Hello World

It is customary that the first program that you write in a programming language is the "Hello World" program.

So as not to break this great tradition, let's start our Python journey there!

Python lets you output text to the **Console**, in Repl.it you will find that on the right-hand side.

You can output a piece of text using the `print()` function (more on functions later in the course).

Normally our python program will have a **main.py** source file or "script" which is where we will write our code. You will see this on the left side in the **Files** area

For a good portion of this course, we will be putting our code within this file.

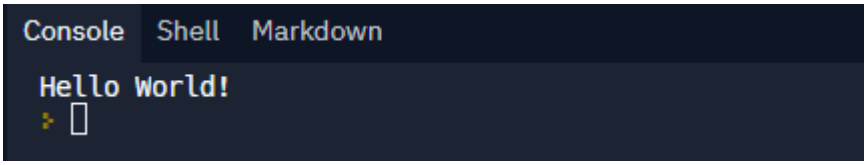
1. Hello World!

For now, we can output a piece of text to the console by putting the following line into **main.py**.

```
print("Hello World!")
```

Once you have added this line, hit the Run button at the top of the page.

You should then see `Hello World!` outputted to the **Console**.



1.1 Wow! What Just Happened?

So, when you hit the run button, Python ran your code and outputted it to the **Console**. Without getting into the execution model, it essentially converted the code from **main.py** into something that could then be executed on a computer.

If you would like to execute **main.py** manually without the run button. Go to the **Shell** (next to the console) and type:

```
python main.py
```

This will then convert your code for execution and then run it.

1.2 A note on TASKs

Throughout this course, you will see TASKs (like the one below). These are tasks that you should complete. Each Task will be worth a portion of your overall grade (see the lesson on **How to Use This Course**). Note that some tasks will invariably be harder than others, so my advice is to make sure you complete the simple ones, even if you are struggling with a harder task.

A **TASK** will always look like the one given below. Note, this is an actual **TASK** and as it is the only one for this lesson, complete it and gain 2 lovely points!

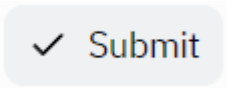
TASKs will normally appear at the bottom of a lesson, mini-program, or exercise.

> ## === TASK ===
>
> Output `"Hello World! is cool!"` to the **Console**

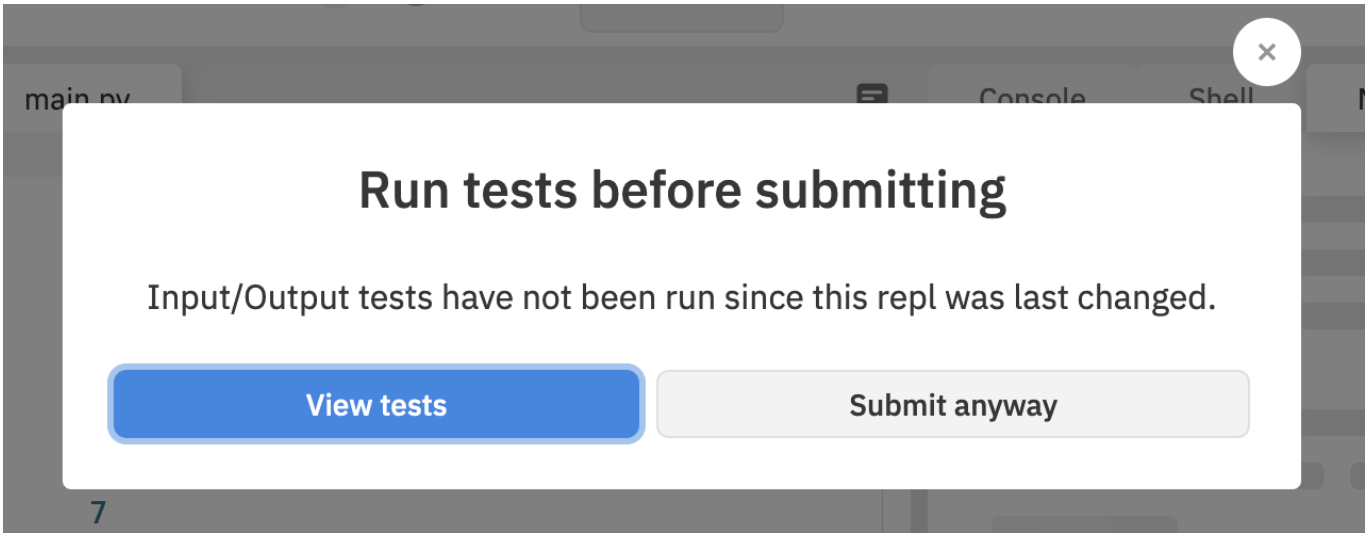
Note that when you hit the submit button you will be prompted as to whether you passed the input/output test. To pass this test you will need the output to exactly match `"Hello World!"`.

