

# Course Syllabus Part I WEB 231 Enterprise JavaScript I

#### 3 credit hours

#### **Course Description**

Learn JavaScript by writing JavaScript. This course introduces the concepts of programming using JavaScript. It focuses on the JavaScript programming language syntax, coding standards, documentation, and how to debug programs. Topics include Functions, Data Types, Operators, Arrays, Controlling Flow, JavaScript Events, and Regular Expressions. Projects will use HTML, CSS, and JavaScript to create dynamic web pages. GitHub is used to host coding projects.

#### **Course Prerequisites**

WEB 200 Fundamentals of Web Development

### **Course Objectives**

Students who successfully complete this course should be able to:

- 1. Explain the fundamentals of the JavaScript programming language
- 2. Build JavaScript expressions
- 3. Identify at least four types of programming errors
- 4. Utilize web browser debugging tools to locate errors in a program
- 5. Experiment with regular expression

#### **Grading Scale**

$$93 - 100\% = A$$
  $87 - 89\% = B+$   $77 - 79\% = C+$   $67 - 69\% = D+$   $90 - 92\% = A 83 - 86\% = B$   $73 - 76\% = C$   $63 - 66\% = D$   $80 - 82\% = B 70 - 72\% = C 60 - 62\% = D 0 - 59\% = F$ 

## **Topic Outline**

- JavaScript Fundamentals
  - A. Functions
  - B. Data Types and Operators
  - C. Arrays
  - D. Controlling Flow
  - E. Template Literals
- II. Debugging and Error Handling



- A. Debugger Console
- B. Breakpoints
- C. Strict Mode
- D. Try Catch Statements
- E. Error Tracing
- III. Working with HTML and CSS
  - A. Document Object Model
  - B. JavaScript Events
  - C. HTML Form Validation
  - D. Form Objects
  - E. Regular Expressions