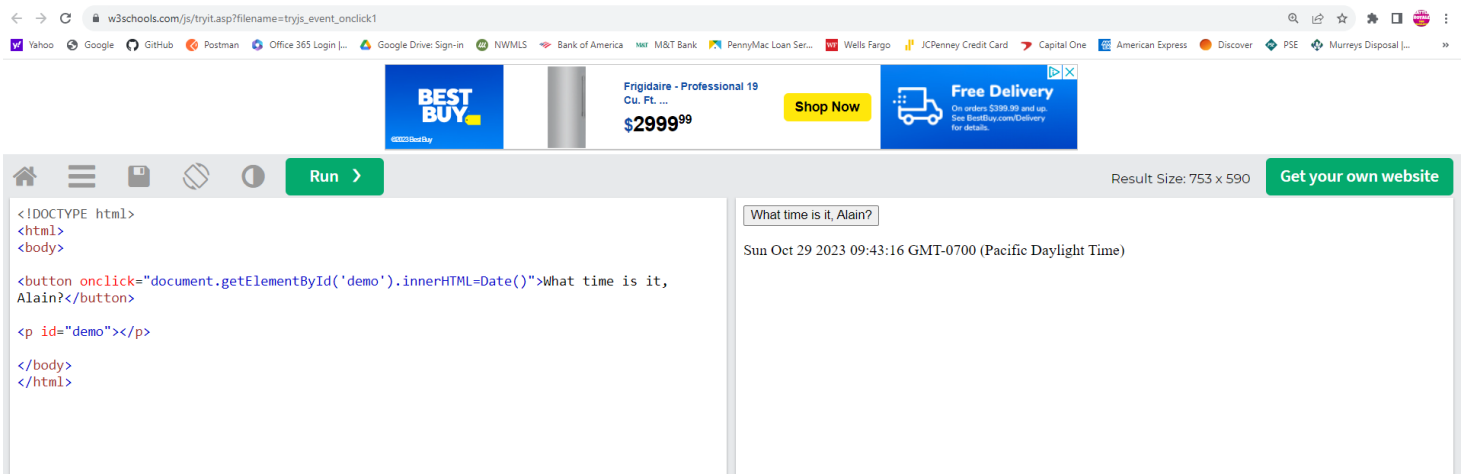
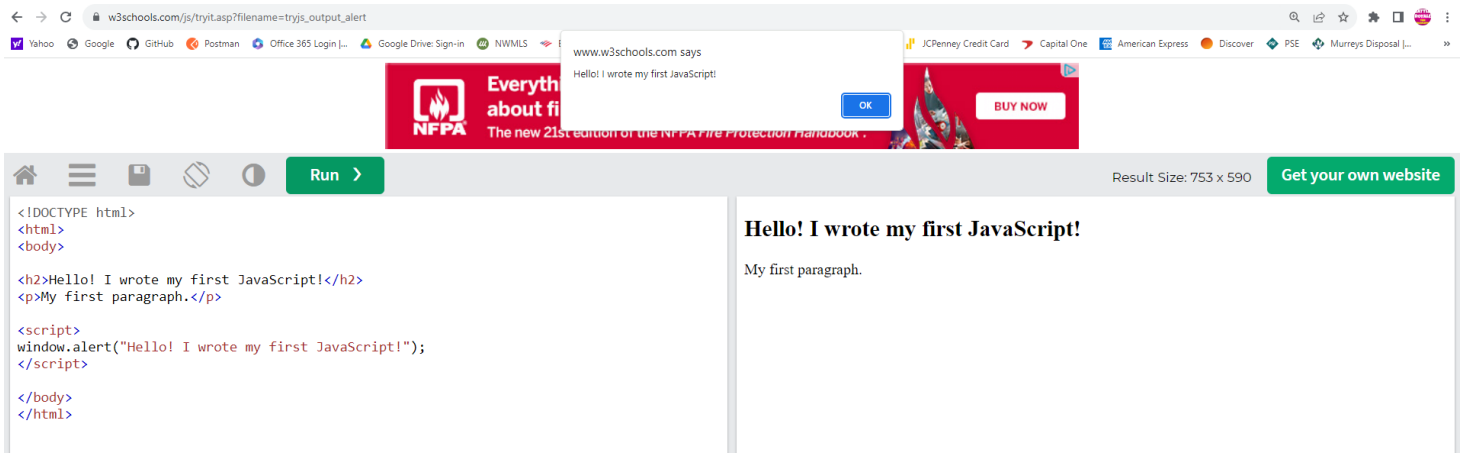


L09: JavaScript



1. How are they different?

In the JS Output example, JavaScript is added using an internal script while in the JS Events example, JavaScript is added by adding the “onclick” attribute directly to the HTML button element. In the JS Output example, the code runs as soon as the page loads and in the JS Events example, the code doesn’t run until the button receives the “onclick” event. Also, the JS Output example is using the window object to call the JavaScript `alert()` method and the JS Events example is using the `document.getElementById()` method together with the `innerHTML` property to find the correct HTML element and display the time by using the JavaScript `Date()` method.

2. Why is the code activated in the JS events example?

HTML has many events that occur within a webpage. Some of these events happen when the browser is finished loading the web page, and others occur when a user interacts with the webpage in some way. When a user clicks on a button or moves their mouse over a certain element, an event occurs. JavaScript can be used to listen for these events and can execute code when it detects that an event it was listening for did occur. In the JS events example, we are listening for an onclick event on the HTML button element. When the user clicks on this button, the “onclick” event that we are listening for is triggered and the JavaScript code that is written in the button element runs.

3. Write a sentence or two about which is the best control structure, and why?

To determine whether the if, else, or else if statement is the best control structure, you must determine what you are trying to achieve. The if statement could be considered the best control structure if you only need to take action if something occurs and you don't need to take any additional actions if that something doesn't ever occur. The else statement could be considered the best control structure if you need to take one action if something occurs and you need to take another action if that something doesn't occur. Finally, the else if statement could be considered the best control structure if you need to check for multiple conditions and you need to take a different action for each one.