2. Submitting

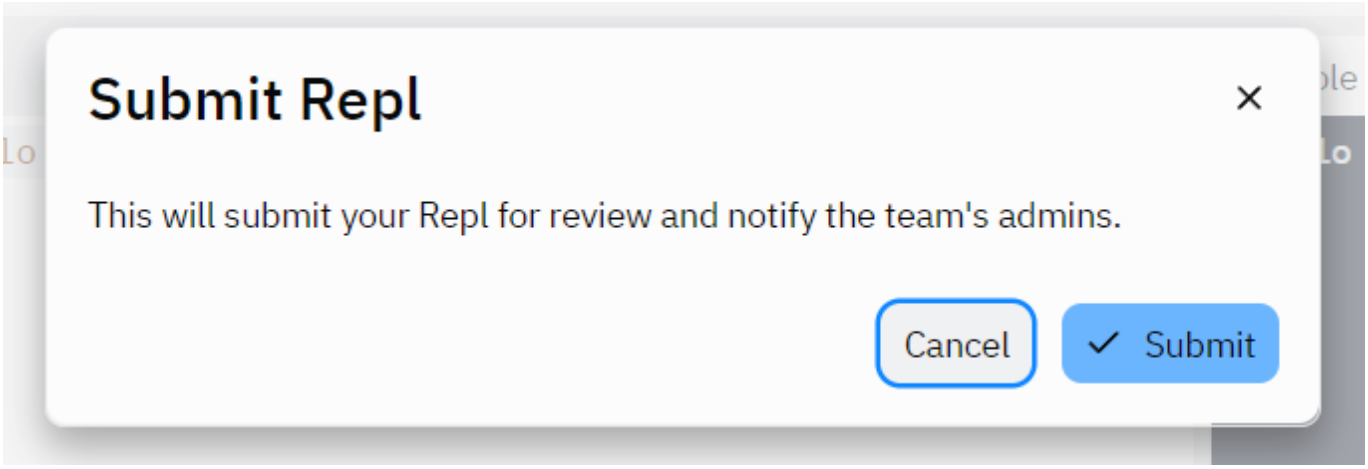
When you are ready to submit you can do so via the submit button in the top right-hand corner.



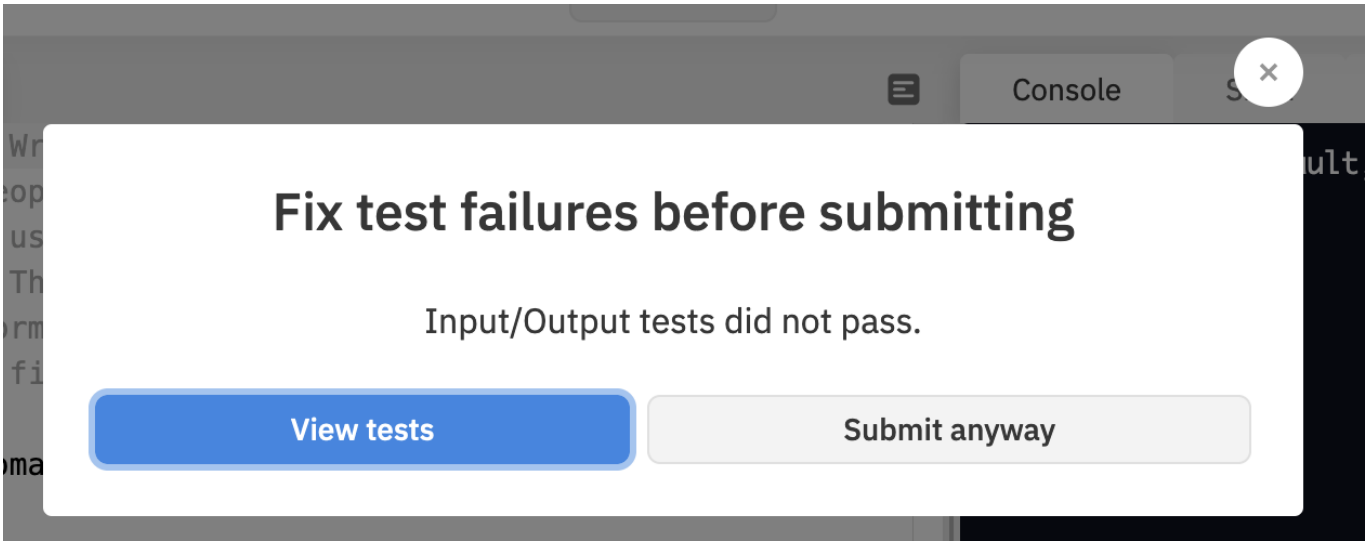
The first time you do that you may get the following pop-up which will prompt you that you have not run the tests yet.



Click on ***View tests*** and run the tests. If you are successful then you can submit again and you will get the following prompt.



If you fail the tests and try to submit you will get the following prompt. You can choose to ***Submit anyway***, please make sure you submit before the ***Due Date***



3. Resubmitting

Once you have submitted you can resubmit changes at any time to improve your code and pass more tests. I suggest you submit it each time you have passed a test.