CIS 215 Week 7 Guided Notes

Lecture 1: Standards, Accessibility

What Are Standards?

Standards

 Standards include both discussions of common errors and general rules on how HTML should be written.

Post Prompt: Think about a topic you know a lot about, similar to the academic honesty assignment (in fact, you can use the same topic!). What are some standards related to that topic?

Semantic Versus Presentational

- Semantic is about the **meaning** of an element, where presentation is about how it **looks**

Why Set Standards?

- In your own words, what is one reason why we set standards?

We set standards because it makes the websites much easier to manage, and more accessible. Which then makes any assistive technologies easier to develop.

Who Makes Standards?

W3C: Pioneers

- W3C is short for the world wide web consortium

WHATWG: HTML Pros & Familiar Names

- Why did WHATWG form?

WHATWG was formed because a group of tech giants believed strongly in HTML while it was still being developed. They helped create what is the living standard for HTML5.

W3C Vs WHATWG

- Where should you go to get to the HTML Living Standards?

HTML Standard

What about PHP?

Part of PHP's bad reputation was because of a lack of standards.

Style Guides

What is a Style Guide?

- Style Guides provide rules for the "**stylistic**" parts of the language, which are the parts that don't affect how it works or how it interacts with other programs.

Post Prompt: Create your own short sentence (7-10ish words). Go to <u>random.org</u>, and for each space between words generate a number between 1 and 3. If it's a 1, you hit the spacebar, if it's a 2 you hit the tab key, and if it's a 3, you hit enter. Put this sentence as you've just formatted it into your discussion post. Would you like reading one of my slides if I did the same thing?

Selecting a Style Guide

- When you enter a company, you'll have to follow their style guide.

Following a Style Guide

- Following a style guide is just knowing the rules.
- A linter automatically checks your file to see if it follows a style guide.

Checking Websites

Validators

- A validator checks the **syntax** of a webpage

W3C

- Were you surprised by the number of errors? Why or why not?

I was mostly surprised by the W3Schools having so many errors on their website. Specifically because it is known for its knowledge on HTML, CSS etc. So you would think they would know what they are doing!

Accessibility

What is Accessibility?

 Accessibility refers to the ability of people to access a place, service or event.

How to be Accessible

- What steps have we already taken to be more accessible?

Making comments throughout our code, so other people can understand what it is doing.

Accessibility Checkers

- What accessibility checker did you use? Does it work on your CSNLinux pages? If not, find one that does.

I used the IBM Equal Access Accessibility Checker, and yes it worked on CSNLinux.

Accessibility & Validation

Post Prompt: Go to a school appropriate website. Use a validator and an accessibility checker. What issues do you notice?

Styling (With CSS/Bootstrap)

- Will you be looking through CSS/Bootstrap or will you let your websites be ugly?

I will be looking through CSS/Bootstrap as I personally find styling my websites to be one of my favorite parts!

Lecture 2: UX/UI, Security

UI

User Interface

UX

User eXperience

Security

SQL & PHP & HTML: Putting it all Together

- Summarize the tools we have to make our website secure.

Some of the tools that we have to ensure our websites are secure are HTML, PHP and SQL.

Remember: Don't Go Too Far

Post Prompt: These images are from a friend of mine. How would you fix this? Hacking: Don't do it!

- Hacking includes things like **attacks** along with what we normally think of as hacking

Cross Site Scripting (XSS)

- XSS is mostly relevant when data is displayed to a webpage.

SQL Injection

- We can easily protect against SQL injection with **OWASP cheat sheets.**

OWASP

OWASP: Juice Shop

Tradeoffs

Security vs UX

- If a door lock is too annoying, people might use a password.

Unique UI vs Standard UI

- You don't want to make your website so "unique" that it becomes **an issue of accessibility.**

Identifying Tradeoffs

Group Survey

Group Survey

- Do you have any questions about groups?

Practice Midterm

- Do you have any questions about the midterm?