

# Overloading Methods

# What is Overloading Methods?

- Methods overloading is the capability to declare several versions of the same method. Each one of them should be with the same name and with the same returned type.
- The difference should be either the number of the method parameters and/or their types.

# Overloading Methods Sample

Rectangle
+width: double +height: double
+Rectangle() +Rectangle(widthVal: double, heightVal: double) +area(): double +perimeter(): double +set(value: double): void +set(width: double, height: double): void

# Overloading Methods Sample

```
class Rectangle
{
    double width;
    double height;
    Rectangle() { }
    Rectangle(widthVal double, heightVal double)
    {
        width = widthVal;
        height = heightVal;
    }
    double area()
    {
        return width * height;
    }
    double perimeter()
    {
        return 2*(width+height);
    }
    void set(double val)
    {
        width = val;
        height = val;
    }
    void set(double valA, double valB)
    {
        width = valA;
        height = valB;
    }
}
```

