Computer Science I

CSC 141-04                                            Spring 2009

Instructor:

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Office Hours:
Monday: 2.00–4.00 pm
Tuesday: 3.15–4.15 pm
Wednesday: 2.00–4.00 pm

General Education Goals:

a. Communicate effectively.
   - Plan program solutions using pseudo-code.
   - Write program solutions using the Java programming language.
   - Document code with appropriate explanatory information.

b. Employ quantitative analysis and mathematical methods.
   - Analyze problem situations.
   - Use mathematical models to develop solutions.

c. Think critically and analytically.
   - Develop algorithmic solutions.
   - Implement and test problem solutions.

Text:


Software:

The software the Computer Science Department has chosen for this course is Java, together with the IDE (integrated development environment) jGRASP. We will discuss their usage in class.

This class has six compulsory laboratories. They are held in room 139 of 25 University Avenue every second Thursday, starting in the third week: bring a memory stick.
Evaluations:

20% — Assignments (there will be four)
10% — First Test (in approximately week three)
20% — Second Test (in approximately week seven)
20% — Third Test (in approximately week twelve)
30% — Final (cumulative)

The assignments will consist of programming. The first test will cover everything up to the then current point in the class, the second test will focus on everything from the first test up to the then current point in the class, and the third test will focus on everything from the second test up to the then current point in the class. The final will cover all of the material in the entire class.

Description and Course Outline:

This course introduces algorithmic problem solving and elementary computer programming. The programming language to be used is Java. Most classes will be of the lecture variety, but some will be in the lab.

The following major topics, which correspond more or less to chapters 1–5 of the text, will be covered:

- Introduction to machines
- Introduction to programming
- Creating and running Java Programs
- Java Fundamentals
- Program documentation and standards
- Decision structures
- Looping control structures
- Files
- Scope and lifetime
- Introduction to methods
- Introduction to classes (if time permits)

Policies:

1. Students are expected to attend every class. Any student missing a class is responsible for determining what was covered and for making it up on their own.

2. All programs must conform to the standards to be given in class, such as proper and complete documentation, correct indentation, and good design. Further, all programs turned in must begin with a “file header” of which the following is an example:
3. All work submitted must be in a presentable form. Do not include a “cover” or “title” sheet on your work. Staple all sheets together with a single staple in the top left corner.

4. All assignments are due on a class day and are always due at the beginning of class. Once class has begun, an assignment is late and will NOT be accepted.

5. Make-up exams will be given only for:
   - Sickness or illness prior to the exam for a sufficient period of time (not one day) to reasonably prevent the student from preparing for the exam. Written medical verification is required before the exam.
   - Official off-campus university representation. Written verification from the faculty member in question, and my own personal approval, is required before the exam.
   - Genuine emergency on the day of the exam. You must see me or leave me a note explaining the reason as soon as possible.

6. The grade of incomplete will be given only for good reason, such as being prevented by illness from attending a sufficiently large portion of the course to complete enough of the work to warrant a grade.

7. West Chester University wish to accommodate persons with disabilities. Please make your needs known by contacting the Department of Computer Science (ext. 2204) and/or the Office of Services for Students with Disabilities at (ext. 3217). Sufficient notice is needed in order to make the accommodations possible. The University desires to comply with the ADA of 1990.

Policy on Academic Dishonesty
Prepared by the Computer Science Committee

The Computer Science Committee has adopted the following policies in regard to academic dishonesty in Computer Science classes:

1. A student found to be cheating in an assignment will receive zero for that assignment if it is his first offense in that class, but an F for the course if it is for his second offense in that class.
2. A student found to be cheating in a test will receive the grade of F in that class.

3. For the purposes of this document, every form or method of evaluation in a class will be considered as being of one of two types: an assignment or a test. Assignments include homework assignments, and short quizzes. Tests include final exams and major exams. An instructor has, subject to these guidelines, the discretion to determine the type of any other form of evaluation, such as a project, in his class.

4. The term cheating is used throughout in the sense provided by the rules and regulations of West Chester University. The following is taken from The Ram's Eye View.

    Cheating includes but is not limited to:
    1. Plagiarism, that is copying another’s work or portions thereof and/or using ideas and concepts of another and presenting them as one’s own without giving proper credit to the source.
    2. Submitting work that has been prepared by another person.
    3. Using books or other material without authorization while taking examinations.
    4. Taking an examination for another person, or allowing another person to take an examination in one’s place.
    5. Copying from another’s paper during an examination or allowing another person to copy from one’s own.
    6. Unauthorized access to an examination prior to administration.

5. A student who has received the grade of F in a course because of cheating and who wants or is required to repeat that course may re-take that course only as a regularly scheduled course that is open to the student community in general. In exceptional circumstances, this condition may be revoked, but only by an explicit action to that effect by the full Computer Science Committee.