

SGPA calculator

```
import java.util.Scanner;
```

```
class Subject
```

```
{
```

```
    int subjectmarks;
```

```
    int credits;
```

```
    int grade;
```

```
}
```

```
class student
```

```
{
```

```
    Subject subject[7];
```

```
    Scanner s = new Scanner(System.in);
```

```
    String name;
```

```
    String ven;
```

```
    double sgpa = 0;
```

```
    student()
```

```
{
```

```
    int i;
```

```
    subject = new Subject[9];
```

```
    for (i = 0; i < 9; i++)
```

```
    {
```

```
        subject[i] = new Subject();
```

```
    }
```

```
}
```

```
void getmarks()
```

```
{
```

```
    for (int i = 0; i < 8; i++)
```

```
    {
```

```
        System.out.println("enter the subjectmarks of the subject" +  
                             (i+1) + " : ");
```

```
        subject[i].subjectmarks = s.nextInt();
```

→ constructor


```
if (subject[i].subjectmarks >= 90)
```

```
{
```

```
    subject[i].grade = 10;
```

```
}
```

```
else if (subject[i].subjectmarks >= 80)
```

```
{
```

```
    subject[i].grade = 9;
```

```
}
```

```
else if (subject[i].subjectmarks >= 70)
```

```
{
```

```
    subject[i].grade = 8;
```

```
}
```

```
else if (subject[i].subjectmarks >= 60)
```

```
{
```

```
    subject[i].grade = 7;
```

```
}
```

```
else if (subject[i].subjectmarks >= 50)
```

```
{
```

```
    subject[i].grade = 6;
```

```
}
```

```
else if (subject[i].subjectmarks >= 40)
```

```
{
```

```
    subject[i].grade = 5;
```

```
}
```

```
else
```

```
{
```

```
    subject[i].grade = 0;
```

```
}
```

```
System.out.println("enter the credits of the subject" + (i+1) + ":");
```

```
subject[i].credits = s.nextInt();
```

```
}
```

```
}
```



```

void computeSgpa()
{
    int totalCredits = 0;
    int totalCreditsHours = 0;
    for(int i = 0; i < 8; i++)
    {
        totalCredits += (subject[i].grade * subject[i].credits);
        totalCreditsHours += (subject[i].credits);
    }
    sgpa = (double) totalCredits / totalCreditsHours;
    System.out.println("SGPA:" + sgpa);
}

```

}

```

class StudentMain
{

```

```

    public static void main(String args[])
    {

```

```

        Student s1 = new Student();
        s1.getStudentDetails();
        s1.getMarks();
        s1.computeSgpa();
    }

```

}

Output

Enter the name:

Pooja

Enter the usn:

IBM22CS205

Enter the subject marks of the subject:

93

enter the credits of the subject 1:

21

enter the subjectmarks of the subject 2:

901

enter the credits of the subject 2:

21

enter the subjectmarks of the subject 3:

91

enter the credits of the subject 3:

3

enter the subjectmarks of the subject 4:

88

enter the credits of the subject 4:

1

enter the subjectmarks of the subject 5:

92

enter the credits of the subject 5:

1

enter the subjectmarks of the subject 6:

94

enter the credits of the subject 6:

3

enter the subjectmarks of the subject 7:

87

enter the credits of the subject 7:

3

enter the subjectmarks of the subject 8:

96

enter the credits of the subject 8:

1

SGPA: 9.8