

```
class Parent {  
    int a, b;  
  
    Parent() {  
        a = 10;  
        b = 15;  
    }  
  
    Parent(int x, int y) {  
        a = x;  
        b = y;  
    }  
  
    void disp() {  
        System.out.println("a = " + a + ", b = " + b);  
    }  
}  
  
public class Main {  
    public static void main(String[] args) {  
        Parent obj1 = new Parent();  
        obj1.disp();  
  
        Parent obj2 = new Parent(20, 25);  
        obj2.disp();  
    }  
}
```

```
java -cp /tmp/LHJsjaYp0X/Main
```

```
a = 10, b = 15
```

```
a = 20, b = 25
```

```
=== Code Execution Successful ===
```

```

class Parent {
    void even() {
        for (int i = 1; i <= 20; i++) {
            if (i % 2 == 0) System.out.print(i + " ");
        }
        System.out.println();
    }
    void odd() {
        for (int i = 1; i <= 20; i++) {
            if (i % 2 != 0) System.out.print(i + " ");
        }
        System.out.println();
    }
    void prime() {
        for (int i = 1; i <= 20; i++) {
            if (isPrime(i)) System.out.print(i + " ");
        }
        System.out.println();
    }
    boolean isPrime(int num) {
        if (num <= 1) return false;
        for (int i = 2; i <= Math.sqrt(num); i++) {
            if (num % i == 0) return false;
        }
        return true;
    }
}

```

```

}

class Child extends Parent {
    @Override
    void even() {

```

```

^ java -cp /tmp/53zhIC0Ho3/Main
2 4 6 8 10 12 14 16 18 20 22 24 26 28 30
1 3 5 7 9 11 13 15 17 19 21 23 25 27 29
2 3 5 7 11 13 17 19 23 29

```

```

=== Code Execution Successful ===

```

```

1- import java.util.Scanner;
2- public class CollegeUsers {
3-     public static void main(String[] args) {
4         Scanner scanner = new Scanner(System.in);
5
6         System.out.print("Enter the number of student users: ");
7         int studentUsers = scanner.nextInt();
8
9         System.out.print("Enter the number of staff users: ");
10        int staffUsers = scanner.nextInt();
11
12        int nonTeachingStaffUsers = staffUsers / 3;
13
14        int totalUsers = studentUsers + staffUsers + nonTeachingStaffUsers;
15
16        System.out.println("Number of student users: " + studentUsers);
17        System.out.println("Number of staff users: " + staffUsers);
18        System.out.println("Number of non-teaching staff users: " +
19            nonTeachingStaffUsers);
20        System.out.println("Total number of users: " + totalUsers);
21    }
}

```

```

java -cp /tmp/Y8MJebppk/CollegeUsers
Enter the number of student users: 100
Enter the number of staff users: 30
Number of student users: 100
Number of staff users: 30
Number of non-teaching staff users: 10
Total number of users: 140

```

```

=== Code Execution Successful ===

```