



CIS 158: Introduction to Procedural Programming

Procedural Programming (C/C++) under Unix. Data types, variable declarations, arithmetic expressions, conditional statements, macros, function prototypes, standard libraries, file processing, pointers, structures, unions and dynamic memory management are discussed. Unix file system, shell scripts, input/output redirection, piping, programming with standard I/O and Unix system calls will be covered. Three lecture hours and two laboratory hours per week. Instructional Support Fee applies. Gen. Ed. Competencies Met: Information Literacy.

Course Student Learning Outcomes

1. Login to a Unix/Linux system using secure shell and execute bash shell commands or shell scripts from the prompt including the use of filename substitution.
2. Create, change to and remove directories using absolute and relative path names.
3. Create and use a function using the C programming language.
4. Create and execute make file to compile one or more C programs into binary.
5. Create C functions that properly apply the use of various shell looping and decision statements.
6. Create C functions that use pointers for variable and array access.

Credits: 4

Program: Computer Information Systems