

lab 6.

PAPER SOFT

Date

Page

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

```
class Student
```

```
{
```

```
    String usn;
```

```
    String name;
```

```
    int sem;
```

```
    public Student(String usn, String name, int sem) {
```

```
        this.usn = usn;
```

```
        this.name = name;
```

```
        this.sem = sem;
```

```
    }
```

```
}
```

```
class Test extends Student {
```

```
    int [] CIE-marks;
```

```
    int [] Credits;
```

```
    public Test(String usn, String name, int sem,  
                int [] CIE-marks, int [] Credits) {
```

```
        super(usn, name, sem);
```

```
        this.CIE-marks = CIE-marks;
```

```
        this.Credits = Credits;
```


}

}

Class Exam extends Test {

int[] See-marks;

public Exam(String usn, String name, int Sem,
int[] Cie-marks, int[] credits, int[] See-marks)

{

super(usn, name, Sem, Cie-marks, credits);

this.See-marks = See-marks;

}

}

Class Result extends Exam {

public Result(String usn, String name, int Sem,
int[] Cie-marks, int[] credits, int[] See-marks)

{

super(usn, name, Sem, Cie-marks, credits, See-marks);

}

double sgpa;

char[] grade = new char[credits.length];

public void cal-grade-sgpa(int tot-credits) {

int sum = 0

for(int i=0; i<credits.length; i++) {


```
double marks = (ie-marks[i] + (see-marks[i]/2.0));
```

```
if (marks >= 90) {
```

```
    sum += credits[i] * 10;
```

```
    grade[i] = 'S';
```

```
} else if (marks >= 80 && marks < 90) {
```

```
    sum += credits[i] * 9;
```

```
    grade[i] = 'A';
```

```
} else if (marks >= 70 && marks < 80) {
```

```
    sum += credits[i] * 8;
```

```
    grade[i] = 'B';
```

```
} else if (marks >= 60 && marks < 70) {
```

```
    sum += credits[i] * 7;
```

```
    grade[i] = 'C';
```

```
} else if (marks >= 50 && marks < 60) {
```

```
    sum += credits[i] * 6;
```

```
    grade[i] = 'D';
```

```
} else if (marks >= 40 && marks < 50) {
```

```
    sum += credits[i] * 5;
```

```
    grade[i] = 'E';
```

```
} else sum
```

```
    sum += credits[i] * 0;
```

```
    grade[i] = 'F';
```

```
}
```

```
}
```


$Sgpa = \text{sum} * 1.0 / \text{tot-credits}$

}

public void display()

{

System.out.println("USN:" + usn);

System.out.println("Name:" + name);

System.out.println("SEM:" + sem);

System.out.println("Grades of each Subject");

for (int i = 0; i < credits.length; i++)

{

System.out.println("Subject" + (i + 1) + ": " + grade[i]);

}

System.out.println("SGPA, " + sgpa);

}

}

class Cricket {

public static void main(String args[]) {

Scanner sc = new Scanner(System.in);

System.out.print("Enter number of Students:");

int n = sc.nextInt();

Result[] r = new Result[n];

int[] tot-credits = new int[n]


```
for(int i=0; i<n; i++)
{
    System.out.println(" --- Student" + (i+1) + " ---");
    System.out.print("Enter usn: ");
    String usn = SC.next();
    System.out.print("Enter name: ");
    String name = SC.next();
    System.out.print("Enter sem: ");
    int sem = SC.nextInt();
    System.out.print("Enter number of Subjects: ");
    int m = SC.nextInt();
    System.out.print("Enter cge marks: ");
    int[] cge_marks = new int[m];
    for(int j=0; j<m; j++)
    {
        int marks1 = SC.nextInt();
        cge_marks[j] = marks1;
    }
    System.out.print("Enter credits: ");
    int[] credits = new int[m];
    int sum = 0;
    for(int j=0; j<m; j++)
    {
```



```

        int marks1 = SC.nextInt();
        credits[i] = marks1;
        sum += credits[i];
    }

```

```

    tot-credits[i] = sum;
    System.out.println("Enter See-marks,");
    int[] See-marks = new int[n1];
    for (int j=0; j<n1; j++)
    {

```

```

        int marks1 = SC.nextInt();
        See-marks[j] = marks1;
    }

```

```

    S[i] = new Result(usn, name, Sem, Cie-marks,
        credits-See-marks);
}

```

```

    for (int K=0; K<n; K++)
    {

```

```

        System.out.println("Details of Student
            " + (K+1) + ":");

```

```

        S[K].cal-grade_Sypa(tot-credits[K]);
        S[K].display();
    }
}

```

```

}

```