

<https://github.com/narasimhareddyprostack/Feb-9am-CR/blob/master/JS%20Function/index.htm>

JavaScript Functions

What's a Function?

A JS function is a **block of code** designed to perform a particular task.

A function is a **block of code** that will be executed only by an occurrence of an event at that time function is called. A function can be called from anywhere within the HTML page.

Function can be defined in the beginning of the <head><script> tag.

JS functions are defined with the **“function”** keyword.

Or

A function is **group of reusable code** which can be called anywhere in your program. This eliminates the need of writing same code again and again.

This will help programmer to write modular code.

This benefit is also known as **“Code reusability”**.









JavaScript Function Syntax

A JavaScript function is defined with the function keyword, followed by a name, followed by parentheses (). Function names can contain letters, digits, underscores, and dollar signs.

Syntax

```
function funName(arg1, arg2,... , argn)
```

```
{  
    Statment 1;  
    Statment 2;  
    Statment 3;  
    Statment 4;  
    Statment 5;  
    Statment 6;  
}
```

```
function makeSandwich(, , ) {  
      
    let sandwich =  +  + ;  
    return  ;  
}
```

Note: Explanation

Function is big term in programming languages; almost all function main use is code reusability.

A piece of code whatever you implemented the same code you want to use multiple times we are implementing functions.

Code Example:

```
<!DOCTYPE html>
```

```
<html>
```

```
<head>
```

```
    <title>Java Script Training - Topic</title>
```

```
    <link href="demo.css" rel="stylesheet" type="text/css">
```

```
<script type="text/javascript">
```

```
function display()  
{  
    alert("Function called");  
}
```

This part we are calling as “ Called Part”

```
function display()
```

```
{
```

```
        alert("Function called");
    }
</script>
</head>
<body>
<h1 id="dt"> Event Example</h1>
```

```
<button onclick="display()">Submit</button>
<button onclick="display()">Submit</button>
<button onclick="display()">Submit</button>
```

Calling Part

```
</body>
</html>
```

The return statement

The return statement is used to specify the value that is returned from function. So, functions that are going to return a value must use the return statement.

Note: A JS function can have an optional return statement.

return Keyword

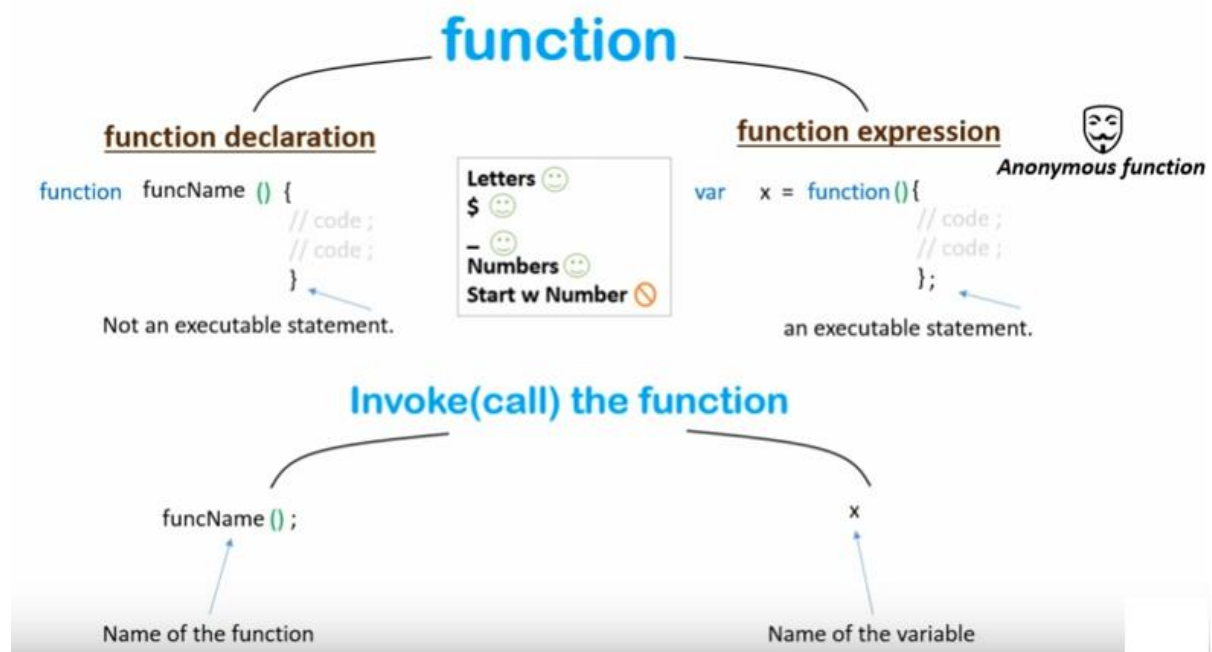
The **return** statement returns a **value** from the **function** and stops the **execution** of that **function**.

```
function add (a, b) {  
    return a;  
  
    var c = a + b;  
    return c;  
}
```

Execute and The execution stops after returning the value of a

Won't execute

add (5, 10) This will return **5** not **15**.



The Lifetime of JS Variables.

Local JS Variables

A variable declared **within a JS function** becomes LOCAL and can only be accessed within that function.

Scope: variable has local scope.

You can have local variables with the **same name in different functions**, because local variables are only recognized by the function in which they are declared.

Local variables are deleted as soon as the function is completed.

Global JS Variables

Variables declared outside a function become GLOBAL. All Scripts and functions on the web page can access it.

Note: Global variables are deleted when you close the page.

Global variables are unique.

