Week 09 – Chapter 9 – The Window Object

Browser Object Model

-BOM- collection of properties and methods that contain info about the browser and computer screen

-Window object is made up of the properties and methods that are supported by all browsers

-Global Variables are part of the global object. (the global object is the window object in browser enviro)

-alert() confirm() and prompt() all methods of window object

 -Navigator property to return browser information. *window.navigators.userAgent* (not reliable)

-Location property returns URL info *window.location.href* (can be set like a variable and make the page reload)

-other location properties are protocol, host, hostname, port, pathname, search, hash, origin

-location methods include reload() assign() replace() toString()

Browser History

-window.history property

        -window.history.length (number of pages visited prior to this page), window.history.go(1) goes forward 1 page. 0 reloads current page, negative numbers go back pages.

-controlling windows

        -can set a variable to open a new window and tell it URL

```
const popup = window.open('https://sitepoint.com','
SitePoint','width=400,height=400,resizable=yes');
```

(POP UPS ARE ANNOYING)

Popup.close() window.moveTo(0,0) window.resizeTo(600, 400);

-window.screen

        -window.screen.height returns height of screen, window.screen.width returns width of screen. More include colorDepth availWidth availHeight (more useful on mobile)

-Document object

        Document.write(), frowned on because it mixes JS and HTML

Cookies

-small files saved locally. Save things like login info or names or shopping cart many other things for a short period of time in the browser on the same webpage that set them.

-limited to 4kb, but 20 cookies are allowed

-user must now know cookies are being stored and acknowledge it. That's why all the popups

Creating Cookies

-document.cookie = 'name=Superman';

To change must have same first half. Document.cookie ='name=batman';

To read just say document.cookie: and it'll send a string

To split, use something like:

```
const cookies = document.cookie.split("; ");
for (crumb of cookies){
    const [key,value] = crumb.split("=");
    console.log(`The value of ${key} is ${value}`);
}
<< The value of name is Batman
The value of hero is true
The value of city is Gotham
```

Cookie Expiration

-deleted when browser closes by default unless an expiration date is set.

```
const expiryDate = new Date();
const tomorrow = expiryDate.getTime() + 1000 * 60 * 60 * 24;
expiryDate.setTime(tomorrow);
document.cookie = `name=Batman; expires=${ expiryDate.toUTCString()}`;
```

to delete a cookie set expiration to the past.

Timing Functions

-window lets us schedule functions.

```
window.setTimeout( () => alert("Time's Up!"), 3000);
```

 returns and in that can be used to reference it if you need to later.

-setInterval() works basically the same way, just repeats the callback at that time. Must be cleared or you get an infinite loop

-Animation – can use setTimeout() and setInterval()

Can change styling at certain intervals to make it animate