Course Description

A study of features of programming languages and of the methods used to specify and translate them. Topics covered include block structure, naming, procedure invocations and parameter passage, data types, data accessing, syntactic analysis, and correspondence of source language and object language constructs.

Goals

• Represent the syntax and semantics of programming languages using grammars
• Evaluate programming languages based on their abilities and characteristics
• Describe the four paradigms of programming languages and their strengths and weaknesses

Required Text

• Concepts of Programming Languages, sixth edition, by Robert W. Sebesta

Responsibilities

Your timely attendance is expected at each class meeting. You are also responsible for the contents of reading assignments, handouts, lectures, class email, and the course web page.

If you have a disability that may affect your participation in this course, please contact me immediately to discuss academic accommodations.

Graded Material

• Homework problem sets will be assigned regularly for you to explore the concepts discussed in class. Homework will be due the class session after it is assigned.

Some homework assignments will require essay responses. Your grade will be determined not simply on the content, but on the organization of your paper, style of your writing, and overall coherence. I would strongly recommend writing drafts and editing your work.
• Projects will be assigned throughout the semester, emphasizing all aspects of program development. When working on these programs, you should consider design, implementation, testing, and documentation. It is especially important that you begin these projects as soon as they are assigned. Collaboration with each other is not allowed.

• There will be three tests given during the semester. The tentative dates for these tests are Monday, February 7, Friday, March 18, and Friday, April 8.

• The final exam will be given in class during the final exam period.

Class Cancellations

• February 23 and 25 – Class canceled for SIGCSE conference

• April 22 – Class canceled for CCSC conference

Grade Determination

<table>
<thead>
<tr>
<th>Component</th>
<th>Weight</th>
<th>Grade Range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Homework</td>
<td>20%</td>
<td>A : 90 – 100%</td>
</tr>
<tr>
<td>Projects</td>
<td>40%</td>
<td>B : 80 – 89.9%</td>
</tr>
<tr>
<td>Tests</td>
<td>20%</td>
<td>C : 70 – 79.9%</td>
</tr>
<tr>
<td>Final</td>
<td>20%</td>
<td>D : 60 – 69.9%</td>
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<td></td>
<td></td>
<td>F : &lt; 60%</td>
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Late assignments will be penalized 10% per day starting at the end of the class in which the assignment is due.