CS 1520 notes

XML (cont)

-DOM: Document Object Model

-HTML is a DOM language

-organized as a tree

-everything is an object

-parsed as a whole

-issues with DOM:

-memory

-finite amount

-SAX:

-event based

-parse discreet bits of data

XML and JS

var xml=xmlHttp.responseXML;

var users=xmlgetElementByTagName(“user”);

xml.firstChild()

xml.lastChild()

xml.tagName()

xml.childNodes()

xml.textContent()

-cannot make an ajax request to another site

-XSS: Cross Site Scripting

Cookies

-Request: receives cookies

-Response: sends cookies

Push-Pull-Poll

-Push: gives content to user

-Pull: requests content by user

-Poll: contant checking for updates

-Cron: Appengine function that helps schedule updates

-create Cron.yaml

-includes description, url, and schedule

-can add ‘login’ tag on the yaml file to restrict access to a url

-admin

-required

-Memcache: stores data to be retrieved right away

-not reliable

-store in both memcache AND datastore

Frameworks

-Advantages: Ease of use, solve current problems, lots of capabilities, used for dynamic pages,

-Challenges: limitations, conflicts, developing is maintaining, unwieldy code, no substitute for knowing how to code

What is a socket?

-connection

Outline:

1. PHP Overview
   1. Why it is popular
   2. Why it sucks
2. LAMP
   1. –pieces/components
3. PHP Language Features
4. MySQL
5. Code

PHP

-open source and free

-not complex

-like HTML

-cross platform

-lots of function

- many are inconsistent

-designed for non-programmers

-error handling/debugging is not easy

-no clear design

-weakly typed in weird ways

-functions can return inconsistent values

LAMP: Linux, Apache, MySQL, PHP

Language features

-C-like

-if-else

-while/do-while

-Java

-try-catch

-weakly typed

-all variable start with ”$” ($var)

-write PHP right in HTML body <?php php code ?>

-violates MVC

-“echo” or <?=$var ?> is the print function

-comments

-c-style: // and /\* \*/

-Perl: #

-operators

-arithmetic is normal

-powers: \*\*

-concatenation uses period(.)

-can use double or single quotes

-increment works normal

-comparison

-sort of equality: ==

-really equal: ===

-not equal: !=, <>

-really not equal: !==

-greater/less than: same

-lets you compare things that shouldn’t be comparable

MySQL

-SQL Database

-structured query language

-not a programming language

-data access language

11/20/14

1. Create a DB/Table
2. Employ PHP to Read from Table
3. Employ PHO to write to the table

-cannot directly access data in a database

-there are layers of access: DB Server, ODBC, RDBMS, software

-Frameworks

-jQuery, jQuery UI, jQuery Mobile

Desktop

-Does everything

-less responsive

-location of controls

-top left

-orientation: ?

Mobile

-simplicity

-obvious

-focus

-responsive

-location

-bottom right

-obvious orientation

Cordova

-creates iPhone/Android apps