

COMP 4040/6040: Programming Languages

Fall 2013

Tuesday, Thursday 1:00–2:25 p.m.
FedEx Institute of Technology 227

<http://www.cs.memphis.edu/~sdf/comp4040/>

Instructor: Dr. Scott D. Fleming <Scott.Fleming@memphis.edu>
Office Hours: 4:15–5:45 p.m., or by appointment
Office Location: Dunn Hall 303

Teaching Assistant: Hanwen Yu <hyu2@memphis.edu>
Consulting Hours: By appointment

1 Course Description

COMP 4040 - Programming Languages (3)

Comparative features, syntax and applicability of high-level programming languages such as FORTRAN, PASCAL, LISP, Scheme, ADA, C, C++, JAVA, PHP, JavaScript, Perl, Prolog, FORTH; data types, data structures, dataflow; procedures, recursion, runtime environment, string manipulation, list processing, array processing, documentation, programming style. PREREQUISITE: COMP 3160. (F)

2 Why This Course?

This course helps the students gain a deep understanding of the main concepts in a wide variety of programming languages and improves the students' programming skill by showing the inner behavior of a computing system during the execution of programs.

3 Learning Outcomes

- An ability to design, implement, and evaluate a computer-based system, process, component, or program to meet desired needs.
- An ability to use current techniques, skills, and tools necessary for computing practice.

4 Textbooks

4.1 Required:

Programming Language Pragmatics, Third Edition

by Michael L. Scott (Morgan Kaufmann, 2009)

<http://amzn.com/0123745144>

<http://store.elsevier.com/Programming-Language-Pragmatics/Michael-Scott/isbn-9780123745149/>

4.2 Optional:

The Definitive ANTLR 4 Reference, Second Edition

by Terence Parr (Pragmatic Bookshelf, 2013)

<http://amzn.com/1934356999>

<http://pragprog.com/book/tpantlr2/the-definitive-antlr-4-reference>

5 Evaluation

Grading weights are as follows:

- 51% Exams (3 exams, 17% each)
- 39% Homework and Quizzes
- 10% participation

To convert from overall percentages to letter grades, see the chart at right. I reserve the right to *lower* the percentage threshold for letter grades as I see fit (i.e., I may make the grading scale better for you, but never worse).

5.1 Exams

The exams will be administered in class and will be closed everything (i.e., closed book, closed note, closed neighbor, etc.).

A+	≥ 97%
A	91–96%
A–	89–90%
B+	87–88%
B	81–86%
B–	79–80%
C+	77–78%
C	71–76%
C–	69–70%
D+	67–68%
D	62–66%
D–	60–61%
F	≤ 59%

Grading scale.

In general, makeup exams will NOT be given. If you have an extenuating circumstance, you should notify me as soon as possible. Makeups for exams will only be given under extreme circumstances and if I approve the absence before the exam is given. All excused absences must be documented (e.g., with a doctor's note).

5.2 Homework

Homework assignments are typically due before the start of class. You are expected to complete work on schedule, as deadlines are a part of the real world. Work will not be accepted late unless there are extenuating circumstances and prior arrangements are made with me.

5.3 Quizzes

Quizzes may be given at any time, such as at the beginning of class (hint hint). Makeup quizzes will NOT be given.

5.4 Participation

Students are expected to attend class and participate in classroom discussions. You will begin the semester with 13 attendance points. If I notice that you are missing from class at any time, I will deduct 1 point for that day. At the end of the semester if you have 10+ points, then you will receive full credit for attendance (i.e., you can miss 3 days without penalty); otherwise, you will receive a percentage of your points out of 10 for participation.

Be forewarned:

- I often give quizzes at the beginning of class, and if you do not arrive in time to take the quiz, you will lose a participation point for that day.
- Also, I like to do lots of in-class activities, so the odds of me noticing your absence on a given day are pretty good.

6 Accommodations for Disabilities

Reasonable and appropriate accommodations will be provided to students with disabilities who present a memo from Disability Resources for Students¹ (DRS).

7 No Plagiarism/Cheating

Plagiarism or cheating behavior in any form is unethical and detrimental to proper education and **will not be tolerated**. All work submitted by a student (projects, programming assignments, lab assignments, quizzes, tests, etc.) is expected to be a student's own work. The plagiarism is incurred when any part of anybody else's work is passed as your own (no proper credit is listed to the sources in your own work) so the reader is led to believe it is therefore your own effort. Students are allowed and encouraged to discuss with each other and look up resources in the literature (including the internet) on their assignments, but **appropriate references must be included for the materials consulted**, and appropriate citations made when the material is taken verbatim.

If plagiarism or cheating occurs, the student will receive a failing grade on the assignment and (at the instructor's discretion) a failing grade in the course. The course instructor may also decide to forward the incident to the University Judicial Affairs Office for further disciplinary action. For further information on U of M code of student conduct and academic discipline procedures, please refer to: <http://www.people.memphis.edu/~jaffairs/>.

¹ <http://www.memphis.edu/drs/>