int n=s.nextInt();
        for(int i=1; i <= 10; i++)
        {
            System.out.println(n+" * "+i+" = "+n*i);
        }
    }
}
```

OUTPUT

```
PS D:\Java_Homework> javac .\Multiply.java
PS D:\Java_Homework> java Multiply
Enter number:3
3 * 1 = 3
3 * 2 = 6
3 * 3 = 9
3 * 4 = 12
3 * 5 = 15
3 * 6 = 18
3 * 7 = 21
3 * 8 = 24
3 * 9 = 27
3 * 10 = 30
```