## JS JavaScript Tutorials — Variables

## What is a Variable?

A variable is used to store data values, and so we can use them to hold values and so can use them to manipulate data. For example let's create some variables to hold some numbers. We will be adapting the previous task that we did that looked like this:

```
File • Add library Share
                                                            HTML CSS JavaScript Console Output
                                                                                                                                    Login or Register Blog Help
HTML ▼
                                                                                                                                  Run with JS Auto-run JS 🗸 🥕
                                                                                Output
<!DOCTYPE html>
                                                                               HELLO WORLD!
<head>
  <meta charset="utf-8">
  <title>JavaScript</title>
</head>
  <div id="print"></div>
  <script>
       document.getElementById("print").innerHTML = "HELLO WORLD!";
  </script>
</html>
```

Creating a variable in Javascript is easy! We simply type var then the name of our variable.

When naming variables, it is important to have a sensible name so that when you or other people look at your code they can make sense of what the variable does. This goes for not only JavaScript but all coding.

And so we can create a variable, like so:

```
<script>
  var number1 = 5;
  var number2 = 6;
</script>
```

TRY THIS: What would happen if we did this

```
var number1 = 5;
var number1 = 6;
```

What value would the number1 variable have?

Answer: 6, because the variable is rewritten.

We can make it so the user can input the values of the variables by adding this section of code:



</body>

## JS JavaScript Tutorials — Variables

This code here, <input id="number1" type="number"> displays a text box for the user and is associated to the id given, this allows us to get the value entered in our JavaScript code.

This line, <button type="button" onclick="myFunction()">Submit</button> allows us to display a button and when it is clicked it activates the function in our JavaScript code named myFunction(). A function is a block of code that is designed to do a specific task. It can be called whenever you like. We create a function like so:

```
<script>
  function myFunction(){
    //CODE GOES HERE
  }
</script>
```

We then now edit our existing number variables to get the inputs from the text boxes like so:

```
var number1 = document.getElementById("number1").value;
var number2 = document.getElementById("number2").value;
```

This allows us to assign the inputs to our variables. We can then have another variable named total, in this we can add the values of the variables like so:

```
<script>
function myFunction() {
    var number1 = document.getElementById("number1").value;
    var number2 = document.getElementById("number2").value;
    var total = (+number1 + +number2);
    document.getElementById("print").innerHTML = "your total is " + total;
}
</script>
```

Notice the last line before the </script> tag? This is the line we used when printing out our results in the previous task. Remember the div id should match what's in the brackets otherwise nothing will show!

If we put text into the inputs then the programme will treat the value as a 0 as it ignores the text.