COP3514
Program Design
Computer Science and Engineering
College of Engineering

COURSE SYLLABUS

Instructor:	Jing Wang	*E-Mail:*	jw@mail.usf.edu
Office Hours:	M 2-3:30pm and R 1:30-3pm	*TA*	See section I
Term:	Spring 2021	*Dates:*	1/11/21-4/29/21
Delivery Method:	Online Synchronous Section 001 MW 12:30-1:45pm Section 002 TR 11:00am-12:15pm	*Location:*	Online
Minimum Technical Skills & Requirements:	Proctorio plug-in, webcam, and microphone (see below for details)		
Virtual Office Hours:	Online via Blackboard Collaborate Ultra		

Online Proctoring for Exams and Quizzes

All students must review the syllabus and the requirements including the online terms and video testing requirements to determine if they wish to remain in the course. Enrollment in the course is an agreement to abide by and accept all terms. Any student may elect to drop or withdraw from this course before the end of the drop/add period.

Students please note the following regarding the use of Proctorio for online exams for academic continuity. Online exams and quizzes within this course may require online proctoring. Therefore, students will be required to have a computer and possibly a webcam (USB or internal) with a microphone when taking an exam or quiz. Proctorio is not mobile compliant so students cannot take Proctorio-based exams from a phone or other type of mobile device. If you do not have access to a computer or webcam you are required to notify your instructor. Students understand that this remote recording device is purchased and controlled by the student and that recordings from any private residence must be done with the permission of any person residing in the residence. To avoid any concerns in this regard, students should select private spaces for the testing. Students must ensure that any recordings do not invade any third party privacy rights and accept all responsibility and liability for violations of any third party privacy concerns. Students are strictly responsible for ensuring that they take all exams from a computer (mobile device not support) with a high speed internet connection and camera if required for the exam. Setup information will be provided prior to taking the online proctored exam.

I. **Live Lab Sessions (Online via Blackboard Collaborate Ultra or Teams, links on Canvas)**
Adriana Ladera (adrianalader@usf.edu), Tuesday and Thursday 2-3pm
Serena Rampersad (snrampersad@usf.edu), Wednesday 2-3pm &Friday 10-11am

II. **TA Office Hours (Online via Blackboard Collaborate Ultra or Teams, links on Canvas)**
Serena Rampersad (snrampersad@usf.edu), Tuesdays &Thursdays 9:30-10:45am
Anthony Long (anthonylong@usf.edu), Monday 1:45-3-15pm and Friday 3-4:30pm

III. **TAs Grading Projects**
Adriana Ladera (adrianalader@usf.edu) Juan Melo Vasquez (juanmelo@mail.usf.edu)
Dev Tejwani (dtejwani@mail.usf.edu) Oleksandr Lisnichenko (oleksandr1@usf.edu)

IV. **Required Course Materials**

1. C Programming, A Modern Approach, Second Edition, by K. N. King. W.W. Norton & Company, 2008, ISBN 978-0-393-97950-3. Textbook's Web Site: http://www.knking.com/books/c2/. The websites provide errata and solutions to some exercises

2. **The Linux Command Line**: A Complete Introduction by William E. Shotts, Jr. Access the ebook on USF library's website

V. **University Course Description**
This course extends students' programming knowledge by systematically considering the concepts involved in program design and creation. Students will also build upon their previous programming experience by learning to use the C programming language in a networked environment.

VI. **Course Prerequisites**
COP 2510 (Programming Concepts) or comparable introductory programming course

VII. **Communication**
Students are expected to check Canvas for announcements, materials, and assignments every day.

VIII. **First Week Attendance Policy**
Students are required to check their access to the student cluster and install an emulator (on Windows) on their computers during the first week of class. A first day attendance quiz will be conducted to check this.

IX. Course Structure

The course modules will be delivered online synchronously. Students are expected to attend class meetings during class times.

X. Student Learning Outcomes

Students will be able to

- Read a C program of moderate size and complexity and describe what it does.
- Write programs of moderate size and complexity in the C programming language.
- Compile, test, and debug C programs in a Unix environment.
- Use arrays, strings, and structures.
- Use pointers correctly as function parameters and data structure elements.
- Use streams for file input and output.
- Use dynamic memory allocation for arrays, structures, and linked list.
- Design a program of moderate complexity as multiple small, easily understood modules for abstraction, reusability, and maintainability.
- Write defensive code to detect program errors.

XI. Basis for Final Grade

Assessment	Percent of Final Grade
Quizzes (multiple attempts allowed, highest attempt score kept)	5%
Projects	30%
Midterm Exam 1	15%
Midterm Exam 2	15%
Final Exam	35%

Grading Scale (%)	
90-100	A
80 – 89.99	B
70 – 79.99	C
60 – 69.99	D
0 – 59.99	F

Note: This is a gate course. No +/- grades will be assigned. Pre-test is not counted toward the final grade.

XII. **Course Schedule**

All the dates and assignments are tentative and can be changed at the discretion of the professor.

