CMP 167 Programming Methods I Syllabus

Semester	Class Section	Class Hours	Room Number
Spring 2020	59441	11-12:40 PM	GI 219

Instructor	Email	Office Number	Office Hours
Yanilda Peralta Ramos	YANILDA.PERALTARAMOS@LEHMAN.CUNY.EDU	GI 303	-

Course Description: 4 hours, 3 credits <as of Spring 2019 soon to be 4 credits - confirm with bulletin> Structured computer programming using a modern high-level programming language. Includes console I/O, data types, variables, control structures, including iteration, arrays, function definitions and calls, parameter passing, functional decomposition, and an introduction to objects. Debugging techniques.

Note: This course is for students who intend to major in Computer Science, Mathematics, Computer Graphics and Imaging, or the sciences. Some previous computer programming experience is recommended. Not intended for students in Accounting or Computer Information Systems; the technical content is the same as CIS 166 but the emphasis is different.

PREREQ: MAT 104 or placement by the Department of Mathematics and Computer Science.

Course Objectives:

- Understand and explain how computers and programs work
- Independently design, create, debug simple Java applications
- Define and use variables of various data types
- Define and use methods
- Demonstrate the use of parameters and information passing in programs
- Use libraries from the java.util package such as Scanner, Math
- Understand and manipulate Strings
- Understand and use arrays
- Understand and use control structures such as decision branching & iteration
- Understand objects and perform simple graphic programming GUI (time permitting advanced topic)

Grading Policy:

Participation & Challenge Activities From Textbook: 10%

Homework Problems: 15%

Projects: 15%Midterm: 30%Final Exam: 30%

Expectations: Students are expected to learn both the material covered in class and the material in the textbook and other assigned reading. Completing homework is an essential part of the learning experience. Students should review topics from prior courses as needed using old notes and books.

Honor Code: You are encouraged to work together on the overall design of the programs and homework. However, for specific programs and homework assignments, all work must be your own. You are responsible

for knowing and following Lehman's <u>academic integrity code</u> (available from the Undergraduate Bulletin, Graduate Bulletin, Office of Academic Standards and Evaluations, or the Smart Catalog). All incidents of cheating will be reported to the Vice President of Student Affairs.

Email: We will be communicating with you on a regular basis throughout the semester using the email address you provide us on day 1 of this course. You must check that email address on a regular basis. **There will be no acceptable excuse for missing an email announcement.**

Homework: Programming problems are due most weeks. Problems will be in your online textbook (see below). These programming problems reinforce concepts covered in class. To receive full credit for a program, it must be completed by the specified due date and the program must perform correctly. You will be allowed to submit your solution multiple times, the submission with the highest grade will count as your grade.

Materials and Resources:

Textbook: https://learn.zybooks.com zyBook code: CUNYCMP167Spring2020

Technology: Access to personal computers with Eclipse IDE, JDK 8, Java 8 Documentation

Tutoring: Departmental tutoring is available in the MCSLC in GI-222, on the 2nd floor of Gillet Hall.

Computer Access: Part of this course will use university computer laboratories. These machines are for work related to this course only and a code of conduct applies to computer use in the department and on-campus. Misusing university computers could result in losing your computer access for the rest of the term, making it exceedingly difficult to complete this course.

Additional Online Resources:

Oracle Documentation: https://docs.oracle.com/javase/tutorial
Oracle JavaDoc: https://docs.oracle.com/javase/8/docs/api

GitHub Repository https://github.com

Interactive Book: https://books.trinket.io/thinkjava

Videos: Free Java Videos

Interactive Online Coding Practice:

CodingBat code practice

Practice-It!
CodingGame
Learn Java Online

Visualize Java code execution

Tutorialspoint.com/java

Accommodating Disabilities: Lehman College is committed to providing access to all programs and curricula to all students. Students with disabilities who may require accommodations are encouraged to register with the Office of Student Disability Services located in Shuster Hall, Room 238. http://www.lehman.edu/student-disability-services

Telephone: 718-960-8441 Email: disability.services@lehman.cuny.edu