

# Full Stack Development

## Week 10:

### Aim: Write a Program on jQuery form events

#### Description:

jQuery events are the actions that can be detected by your web application. They are used to create dynamic web pages. An event shows the exact moment when something happens.

These are some examples of events.

- A mouse click
- An HTML form submission
- A web page loading
- A keystroke on the keyboard
- Scrolling of the web page etc.

#### a. jQuery submit()

jQuery submit event is sent to the element when the user attempts to submit a form.

This event is only attached to the `<form>` element. Forms can be submitted either by clicking on the submit button or by pressing the enter button on the keyboard when that certain form elements have focus. When the submit event occurs, the `submit()` method attaches a function with it to run.

#### Syntax:

1. `$(selector).submit()`

It triggers the submit event for selected elements.

`$(selector).submit(function)`

It adds a function to the submit event.

## Parameters of jQuery submit() event

Parameter	Description
Function	It is an optional parameter. It is used to specify the function to run when the submit event is executed.

## Example of jQuery submit() event

Let's take an example to demonstrate jQuery submit() event.

```
1. <!DOCTYPE html>
2. <html lang="en">
3. <head>
4.   <meta charset="utf-8">
5.   <title>submit demo</title>
6.   <style>
7.     p {
8.       margin: 0;
9.       color: blue;
10.    }
11.    div,p {
12.      margin-left: 10px;
13.    }
14.    span {
15.      color: red;
16.    }
17.  </style>
18.  <script src="https://code.jquery.com/jquery-1.10.2.js"></script>
19. </head>
20. <body>
21.  <p>Type 'full stack' to submit this form finally.</p>
22.  <form action="javascript:alert( 'success!' );">
23.    <div>
```

```

24. <input type="text">
25. <input type="submit">
26. </div>
27. </form>
28. <span> </span>
29. <script>
30. $( "form" ).submit(function( event ) {
31.   if ( $( "input:first" ).val() === "javatpoint" ) {
32.     $( "span" ).text( "Submitted Successfully." ).show();
33.     return;
34.   }
35.   $( "span" ).text( "Not valid!" ).show().fadeOut( 2000 );
36.   event.preventDefault();
37. });
38. </script>
39. </body>
40. </html>

```

Output:

Type 'full stack' to submit this form finally.

## b. jQuery change()

jQuery change event occurs when the value of an element is changed. It works only on form fields. When the change event occurs, the change () method attaches a function with it to run.

Note: This event is limited to <input> elements, <textarea> boxes and <select> elements.

- **For select boxes, checkboxes, and radio buttons:** The event is fired immediately when the user makes a selection with the mouse.
- **For the other element types:** The event is occurred when the field loses focus.

## Syntax:

1. `$(selector).change()`

It triggers the change event for selected elements.

`$(selector).change(function)`

It adds a function to the change event.

## Parameters of jQuery change() event

Parameter	Description
Function	It is an optional parameter. It is used to specify the function to run when the change event occurs for the selected elements.

## Example of jQuery change() event

Let's take an example to demonstrate jQuery change() event.

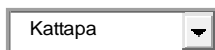
```
1. <!DOCTYPE html>
2. <html lang="en">
3. <head>
4.   <meta charset="utf-8">
5.   <title>change demo</title>
6.   <style>
7.     div {
8.       color: red;
9.     }
10.  </style>
11.  <script src="https://code.jquery.com/jquery-1.10.2.js"></script>
12. </head>
13. <body>
14.  <select id="se" name="actors" >
15.    <option>Uthappa</option>
16.    <option selected="selected">Kattapa</option>
```

```

17. <option>Veerappa</option>
18. <option>Bahubali</option>
19. <option>Bhallal Dev</option>
20. <option>Awantika</option>
21. </select>
22. <div id="loc"></div>
23. <script>
24. $( "select" ).change(function () {
25. document.getElementById("loc").innerHTML="You selected: "+document.getElem
    entById("se").value;
26. });
27. </script>
28. </body>
29. </html>

```

Output:



