

COMPUTER INFORMATION SYSTEMS - SOFTWARE DEVELOPMENT, ASSOCIATE OF APPLIED BUSINESS

Curriculum Code #6618

Effective May 2025

Division of Engineering, Business and Information Technologies (<http://catalog.lorainccc.edu/academic-programs/engineering-business-information-technologies/>)

The software development major prepares students for programming on different computer platforms. Students will learn to design and develop software using the procedural and object-oriented languages most commonly used in business. Additional topics covered include database design and development and an introduction to networking. Lorain County Community College has articulation agreements with colleges and universities including programs offered by Lorain County Community College's University Partnership.

First Year

Fall Semester		Hours
CISS 121	MICROCOMPUTER APPLICATIONS I	3
CISS 125	OPERATING SYSTEM INTERFACES ¹	3
CMMC 151	ORAL COMMUNICATION	3
ENGL 161	COLLEGE COMPOSITION I	3
Select one from the following list: ⁵		3-5
MTHM 155	TECHNICAL MATHEMATICS I	
MTHM 158	QUANTITATIVE REASONING	
MTHM 171	COLLEGE ALGEBRA	
MTHM 176	PRECALCULUS	
SDEV 101	INTRODUCTION TO THE LCCC COMMUNITY ³	1
Hours		16-18

Spring Semester

CISS 145	LOCAL AREA NETWORKS ²	4
CISS 160	INTRODUCTION TO PROGRAMMING IN C# ²	4
CISS 216	WEB DEVELOPMENT ²	3
Science elective (from Transfer Module) ⁵		3-4
Hours		14-15

Second Year

Fall Semester		Hours
ACTG 151	ACCOUNTING I - FINANCIAL	4
BADM 155 or BADM 171	INTRODUCTION TO BUSINESS ADMINISTRATION or INTRODUCTION TO E-COMMERCE	3
CISS 143	DATABASE DESIGN AND IMPLEMENTATION ²	3
CISS 222	ADVANCED PROGRAMMING IN C# ²	3

PSYH 151 or SOCY 151G	INTRODUCTION TO PSYCHOLOGY or INTRODUCTION TO SOCIOLOGY	3
Hours		16
Spring Semester		
ACTG 152	ACCOUNTING II - MANAGERIAL ²	4
CISS 226	INTRODUCTION TO PROGRAMMING IN JAVA ²	3
CISS 243	WEB DATABASE INTEGRATION ²	4
CISS 247	SYSTEMS DEVELOPMENT ²	3
CISS 287	WORK-BASED LEARNING I - CISS ⁴	1
Hours		15
Total Hours		61-64

1

Indicates that this course requires a prerequisite or may be taken concurrently.

2

Indicates that this course requires a prerequisite.

3

A student must register for the orientation course when enrolling for more than six credit hours per semester or any course that would result in an accumulation of 12 or more credit hours.

4

Students may substitute CISS 232, CISS 264 in place of Work Based Learning. Students intending to transfer should consult with the intended transfer institution, the Engineering, Business and Information Technologies division or an LCCC advisor for transfer information.

5

Before taking any electives, science and/or math classes, students intending to transfer elsewhere should consult with the intended transfer institution or consult with an LCCC advisor for transfer information.

Program Contact(s):

Mark Harms

440-366-7023

jharms@lorainccc.edu

For information about admissions, enrollment, transfer, graduation and other general questions, please contact your advising team (<https://www.lorainccc.edu/admissions-and-enrollment/advising-and-counseling/>).

More program information can be found on our website. (<https://www.lorainccc.edu/it/programming-and-software-development/associate-of-applied-business-in-software-development/>)

Credit for Prior Learning (PLA) options may be available for your program. For more information, please visit our website: www.lorainccc.edu/PLA (<http://www.lorainccc.edu/PLA/>)

Program Learning Outcomes

1. Design software solutions for business applications
2. Develop software programs and components
3. Demonstrate fundamental techniques and skills utilizing business computer applications, software development, and database management systems

4. Demonstrate Information Technology infrastructure knowledge, techniques, and fundamental skills utilizing operating systems and networks