**JavaScript**

**ASI = Automatic Semicolon Insertion.**

Runs between **<script></script>** tags.

JavaScript is loosely typed; variables don’t need to be given types. Variables can be re-declared as other types. E.g. let answer = 42; let answer = “Fourty Two”;

Use **let** to declare a variable. E.g. let answer = 42;

Variables declared with **let** are only accessible in the scope in which they are created.

Variables can also be declared with **var**. e.g var answer = 42; // Legacy

Variables can also be declared with **const**. These must be initialised with a value, as they cannot be changed once created.

Functions are declared with the keyword **function**. E.g. function thisFunction( ){ }.

Functions can be written with arrow syntax, when all you want to do is return a value.  
e.g. let thisFunction = => “Returned value”;

**Closure**

An inner function that has access to the outer function’s scope chain.

Closure has:

* Its own scope
* Outer function scope
* Global scope

**Arrays**

Arrays are not typed; they can contain any combination of data types. They are dynamically sized.

Array.push(“ElementToAdd” ) adds to an array, array.pop(“ElementToRemove” ) removes an item.

Javascript uses **forOf** loops: for (**let** item **of** array){ }

forEach loop syntax: myArray.forEach(value, index, array){ }

**Events**