LAB 2

Develop a Java program to create a class Student with  
members usn, name, an array credits and an array marks.  
Include methods to accept and display details and a  
method to calculate SGPA of a student.

import java.util.Scanner;  
class Student{  
String usn;  
String name;  
int[] credits;  
int[] marks;  
void acceptDetails()  
{  
Scanner mark=new Scanner(System.in);  
System.out.println("enter usn:");  
usn=mark.nextLine();  
System.out.println("enter name:");  
name=mark.nextLine();  
System.out.println("enter number of subjects:");  
int n=mark.nextInt();  
credits = new int[n];  
marks = new int[n];  
 for (int i = 0; i<credits.length; i++) {  
            System.out.print("Enter credits and marks:");  
            credits[i] = mark.nextInt();  
            marks[i] = mark.nextInt();  
        }  
}  
void calculateSgpa()  
{  
int cred= 0;  
int mark= 0;  
  
for(int i =0; i <credits.length; i++) {  
   cred+=credits[i];  
   mark+=marks[i];  
}  
System.out.println("total credits:"+cred);  
System.out.println("total marks:"+mark);  
double sgp=0;  
for(int i =0; i <credits.length; i++)  
{  
   sgp+=(marks[i]/10)\*credits[i];  
}  
double sgpa=sgp/cred;  
System.out.println("SGPA is:"+sgpa);  
}  
void displayDetails()  
{  
  System.out.println("usn:"+usn);  
  System.out.println("name:"+name);  
  for (int i = 0; i <credits.length; i++) {  
      System.out.println("Credits for subject "+(i+1)+" is: "+credits[i]);  
      System.out.println("marks for subject "+(i+1)+" is: "+marks[i]);  
  }  
}  
public static void main(String[] Args)  
  { int a,i;  
    Scanner object=new Scanner(System.in);  
    System.out.println("enter number of students:");  
    a=object.nextInt();  
    for (i = 0; i <a; i++){  
    Student obj=new Student();  
    obj.acceptDetails();  
    obj.displayDetails();  
    obj.calculateSgpa();  
}  
}  
}

