

Objects with an *Array* field

# Recall:

- An array is a data structure of a particular set of data.
- An object contains fields of data types.
- Therefore it is possible to have an array of data types as a field in an object!

# For example:

- Define a class called Student.
- This class will have the following fields:
  - Student number // id number
  - An array of four marks // of type double
  - Average // the mean average of the four marks

# Setting it up.

*// to create an array as a field, declare an array as you normally would inside the class definition*

```
public class Student {  
    int stunum; // student number  
    double [] marks = new double[4]; //  
    // note: you do not need to create the array in  
    // the field declaration. You can simply declare  
    // the variable marks if you wish  
    double avg;
```

# Creating the object

Student s;

**s = new Student();**

s.stunum = 555555;

s.marks[0]=60;

s.marks[1]=70;

s.marks[2]=80;

s.marks[3]=90;

# Question

- Should the user be allowed to enter a value for average?
- Why? Why not?