

ITT Technical Institute
IT313P
Scripting and Web Authoring III
Onsite Course

SYLLABUS

Credit hours: 4

Contact/Instructional hours: 66 (46 Theory Hours, 20 Lab Hours)

Prerequisite(s) and/or Corequisite(s):

Prerequisites: IT204P Scripting and Web Authoring I

Course Description:

This course includes the application of HTML tags and options, Style Sheets, positioning, scripting and programming to create Web pages that are animated and more responsive to user interaction.

STUDENT SYLLABUS

Instructor: □□□□□□□□□□□□□□□□ _____

Office hours: _____

Class hours: _____

Major Instructional Areas

- What can and can't you do with JavaScript?
- What is a variable and naming variables: rules and best practices
- What is a function and the structure of a function
- Passing and returning values to functions
- Understanding expression structure
- Working with object methods
- Using the JavaScript events
- Using the Array object
- Working with the Date Object
- The Math Object
- Strings and the String Object
- Determining the user's browser information
- Window dimensions and the Screen Object
- Working with JavaScript timeouts and intervals
- Opening and closing a window and use of "Chrome" features
- Basic Password-Protection
- Working with the Document Object
- Working with the Image Object
- Creating Mouseover Effects
- Cookie operations
- Understanding form fields
- Programming text fields
- The need for browser-based validation
- Displaying the form data for confirmation

Course Objectives

Upon successful completion of this course, the student should be able to:

1. Describe the fundamentals of the JavaScript language, which includes: variables, operators and control structures.
2. Describe JavaScript object hierarchy.
3. Create external JavaScript files.
4. Debug and troubleshoot script problems.
5. Pass and Return values from a function.
6. Properly use comparison operators and control commands.
7. Manipulate object properties and work with object methods.
8. Use the JavaScript events.
9. Enable the user to interact with the program using: alert(), confirm() and prompt() methods.
10. Work with the JavaScript Date, String and Math Objects.
11. Determine the user's browser information.
12. Determine window dimensions and set its property accordingly.
13. Use JavaScript timeouts and intervals.
14. Use the Image Object.
15. Open and use the features of Windows.
16. Create Mouseover Effects.

17. Create and Use Cookies with JavaScript
18. Use the Form Object and program form fields.
19. Validate a Form using validation techniques.

Teaching Strategies

Curriculum is designed to promote a variety of teaching strategies that support the outcomes described in the course objectives and that foster higher cognitive skills. Delivery makes use of various media and delivery tools in the classrooms.

Student Textbook and Materials

McFedries, P. (2007). *Using JavaScript reference guide (Custom ed.)*. Boston, MA: Pearson Custom.

Course Outline

Unit	Topic (Lecture Period)	Chapters	Lab and Other Coverage
1	JavaScript Fundamentals	1 - 4	Lab
2	Decision & Looping Statements	5 - 7	Lab
3	Working with Objects, Events & Arrays	8 - 11	Lab
4	The Date & Math Objects	13 - 14	Lab
5	The String Object	15	Lab
6	The Navigator Object and Windows	16 - 18	Lab
7	Working with Images & Mouseovers	24	Lab
8	Creating & Using Cookies	25	Lab
9	The Form Object	27 - 28	Lab
10	Performing Form Validation	29	Project
11	Final Examination & Final Project Presentation	The final examination will be based on the content covered in the chapters listed above.	

Evaluation Criteria and Grade Weights

Homework	10%
Participation	10%
Lab exercises	35%

Final exam	20%
Final Project	25%

Final grades will be calculated from the percentages earned in class as follows:

A	90 - 100%	4.0
B+	85 - 89%	3.5
B	80 - 84%	3.0
C+	75 - 79%	2.5
C	70 - 74%	2.0
D+	65 - 69%	1.5
D	60 - 64%	1.0
F	<60%	0.0

COURSE REFERENCES

References

Web references

- <http://www.javascript.com/>
 - <http://www.javascriptguide.com/>
 - <http://javascript.internet.com/>
 - <http://www.w3schools.com/js/>
 - <http://www.pageresource.com/jscript/jbasics.htm>
 - <http://wp.netscape.com/eng/mozilla/3.0/handbook/javascript/>
 - http://webdeveloper.com/javascript/javascript_js_tutorial.html
-

Virtual Library Book references

- **Making Use of JavaScript**
 - - By Shweta Bhasin
 - - ISBN:0471219762
- **JavaScript Examples Bible: The Essential Companion to JavaScript Bible**
 - - By Danny Goodman
 - - ISBN:0764548557
- **HTML & XHTML: The Complete Reference, Fourth Edition**
 - By Thomas A. Powell
 - ISBN:007222942X
- **JavaScript Bible, Fourth Edition**
 - By Danny Goodman
 - ISBN:0764533428