Web Design – Lecture-6

INSTRUCTOR: VIDHI KESARIA

Class Schedule

- 1) Website Architecture, Design, Strategy and Planning and Creating web pages – Semantic HTML4/5

- 2) Design using CSS (covers CSS3)

- 3) Responsive web design,

- 4)Making the web page Interactive - JavaScript (Datatypes, Inline, Embedded and external JavaScript, variables, operators, loops, functions, arrays, objects

- 5) Working with DOM Model and JavaScript Events

- 6) Using Jquery & Hosting on AWS

- 7) Assignment presentation with demo, Learning Bootstrap and Project work begins (learning project planning phase)

- 8) Reviewing wireframes and learning about design & style guide, development and content gathering

- 9) Review styled website with actual content, learn about interactive javascipt

- 10) Review functional websites, learn about website Personalization techniques - Storing information, Advanced HTML5 Apis

- 11) Review personalization features and learn about performance

- 12)Review performance & learn about AngularJS (Understand Angular JS, Separation of Responsibilities, Integrating Angular JS with existing JavaScript and JQuery Applications, Global APIs)

- 13) SEO and Accessibility Techniques & Tools + Project work

- 14) Written exams, Final project submission & Demo

jQuery - https://jquery.com/

Most popular, widely used and open-source javaScript library

- HTML/DOM manipulation
- CSS manipulation
- HTML event methods
- Effects and animations
- AJAX
- Utilities

Benefits:

- Is Fast & Feature rich
- Simpler & Easier Syntax
- Works across a multitude of browsers
- Is extensible

According to w3Techs Surveys, 72% of all websites use jQuery

Adding jQuery

▶ Download the jQuery library from jQuery.com

▶ Include jQuery from a CDN, like Microsoft/ Google

    ▶ CDN – Content Delivery network improves performance

Syntax

- Basic Syntax - **$(selector).action()**

  - A $ sign to define/access jQuery
  - A (*selector*) to "query (or find)" HTML elements
  - A jQuery *action*() to be performed on the element(s)

  - **Eg.**
    - $(this).hide() - hides the current element.
    - $("p").hide() - hides all <p> elements.
    - $(".test").hide() - hides all elements with class="test".
    - $("#test").hide() - hides the element with id="test".

Best Practices

- $(document).ready(function(){

    // jQuery methods go here...

  });

or

- $(function(){

    // jQuery methods go here...

  });

Prevents any jQuery code from running before the document is finished loading (is ready).

Eg.
Trying to hide an element that is not created yet
Trying to get the size of an image that is not loaded yet

jQuery Selectors

- allow you to select and manipulate HTML element(s)
- All selectors in jQuery start with the dollar sign and parentheses: $().
- Selectors with eg.
  - Element Selector: $("p")
  - Id Selector: $("#test")
  - Class Selectro: $(.test)

  - Lets code

- More Examples:

Syntax	Description
$("*")	Selects all elements
$(this)	Selects the current HTML element
$("p.intro")	Selects all <p> elements with class="intro"
$("p:first")	Selects the first <p> element
$("ul li:first")	Selects the first element of the first
$("ul li:first-child")	Selects the first element of every
$("[href]")	Selects all elements with an href attribute
$("a[target='_blank']")	Selects all <a> elements with a target attribute value equal to "_blank"
$("a[target!='_blank']")	Selects all <a> elements with a target attribute value NOT equal to "_blank"
$(":button")	Selects all <button> elements and <input> elements of type="button"
$("tr:even")	Selects all even <tr> elements
$("tr:odd")	Selects all odd <tr> elements

Events

▶ An event represents the precise moment when something happens.

▶ DOM Events

Mouse Events	Keyboard Events	Form Events	Document/Window Events
click	keypress	submit	load
dblclick	keydown	change	resize
mouseenter	keyup	focus	scroll
mouseleave		blur	unload

jQuery Syntax for Events

- Most DOM events have an equivalent jQuery method.
- Eg:
  - **$(document).ready()**
  - **click()**
  - **hover()**
  - **focus()**
  - …

- Lets code!

More of jQuery

▶ jQuery Effects - https://www.w3schools.com/jquery/jquery_hide_show.asp

▶ jQuery HTML - https://www.w3schools.com/jquery/jquery_dom_get.asp

▶ jQuery Traversing - https://www.w3schools.com/jquery/jquery_traversing.asp

▶ jQuery Ajax - https://www.w3schools.com/jquery/jquery_ajax_intro.asp

Assignment & Hosting on AWS

- Memory game using jQuery

- Sample portfolio that you can get inspiration from.
- http://lizz.es/
- http://studioschurk.nl/
- http://melaniedaveid.com/
- http://seanhalpin.io/
- http://charlottetang.com/
- Game like portfolio I mentioned in the class - http://www.rleonardi.com/interactive-resume/

- Please host your portfolio site using below instructions and send it to me asap, so I can provide feedback. http://docs.aws.amazon.com/AmazonS3/latest/dev/WebsiteHosting.html

- You will be presenting the same on this Saturday for mid-term presentation.