On this course, we covered only a brief introduction to classes, so it can be difficult to appreciate their usefulness at this stage.

You will learn more about this more advanced topic if you go on to study Further Computer Programming for Example.

There are several reasons why you may find it increasingly useful to use object oriented programming

Classes break your code down into smaller sections making it easier to fix and reuse sections of code, especially in larger programs.

Classes allow code be reused and modified easily via inheritance

Objects of different classes can have methods with the same name, making code more readable and intiutive.

\*

A class definition begins with the keyword, class

Followed by the class name

Parentheses

And a colon

The contents of the class (the attributes and methods) are indented.

Every class has a constructor function

\*

**self.** behaves like the pronoun **'my’**

Inside the class we use **self** to prefix class attributes and methods

Outside of the class self is replaced by the name of the specific object created

**\***

Pause the video now and attempt these exercises.

This is quite an advanced topic so don’t worry too much if you are finding it challenging at this point.

Videos showing worked solutions, and the code, can be found on blackboard.

\*

A child class can inherit attributes from a parent class

The name of the parent class appears in the parentheses after the child class name

When the super function is called, it calls the method after the dot from the parent class

In this case, self.num and self.den are created.

Additional methods can then be created for the child class

Pause the video now and attempt these exercises.

A video showing a worked solution, and the code, can be found on blackboard

Again, remember this is quite an advanced topic.

Just have a go and see how you get on.