Let's see another example of jQuery change event where we are providing option to select multiple data using ctrl key.

```

1. <!DOCTYPE html>
2. <html lang="en">
3. <head>
4. <meta charset="utf-8">
5. <title>change demo</title>
6. <style>
7. div {
8.   color: red;
9. }
10. </style>
11. <script src="https://code.jquery.com/jquery-1.10.2.js"></script>
12. </head>
13. <body>

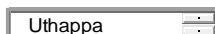
```

```

14. <select name="Employees" multiple="multiple">
15.   <option>Uthappa</option>
16.   <option selected="selected">Kattapa</option>
17.   <option>Veerappa</option>
18.   <option selected="selected">Bahubali</option>
19.   <option>Bhallal Dev</option>
20.   <option>Awantika</option>
21. </select>
22. <div></div>
23. <script>
24. $( "select" )
25.   .change(function () {
26.     var str = "";
27.     $( "select option:selected" ).each(function() {
28.       str += $( this ).text() + " ";
29.     });
30.     $( "div" ).text( str );
31.   })
32.   .change();
33. </script>
34. </body>
35. </html>

```

Output:



## c. jQuery blur()

The jQuery blur event occurs when element loses focus. It can be generated by via keyboard commands like tab key or mouse click anywhere on the page.

It makes you enable to attach a function to the event that will be executed when the element loses focus. Originally, this event was used only with form elements like `<input>`. In latest browsers, it has been extended to include all element types.

The `blur ()` method is often used together with `focus ()` method.

### Syntax:

1. `$(selector).blur()`

It triggers the blur event for selected elements.

1. `$(selector).blur(function)`

It adds a function to the blur event.

## Parameters of jQuery blur() event

Parameter	Description
Function	It is an optional parameter. It is used to specify the function to run when the element loses the focus (blur).

## Example of jQuery blur() event

Let's take an example to demonstrate jQuery blur() event.

1. `<!DOCTYPE html>`
2. `<html>`
3. `<head>`
4. `<script src="https://code.jquery.com/jquery-1.10.2.js"></script>`
5. `<script>`
6. `$(document).ready(function(){`
7.  `$("input").blur(function(){`
8.  `alert("This text box has lost its focus.");`
9.  `});`
10. `});`
11. `</script>`

12. `</head>`
13. `<body>`
14. Enter your name: `<input type="text">`
15. `</body>`
16. `</html>`

Output:

Enter your name:

**Note:** Write your name in the input field, and then click outside the field to lose focus (blur).

## d. jQuery focus()

The jQuery focus event occurs when an element gains focus. It is generated by a mouse click or by navigating to it.

This event is implicitly used to limited sets of elements such as form elements like `<input>`, `<select>` etc. and links `<a href>`. The focused elements are usually highlighted in some way by the browsers.

The focus method is often used together with blur () method.

### Syntax:

1. `$(selector).focus()`

It triggers the focus event for selected elements.

1. `$(selector).focus(function)`

It adds a function to the focus event.



## Parameters of jQuery focus() event

Parameter	Description
Function	It is an optional parameter. It is used to specify the function to run when the element gets the focus.

## Example of jQuery focus() event

Let's take an example to demonstrate jQuery focus() event.

```
1. <!doctype html>
2. <html lang="en">
3. <head>
4.   <meta charset="utf-8">
5.   <title>focus demo</title>
6.   <style>
7.     span {
8.       display: none;
9.     }
10.  </style>
11.  <script src="https://code.jquery.com/jquery-1.10.2.js"></script>
12. </head>
13. <body>
14.  <p><input type="text"> <span>Focus starts.. Write your name.</span></p>
15.  <p><input type="password"> <span>Focus starts.. Write your password.</span></p>
16.  <script>
17.    $( "input" ).focus(function() {
18.      $( this ).next( "span" ).css( "display", "inline" ).fadeOut( 2000 );
19.    });
20.  </script>
21. </body>
22. </html>
```

Output:

If you want to stop people from writing in text input box in the above example then try the following code.

It will disable to write in the text box.

1. `<!DOCTYPE html>`
2. `<html lang="en">`
3. `<head>`
4. `<meta charset="utf-8">`
5. `<title>focus demo</title>`
6. `<script src="https://code.jquery.com/jquery-1.10.2.js"></script>`
7. `</head>`
8. `<body>`
9. `<p><input type="text" value="you can't write"></p>`
10. `<p><input type="password"></p>`
11. `<script>`
12. `$( "input[type=text]" ).focus(function() {`
13. `$( this ).blur();`
14. `});`
15. `</script>`
16. `</body>`
17. `</html>`

**Result:** Thus, in the above programs successfully executed without errors  
Using jQuery form Events in eclipse editor.