# **What is the difference between window, screen, and document in JavaScript?**

# What about the document object then? The document object is your html, aspx, php, or other document that will be loaded into the browser. The document actually gets loaded inside the window object and has properties available to it like title, URL, cookie, etc. What does this really mean? That means if you want to access a property for the window it is window.property, if it is document it is window.document.property which is also available in short as document.property.

# **document**

Each window object has a document object to be rendered. These objects get confused in part because HTML elements are added to the global object when assigned a unique id. E.g., in the HTML snippet

<body>

<p id="holyCow"> This is the first paragraph.</p>

</body>

# **screen**

The window object also has a screen object with properties describing the physical display:

* screen properties width and height are the full screen
* screen properties availWidth and availHeight omit the toolbar

The portion of a screen displaying the rendered document is the **viewport** in JavaScript, which is potentially confusing because we call an application’s portion of the screen a window when talking about interactions with the operating system. The getBoundingClientRect() method of any document element will return an object with top, left, bottom, and right properties describing the location of the element in the viewport.

The document is where the DOM is.

You can also see the contents of the object in [Firebug](https://en.wikipedia.org/wiki/Firebug_%28software%29)/development tools like this:

console.dir(window);

console.dir(document);

console.dir(screen);

window === globalThis // true

this === self // true

parent === window // true

top === parent // true

even some multiple combinations of them — fact possible for the reason that

**window.window === window** // true

because window is also *its own property*, so we can even write **window.window.window === window** as well, or even stuff like **window.window.self.top.parent.globalThis === window**, all those returning true.