Software Development and Implementation (INEW 2332)

CREDIT
3 Semester Credit Hours (2hrs lecture, 3hrs lab)

MODE OF INSTRUCTION
Online

PREREQUISITE/CO-REQUISITE:
ITSE 1402 or COSC 1309; one lower-level programming course; ENGL 0305 or ENGL 0365 or ENGL 0115 AND ENGL 0307 or ENGL 0375 or ENGL 0117 or higher-level course (ENGL 1301) or Placement by testing. ENGL 0309 or ENGL 0310 also meets prerequisite; MATH 0308

- **Completed System Analysis**
- **Completed the advanced programming language to be used in the course**
- **Understand the tools (Flow chart, Pseudocode, Project Management)**

COURSE DESCRIPTION
Further strengthen the students' knowledge of computer programming. Emphasis is in the design, coding testing and documentation of computer programs to complete an interrelated systems of a business application and the training necessary to work with computer users.

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Course objectives	Skills Required
Students will develop correct and well documented programs containing complex data structures and incorporate complex input/output file handling techniques	Students will choose appropriate procedures to implement problem solutions in a structured style using resources from all previous programming classes.
Complete an interrelated system of a business application.	Students will use problem-solving skills to determine appropriate program solutions as well as workplace competencies
Training necessary to work with the computer users in implementing the application	Students will document problem solutions through the creation of supporting materials such as flow charts, pseudocode and provide user documentation.

Approved: Initials/date

INSTRUCTOR CONTACT INFORMATION

       Instructor: Abhinav Kamatham

       Email: akamatham@lit.edu

       Office Phone: 409-257-0058

       Office Location: TC-230

       Office Hours: Office Hours

REQUIRED TEXTBOOK AND MATERIALS
Depends on Project Selected for Development and Implementation

ATTENDANCE POLICY
Instructor must include their attendance policy

DROP POLICY
If you wish to drop a course, you are responsible for initiating and completing the drop process.
If you stop coming to class and fail to drop the course, you will earn an "F" in the course.

COURSE CALENDAR

TOPIC	Due on this Date
Procuring and understanding the problem statement	09/13/2024
Developing the logic (Algorithm Development)	10/04/2024
Code the project (Speaking the language of the computer)	10/25/2024
Debugging (Getting rid of errors)	11/10/2024
Finishing the project (Testing and documentation)	11/29/2024

COURSE EVALUATION
Final grades will be calculated according to the following criteria:
       Your project will be evaluated. The project must

1. Analyze and develop plans for a programming project.
2. Create a source code
3. Test the application
4. Deliver a workable project
5. Document the entire process

If all parts of the project are completed, you will receive an A for the course. Each part that is not completed will reduce the final grade by 1 letter.

GRADE SCALE
- 90-100 A
- 80-89   B
- 70-79   C
- 60-69   D
- 0-59   F

TECHNICAL REQUIREMENTS
The latest technical requirements, including hardware, compatible browsers, operating systems, etc. can be online at https://lit.edu/online-learning/online-learning-minimum-computer-requirements. A functional broadband internet connection, such as DSL, cable, or WiFi is necessary to maximize the use of online technology and resources.

DISABILITIES STATEMENT
The Americans with Disabilities Act of 1990 and Section 504 of the Rehabilitation Act of 1973 are federal anti-discrimination statutes that provide comprehensive civil rights for persons with disabilities. LIT provides reasonable accommodations as defined in the Rehabilitation Act of 1973, Section 504 and the Americans with Disabilities Act of 1990, to students with a diagnosed disability. The Special Populations Office is located in the Eagles' Nest Room 129 and helps foster a supportive and inclusive educational environment by maintaining partnerships with faculty and staff, as well as promoting awareness among all members of the Lamar Institute of Technology community. If you believe you have a disability requiring an accommodation, please contact the Special Populations Coordinator at (409)-951-5708 or email specialpopulations@lit.edu. You may also visit the online resource at Special Populations - Lamar Institute of Technology (lit.edu).

STUDENT CODE OF CONDUCT STATEMENT
It is the responsibility of all registered Lamar Institute of Technology students to access, read, understand and abide by all published policies, regulations, and procedures listed in the *LIT Catalog and Student Handbook*. The *LIT Catalog and Student Handbook* may be accessed at www.lit.edu. Please note that the online version of the *LIT Catalog and Student Handbook* supersedes all other versions of the same document.

ARTIFICIAL INTELLIGENCE STATEMENT

Lamar Institute of Technology (LIT) recognizes the recent advances in Artificial Intelligence (AI), such as ChatGPT, have changed the landscape of many career disciplines and will impact many students in and out of the classroom. To prepare students for their selected careers, LIT desires to guide students in the ethical use of these technologies and incorporate AI into classroom instruction and assignments appropriately. Appropriate use of these technologies is at the discretion of the instructor. Students are reminded that all submitted work must be their own original work unless otherwise specified. Students should contact their instructor with any questions as to the acceptable use of AI/ChatGPT in their courses

STARFISH

LIT utilizes an early alert system called Starfish. Throughout the semester, you may receive emails from Starfish regarding your course grades, attendance, or academic performance. Faculty members record student attendance, raise flags and kudos to express concern or give praise, and you can make an appointment with faculty and staff all through the Starfish home page. You can also login to Blackboard or MyLIT and click on the Starfish link to view academic alerts and detailed information. It is the responsibility of the student to pay attention to these emails and information in Starfish and consider taking the recommended actions. Starfish is used to help you be a successful student at LIT.

ADDITIONAL COURSE POLICIES/INFORMATION

1. Students should log onto Blackboard and access this course at least 3 times a week to keep on track with assignments.

2. Cheating of any kind will **not** be tolerated.

3. Internet Usage – Students are expected to use proper net etiquette while participating in course emails, assignment submissions, and online discussions.

4. Students should turn assignments in by the posted due date and time. **Late work** is not accepted. All assignments and quizzes stay open the entire term.

5. If you wish to drop a course, the student is responsible for initiating and completing the drop process. If you stop coming to class and fail to drop the course, you will earn an 'F' in the course.

6. If you need to contact the instructor, you can send an e-mail to akamatham@lit.edu. Your e-mail will be answered within 48 hours Monday – Thursday and within 72 hours Friday - Sunday.

7. Assignments may NOT be submitted via email.