Week	Dates	Chapters	Topics	Projects
1	Jan 11 – 17	1, 2, 3	C Fundamentals, Input/Output, Unix Commands	Pre-test
2	Jan 18 – 24	4, 5, 6	**Martin Luther King Day (No class Monday/Tuesday)** Selection Statements	Project 1
3	Jan 25 –Jan 31	7	Loops and Basic Types	Project 2
4	Feb 1 – Feb 7	8, 9	Arrays and Functions	Project 3 Quiz 1
5	Feb 8 -12	10,11	Program Organization and Introduction to Pointers **Review Session**	
			Midterm 1: Saturday, Feb. 13, 10:00am-11:30am, online	
6	Feb 15 -21	11, 12	Pointers	
7	Feb 22 – Feb 28	12, 13	Pointers and Arrays, Strings	Project 4
8	Mar 1 –Mar 7	13, 14	Strings library functions and array of strings	Quiz 2, Project 5
9	Mar 8 – 14		**Review Sessions**	
			Midterm 2: Saturday, Mar 13, 10:00am-11:30pm, online	
10	Mar 15-21	22	File Input/Output	Project 6
11	Mar 22-28	16	Structures Abstraction	Project 7 Quiz 3
12	Mar 29– Apr 4	17	Dynamic Memory Allocation Linked List	Project 8
13	Apr 5- 11	17, 19	Writing Large Programs Modularity	Project 9 Quiz 4
14	Apr 12 – 18		**Spring break**	
15	Apr 19-25	17	Ordered Linked List Function Pointers	Project 10
16	Apr 26-30		**Review Sessions Reading Days**	
	May 1		**Cumulative Final Exam: Saturday, May 1, 10:00am-12:00pm, online**	

XIII. **Instructor Feedback Policy & Grade Dissemination**

Instructor will respond to email communication relevant to the subject matter within 48 hours of the date received. Instructor/TA will provide feedback on projects within two weeks of the posted deadline. You can access your scores at any time using "Grades" in Canvas.

XIV. **USF Standard University Policies**

Policies about disability access, religious observances, academic grievances, academic integrity and misconduct, academic continuity, food insecurity, and sexual harassment are governed by a central set of policies that apply to all classes at USF. These may be accessed at: https://www.usf.edu/provost/faculty/core-syllabus-policy-statements.aspx

XV. **Course Policies: Grades**

Late Work Policy:

There are no make-ups for projects, quizzes, the midterm, or the final exam.

Grades of "Incomplete":

The current university policy concerning incomplete grades will be followed in this course.

For USF Tampa undergraduate courses and USFSM undergraduate and graduate courses: An "I" grade may be awarded to a student only when a small portion of the student's work is incomplete and only when the student is otherwise earning a passing grade. The time limit for removing the "I" is to be set by the instructor of the course. For undergraduate students, this time limit may not exceed two academic semesters, whether or not the student is in residence, and/or graduation, whichever comes first. For graduate students, this time limit may not exceed one academic semester. "I" grades not removed by the end of the time limit will be changed to "IF" or "IU," whichever is appropriate.

XVI. **Course Policies: Student Expectations**

Chegg.com and Coursehero.com Policy:

The USF Policy on Academic Integrity specifies that students may not use websites that enable cheating, such as by uploading or downloading material for this purpose. This does apply specifically to chegg.com and coursehero.com– the use of these website (including uploading materials) for solutions of projects constitutes a violation of the academic integrity policy.

End of Semester Student Evaluations:

All classes at USF make use of an online system for students to provide feedback to the University regarding the course. These surveys will be made available at the end of the

semester, and the University will notify you by email when the response window opens. Your participation is highly encouraged and valued.

Netiquette Guidelines:

1. Act professionally in the way you communicate. Treat your instructors and peers with respect, the same way you would do in a face-to-face environment. Respect other people's ideas and be constructive when explaining your views about points you may not agree with.
2. Be sensitive. Be respectful and sensitive when sharing your ideas and opinions. There will be people in your class with different linguistic backgrounds, political and religious beliefs or other general differences.
3. Proofread and check spelling. Doing this before sending an email or posting a thread on a discussion board will allow you to make sure your message is clear and thoughtful. Avoid the use of all capital letters, it can be perceived as if you are shouting, and it is more difficult to read.
4. Keep your communications focused and stay on topic. Complete your ideas before changing the subject. By keeping the message on focus you allow the readers to easily get your idea or answers they are looking for.
5. Be clear with your message. Avoid using humor or sarcasm. Since people can't see your expressions or hear your tone of voice, meaning can be misinterpreted.

Email and Discussion Board Guidelines:

1. Use the subject line effectively by using a meaningful line of what your email or discussion is about.
2. Keep your emails and postings related to the course content. You should not post anything personal on a discussion board, unless is requested by the instructor.
3. Any personal, course or confidential issues should be directly communicated to the instructor via email. The discussion boards are public spaces; therefore, any issues should not be posted there.

XVII. Course Technology & Student Support

Academic Accommodations:

Students with disabilities are responsible for registering with Students with Disabilities Services (SDS) in order to receive academic accommodations. For additional information about academic accommodations and resources, you can visit the SDS website at http://www.usf.edu/student-affairs/student-disabilities-services/ .

Academic Support Services:

The USF Office of Student Success coordinates and promotes university-wide efforts to enhance undergraduate and graduate student success. For a comprehensive list of academic support services available to all USF students, please visit the Office of Student Success website at- http://www.usf.edu/student-success/

Canvas Technical Support:

Include information where students can find technical support.

Example: If you have technical difficulties in canvas, you can find access to the canvas guides and video resources in the "Canvas Help" page on the homepage of your canvas course. You can also contact the help desk by calling 813-974-1222 in Tampa or emailing help@usf.edu.