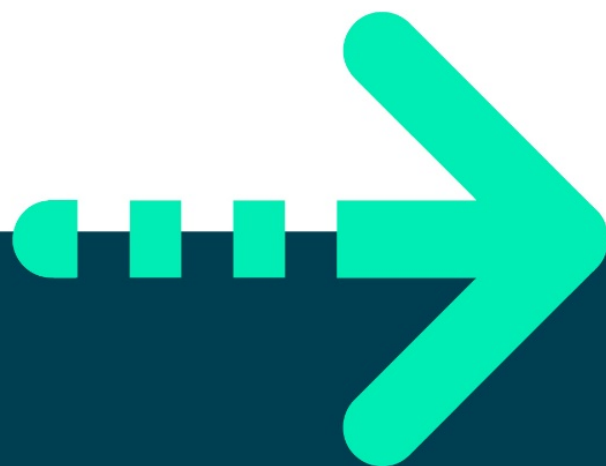




WEB APPLICATION ARCHITECTURES





Loops

Objectives

In this exercise you will learn how to create Loops

Reference material

This exercise is based on material from the “Loops” chapter.

Overview

- In this lab you'll exercise creating loops

Estimated duration

The estimated duration for this lab is 30 minutes.

Completed solution

There is a completed solution for this lab.

Step by step instructions

Practice using variables and if statements

1. Create a new website in Code, or open an existing website you've been working on
2. Use the example given on the slides to display the day of the week's name on the page
3. Run and test your code

Practice using a simple while loop:

4. Use a while loop to go through all the numbers between 1 and 100 and add them all up together. Display the result with a suitable label

Practice using a simple for loop:

5. Use a for loop to go through all the numbers between 1 and 100 and display only the odd numbers

Tip: To examine if variable 'i' is odd do:

```
if (i % 2 == 1) {  
    document.write(i + ",");  
}
```



6. In the above example, instead of using the *document.write()* function on each iteration of the loop, add each text to a variable called *result*. Use a single *document.write(result)*; to display all the odd numbers after the loop.
This method will run faster and it is also easier to debug because you can view contents of a variable.
7. Run and test your code
8. Use the example given on the slides to create and display a 10 row x 10 columns table.
9. Run and test your code
10. As you write each "*<td>xxx</td>*" part, instead of printing *xxx* just print the product of "row * column". This should result in a multiplication table
Tip: *table += "<td>"+column * rows + "</td>";*
11. Run and test your code
Note: Style your table if the cells are too close, e.g:

```
<style>
table { width :50%; }
```

