

LANSING COMMUNITY COLLEGE

CURRICULUM GUIDE

Computer Programmer/Analyst
Associate in Business Degree

Curriculum Code: 0113 (Effective Fall 2005 – Summer 2010)

Programmer/analysts plan, develop, test, and document computer programs at the request of a specific user, applying knowledge of programming techniques and computer systems. They may evaluate user requests to determine feasibility, cost, and time required, as well as compatibility with current system and computer capabilities. In addition, they read manuals, periodicals, and technical reports to develop programs that meet user requirements. They formulate a plan outlining steps required to develop programs and convert project specifications into program source instructions which are entered into the computer system and tested. They may write documentation and the user manual. **Not all courses in this program transfer to all colleges.** Students planning to transfer should see an academic advisor or counselor before enrolling in any course.

PREREQUISITES

Students should see *Course Descriptions* or *Course Offerings* for course prerequisite information. See the *Assessment and Placement Testing* section for skills assessment and advising information.

INFORMATION

Contact the Media, Art, and Information Technologies Department, Old Central Building, Room 137, telephone number (517) 483-1546.

REQUIREMENTS

TOTAL: 36 CREDITS

CODE	TITLE	CREDIT HOURS
CITD120	SQL Concepts	2
CITD250	Database Concepts	3
CITF108	Microsoft Windows	2
CITF110	Intro to Computer Info Systems	3
CITF120	Operating System Concepts	3
CITF200	Information Systems and Problem Solving	3
CITF240	Information Technology Project Mgmt	3
CITF260	Systems Analysis and Design	4
CITN120	Introduction to Networking	3
CITP110	Introduction to Computer Programming	4
CITW150	Internet Literacy	3
CITW160	Developing Pages for the Web	3

LIMITED CHOICE REQUIREMENTS**TOTAL: 33–40 CREDITS**Complete the indicated number of credits from **EACH CHOICE** listed below.**CHOICE 1: General Education Core Areas****16–21 Credits***(See General Education Core Requirements for information on how to fulfill these requirements.**Core area proficiency exams, where appropriate, are available for each core area.)*

Communication Core Area (See Note 1)	3–4
Global Perspectives and Diversity Core Area (See Note 2)	3–4
Mathematics Core Area (See Note 3)	3–4
Science Core Area (See Note 4)	4–5
Writing Core Area (See Note 5)	3–4

CHOICE 2: Programming Tracks (Choose two subchoices)**14–15 Credits****Subchoice 2A: Visual Basic Programming Track**

CITP150	Introduction to VB.Net Programming	4
CITP250	Advanced VB.Net Programming	4

Subchoice 2B: Internet Programming Track

CITW165	Advanced Web Development	3
CITW180	ASP.NET Web Development (see Note 6)	4

Subchoice 2C: Java Programming Track

CITP190	Introduction to Programming in JAVA	3
CITP290	Advanced JAVA Programming for Business	4

CHOICE 3: Business and Computer Related Electives**3–4 Credits**

ACCG100	Practical Accounting for Non-Majors	3
ACCG210	Principles of Accounting I	4
BUSN118	Introduction to Business	3
CITF107	IC3 Certification	3
CITP295	Programming Internship	3

MINIMUM TOTAL**69**

NOTES:

1. SPCH110 or SPCH120 is recommended for the Communication Core area.
2. OADM275 is recommended for the Global Perspectives and Diversity Core area.
3. MATH119 is recommended for the Mathematics Core area.
4. ISCI131 is recommended for the Science Core area.
5. WRIT127 is recommended for the Writing Core area.
6. Students will need to follow Subchoice 2A to meet the prerequisite for this course.
7. For graduation from this program, a student must have earned a minimum 2.0 grade in each course with a CIT_ prefix.

SUGGESTED COURSE SEQUENCE

Students should see course descriptions to find out when departments plan to offer courses. Students who for any reason are unable to follow the course sequence suggested below (for example, those who are part-time, have transferred in courses from another school, or have prerequisites to fulfill) should contact an academic advisor or counselor for help with adjustments.

I	II	III	IV
CITD120	CITF120	CITD250	CITF240
CITF108	CITN120	CITF200	CITF260
CITF110	CITW160	Lim.Ch.1	Lim.Ch.1
CITP110	Lim.Ch.1	Lim.Ch.2	Lim.Ch.2
CITW150	Lim.Ch.1	Lim.Ch.2	Lim.Ch.3
Lim.Ch.1	Lim.Ch.2		