

# Methods for Selecting Elements

Hello and welcome to the lesson about jQuery selectors and different methods we can use to select things. jQuery can select any element in the document object model or the DOM. And when I say any element, I mean any and every element on a website that you can think of. And it's not limited to HTML tags, IDs and classes, you can actually select multiple elements simultaneously, pseudo-classes, elements with specific string of text, attributes, and much more. In this video, we'll look at a few examples and methods of selecting elements with jQuery. To keep you from being totally overwhelmed by the insane amount of selectors available to you in jQuery I'll demonstrate the most common and useful selectors, and then point you to some additional resources so that you can reference and experiment with other more obscure selectors out there. What's great about the jQuery syntax is that it essentially uses the same syntax as CSS when selecting elements.

## Introduction to Selectors

So let's jump into the most common types of selectors. But first, we'll have a quick look at my HTML structure. I just added a bunch of different elements so that we can go ahead and try to select some of this with different jQuery selectors. I have my headings, a div with an ID, a list with an ID with some main and sub items and also a simple form as well. I added some basic styling just so it looks tiny better and now let's open the scripts.js and I'm going to show you the most common types of selectors and as I mentioned, it essentially uses the same syntax as CSS

when selecting elements. So for example, if you want to select multiple elements in jQuery, you would simply code something like this. First, the dollar sign and then round brackets, parentheses, and inside quotes here is our selector. So, if I want to select multiple elements, I can simply say H1, comma, H2, and H3 and then I will use a CSS method here and we can specify the CSS property. So let's say border in first quotes, then comma and the second set of quotes with the value for that property. So let's say two pixels, solid, lightsalmon, so that's my nice orange color. Okay, let's make it a bit smaller. Okay, let's save that, and refresh that page. And that selector, selects all the level 1, level 2 and level 3 headings.

### **ID, Class, Pseudo-Class Selectors**

Another selector that you can use is just a simple ID selector. So let's say I want to target an ID list. And I will use the same CSS method. Let's save that. And now if I refresh my UL, it has an ID of list, so that targets an ID. And that would work the same way for a class. So instead of an ID list, I can target a small class which I have added to one of the paragraphs, simple as that. And you can also use the pseudo-class selectors similar to CSS. So, I could select any first P, or first on the page. So that would select the first paragraph or I don't need to even specify an element I can select last element. And that's the input submit button here or I can select last P, last paragraph, but save.

### **Descendant Selectors**

You can also use the descendant elements. So let's say, I want to target, let's look at my HTML. So my main container is a div with an ID of main content but let's maybe add another div here, div class article, okay that would put these two Ps inside that div. And now let's target any

paragraph inside the article. So that's the descendant selector, just the same as in CSS. So if the parent element would be the main container, main content, that selects all the Ps. But we can also use the direct child with that symbol. These are all the Ps which are direct children of the main content div. Let's hide this one. So only this P is a direct child element of the main div because these are in additional containers, so that works just the same as in CSS. So the grandchildren will not be selected. And we also have some special jQuery selectors like header selector, so let me show you, in quotes, let's copy this.

## Header Selector

So header selector selects all heading levels H1, H2, 3 4, 5 6, every heading can be selected with the header selector. Another useful jQuery selector is contains so it basically looks like this contains and then another set of round brackets with quotes and let's say ipsum. We have to use different types of brackets inside, so double brackets. Okay, so every element contains that word. Let's try with sample. We have a sample page here. So, if the content, if it contains sample, so that a heading contains sample and its parent, div container and the body tag and HTML tag as well. So let's maybe only select a div that contains sample a div type of element. And let's save that. Now, only the div with that word, the parent div that contains that word is selected, so, that's pretty cool.

## Traversing Selectors

So, another thing you can do is to traverse your HTML structure. Meaning that starting from one element you can go up or down the HTML structure to find a different element. So, let me show you what methods we have to do that in jQuery because I think to have a best

understanding of this is to just show you an example. So if I start with our list element, which has the ID of a list, Okay, and then I can go ahead and call find for example. And here I can specify what I'm looking for. So maybe I want to find list with a class, find li with a class of special, okay? Right now it won't find anything and let me copy that CSS method so we can see it, but let's change our HTML and add a class of special. To one of lis. And now, you can see that it is being selected, so that find function will go down the HTML structure. Look through children and grandchildren of that element to find anything that matches that selector. So it's working recursively on children and children of children elements. So, if I only want to select li here, Any li that will select all the list items and all the sub items and so on. A different thing you can do is to go through only the direct children. So instead of find, you can use the children method, And that will select only the first level of the direct children of that selector. So this is how you can go down your hierarchy using jQuery, but you can also go up the hierarchy. So let's first look at the equivalent of find, that would be the parents method. So let's select any parent div to our list element. It has only one parent div and that is being selected. Now, let's try maybe instead of using the list, let's try using that P that has two parents that P with a class small. And now the first div is selected and also the parent div. So the parents method will go up the HTML structure to look through the parents and the grandparents and all that. But if you want to only target the direct parent, similar to direct children, all you need to do is remove the S. So instead of calling parents we can select the parent method. And that would only select the first level of parent, the director, the parent of an element. And we don't even need to specify any selector here. We can just call the parent and that would select the parent container of an element. So if I want to select the direct parent of the div class ID box,

that's the main container. Okay? So with the parent, you only always have just one element, one direct parent that is. Okay., so what else is there? We have children with parents.

## Sibling Selector

We also have sibling elements. So let's try with maybe the P class small, and let's try selecting all the siblings. But not the divs, but any sibling element of the paragraph with a class small. All right, so this would be another paragraph. What about any siblings of H2? So, our H2 has all the siblings. All these elements are on the same level. So the siblings select all the elements which are on the same level, which have the same parent, but not the element itself. And we can filter that by any selector. Let's say we only want siblings which are paragraphs. Okay. Now, only this paragraph is a sibling of that H2 because these two are in a separate div. Okay? So there are two more to go that I want to show you.

## Previous and Next Selectors

They don't use that family hierarchy name, they are called previous and next. So instead of this, let's try, so for our P small, instead of siblings, let's try previous elements and any previous element. And that will select the paragraph, which is before my P with a class small. Now what is before my H3? That will select that div with two paragraphs and just like we can use the previous we can also do the next element. So let's say we want to select the next after H3, Okay? And that would be our list item. Now, as I mentioned at the beginning, these are not all of the selectors available to you in jQuery. They're just kind of the most common that you would use as a developer and you can combine all of these to create a more complex kind of search and select selectors, you have unlimited possibilities. There are a whole bunch of selectors and

combinations of selectors that you can use.

## Resources

Websites like jQuery selector reference page on w3schools - it gives you all the selectors more than we just covered in this lesson, you can play around with those. You can also play around with their jQuery selector tester, kind of click and see what that selector selects basically. And there's also obviously the jQuery documentation page with all the details and specifics about all available selectors. And also the traversing methods which we covered some of these but there's plenty more inside the jQuery that you can kind of play around with and it's a great way for you to practice to kind of see what selectors are available. jQuery documentation is always a good place to kind of learn more about all these elements. So hopefully that will help you be able to select different parts of your websites when trying to write your own jQuery.