

Assignment 7

A prototype for the **EL (Electroluminescent) Wire Art by Richard Born** Web site is the starting point for your work on this project. It is found in the file *ELWireArt.html*. When you open this HTML file in your browser, you will notice that the **black** body of the document contains a colorful header, followed by seven images, a short paragraph describing what EL wire art is, and finally a form in which the user can enter his/her name and select a radio button indicating his/her favorite EL art piece from those shown in the images. The top portion of the Web site appears as follows when first opened:



Figure 1

You will be adding the following functionality to this Web site. Suppose that the user has entered his/her first name, and has clicked on the radio button for his/her favorite EL wire art piece. Then the screen should appear as follows (as soon as the user clicks a radio button):

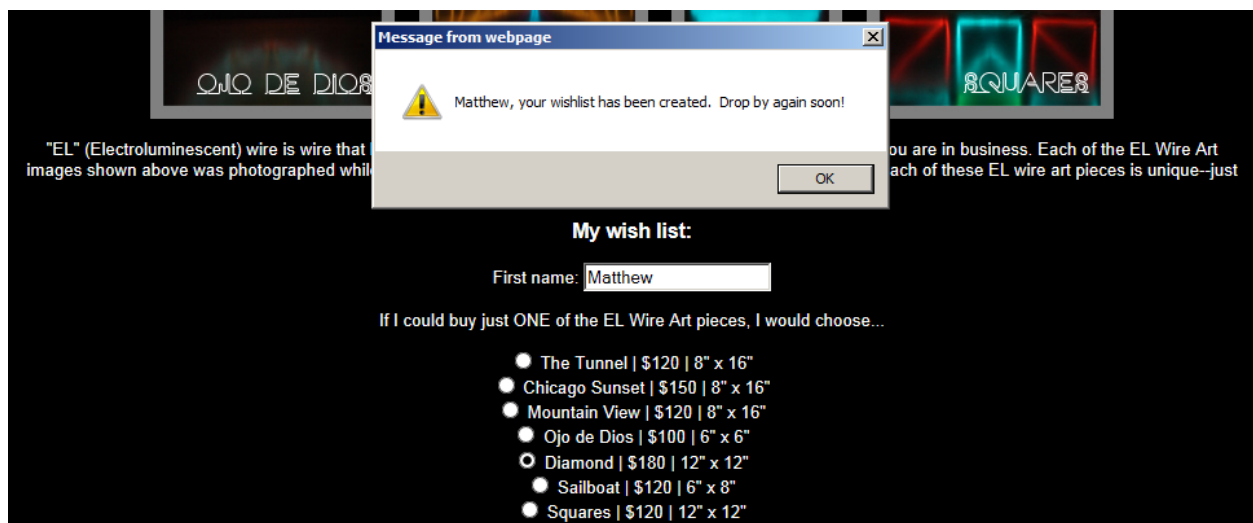


Figure 2

In the above figure, Matthew has entered his first name for his wish list, and has just clicked the radio button for the EL wire art piece called *Diamond*. As soon as he clicks the Diamond check box, an alert message pops up telling him "Matthew, your wishlist has been created. Drop by again soon!" Note that each radio button shows the name of the EL wire art piece, the price, and the size in inches.

Let's assume that Matthew then closes his browser *but returns again within 7 days* to the **EL Wire Art by Richard Born** Web site. Upon returning to the Web site, Matthew's browser now appears as follows:



Figure 3

Note that a message now appears after the header and before the images exclaiming “Welcome back, Matthew! Because you returned to our site so soon, we are offering you a 10% discount on DIAMOND. Your price is now only \$162 if you place your order right away.” **The above image does not show this, but Matthew’s name also appears again in the first name text box, and the radio button for DIAMOND is also checked.**

Creating the Cookie

The functionality described above is to be accomplished by the use of cookies in JavaScript. To get a feel for how to do this, let's look at the HTML code in the file *ELWireart.html*. You will notice that each of the radio button input tags contains an `onClick` event of the form:

```
onClick="setCookie(this.id + '|' + this.value);"
```

Remember that the keyword `this` refers to the current html tag. So `this.id` refers to the `id` attribute of the radio button (i.e, `art1`, `art2`, `art3`, etc.). `this.value` refers to the `value` attribute, e.g. `The Tunnel | $120 | 8"x16"`. So the concatenation `this.id + '|' + this.value` is sent as input to the `setCookie()` function in a script in the html head. With the name of the form being `wishlist` and the name of the first name text box being `firstname`, you can get the first name of the person from `document.wishlist.firstname.value`. You can concatenate a complete cookie whose `value` contains the first name, followed by a `|` character and then followed by the value that is inputted by the `setCookie()` function. Then use the `createCookie()` function in the `cookies.js` file to create the cookie. Make the name of the cookie `abcWireArt` (but replace `abc` with **your initials**). Although we want the cookie to expire in 7 days in the real world, make it expire in 15 minutes (1/96 day). This will allow you and the grader to easily make sure that it expires

properly! After creating the cookie with **`createCookie()`**, display an alert box to the user similar to that shown in Figure 2.

In summary, the **name** of your cookie will be **`abcWireArt`** (but with your initials, instead of abc). A typical **value** for the cookie would be:

`Matthew|art5| Diamond | $180 | 12" x 12"`

As you can see, you have set up multiple values in a single cookie by using the pipe `|` character.

Retrieving Cookie Information (for a person returning before cookie expiration)

Notice that your cookie contains:

1. the user's name, so that you can welcome him/her back, and so that you can display the user's name in the text box when he/she returns to the Web site
2. the art#, so that you can make the appropriate radio button checked when the user returns to the Web site
3. the name of the EL art piece in the user's wishlist, so that you can display it in the welcome back message (see Figure 3).
4. The price of the art work, so that you can use it to compute what the new price will be after the 10% discount. ***(Note that there is a blank space before the \$-sign.)***
5. And the size of the EL art piece, which you actually won't need.

Use the **`getCookie()`** function in the *cookies.js* file to retrieve a cookie if a cookie exists. Then use the **`split()`** method to break up the cookie into its component parts, delimited by the pipe `|` character. Using the art# with **`getElementById()`**, set the **`checked`** property of the appropriate radio button to **`true`**. Set the value property of the firstname field equal to the person's name that you extracted from the cookie. Compute the discounted price—you may find the **`parseFloat()`** and **`substring()`** methods useful here. Build up the output string welcoming the user back, and use the **`innerHTML`** property to place this string in the **`div`** whose **`id`** is **`offer`**. (You will find that this **`div`** has *already* been created near the beginning of the html body.)

Deliverables:

Upload the eight jpg images to your Altvista server folder, in addition to the *cookies.js* file and your revised *ELWireArt.html* file. Make sure that the cookies work as intended. ***(Remember that you will need to debug this program by running it from the server since it deals with cookies, and not simply by running it from your PC!)***