

The Computer Information Systems Bachelor of Science degree offered through the College of Business at Ferris prepares students to be team leaders in the development and maintenance of Business Information Systems. Starting positions include application programmer/analyst, business analyst, systems analyst, networking administrators, consultants, software developers, computer support specialist, systems administrators, project leaders and web developers.

To assure relevance and enduring value, our Computer Information Systems (CIS) program has been designed to align with the national standard (IS2002) established by computing professionals. In addition, we have drawn upon our tight linkages with industry to assure that our labs and our required internships provide the level of hands-on experience that ensures our students are sought after by employers who recognize Ferris as a source of skilled, knowledgeable IS/IT graduates that can hit the ground running and grow from there.

Computers and Information Systems have become essential to all aspects of business and life. Professionals are needed to relate the problem-solving abilities of a computer system to an individual business department, corporation, or multi-national enterprise.

This program has close relationships with the IT industry through a program advisory board, and requires internships as a practical hands-on experience. The hands-on approach in the bachelor degree gives graduates a real-world look at their professional field.

Communication Competency Requirements

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
COMM 121	Fundamentals of Public Speaking	3	COM 131	Fundamentals of Public Speaking	3
ENGL 150	English 1	3	EN 101	English Composition 1	3
ENGL 250	English 2	3	EN 102	English Composition 2	3
ENGL 311 or ENGL 325	Advanced Technical Writing or Advanced Business Writing	3	EN 249	Technical Writing	3

Quantitative Literacy Requirements

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
MATH 114 or MATH 115	Quantitative Reasoning for Professionals or Intermediate Algebra	4 or 3	BA 150 or MA 107	Mathematical Applications in Business or Intermediate Algebra	4

Natural Sciences Competency Requirements – 1 course with lab

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
Varies	FSU General Education – Natural Sciences electives	6	Varies	Varies	6 - 7

Culture Competency Requirements - 9 credits required; 1 course at 200+ FSU level

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
Varies	FSU General Education – Culture electives	9	Varies	Varies	9

Self and Society Competency Requirements - 9 credits required; 1 course at 200+ FSU level

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
ECON 201	Principles of Microeconomics	3	EC 252	Principles of Economics 2	3
ECON 202	Principles of Macroeconomics	3	EC 251	Principles of Economics 1	3
Varies	FSU General Education – Self and Society Elective – Non-Economics	3	Varies	Varies	3

Additional General Education Requirements

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
ISYS 330	Systems Analysis and Design 1	3	CIS 224	Introduction to System Analysis	3

Refer to FSU's General Education Requirements at [Ferris State University General Education Program](#).

Diversity Competency – 2 Courses Required

If not met by courses taken for Culture, Self and Society, or MTA, a student must meet the following:

- 1 course with the Global Diversity attribute
- 1 course with the U.S. Diversity attribute

Computer Information Systems degree students must complete **43** General Education credits to meet College of Business and University Requirements and are encouraged to work with an advisor to select appropriate general education courses. **Ferris State University and Grand Rapids Community College – Computer Information Systems – Transfer Guide**

Business Core Requirements

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
ACCT 201	Principles of Accounting 1	3	BA 256	Principles of Accounting 1	4
ACCT 202	Principles of Accounting 2	3	BA 257	Principles of Accounting 2	4
BLAW 321	Contracts & Sales	3	No Equivalent	No Equivalent	0
BUSN 499	Interdisciplinary Integrating Exp.	3	No Equivalent	No Equivalent	No Equivalent
FINC 322	Financial Management 1	3	No Equivalent	No Equivalent	No Equivalent
ISYS 321	Business Information Systems	3	No Equivalent	No Equivalent	No Equivalent
MGMT 301	Applied Management	3	BA 283	Business Management	3
MGMT 370	Quality/Operations Management	3	No Equivalent	No Equivalent	No Equivalent
MKTG 321	Principles of Marketing	3	BA 270	Marketing	3
STQM 260	Introduction to Statistics	3	BA 254 or MA 215 or PY 281	Business Statistics or Statistics or Introduction to Statistics	3 - 4

Major Requirements

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
ISYS 110	Fundamentals of Programming Design and Logic	3	CIS 116	Computer Programming 1	3
ISYS 216	Introduction Java Programming	3	CIS 117 or CIS 127	Java Programming 1 or C++ Programming 1	3
ISYS 221	Mobile Application Development	3	CIS 274	Application Development and Security for Mobile Devices	3
ISYS 272	Fundamentals of Database Systems	3	CIS 171	Database Design and Development	3
ISYS 288	Web Application Development	3	CIS 247	Web Application Programming 2	3
ISYS 316	Advanced Java Programming	3	CIS 217 or CIS 227	Java Programming 2 or C++ Programming 2	3
ISYS 327	Operating Systems and Network Essentials	3	No Equivalent	No Equivalent	No Equivalent
ISYS 372	Advanced Database Systems	3	No Equivalent	No Equivalent	No Equivalent
ISYS 431	Systems Analysis and Design 2	3	No Equivalent	No Equivalent	No Equivalent
ISYS 482	Enterprise Integration and Business Process Design	3	No Equivalent	No Equivalent	No Equivalent
ISYS 489	Senior Capstone	3	No Equivalent	No Equivalent	No Equivalent
ISYS 491	*Internship (Junior Status)	3	No Equivalent	No Equivalent	No Equivalent
PROJ 320	Project Management	3	No Equivalent	No Equivalent	No Equivalent

Directed Electives

FSU Course	FSU Course Title	FSU Cr. Hrs.	GRCC Equiv.	GRCC Course Title	GRCC Cr. Hrs.
ISYS 2 --		3	CIS 241	Web Application Programming 1	3
Varies	Varies	9	Varies	Approved GRCC Directive Electives: CIS 125, CIS 129, CIS 132, CIS 135, **CIS 148 , CIS 156, CIS 170, CIS 175, CIS 176, CIS 177, **CIS 178 , CIS 223, CIS 225, CIS 229, CIS 232, CIS 233, CIS 234, CIS 235, CIS 265, CIS 266, CIS 271, CIS 272, CIS 273, CIS 275, CIS 276, CIS 277, and CIS 285 (Note: This is only pre-approved Directive Electives, see your FSU faculty advisor to determine additional options.)	9

Total Credits Required for Degree	121
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*CIS Internship not required with 1+ year work experience in field. Credits will be substituted with directive elective (See FSU advisor).

**GRCC's CIS 148 and CIS 178 are pre-requisite courses for CIS 241, CIS 247, and CIS 274

No more than 90 credit hours may be transferred from the community college to Ferris State University.

CIS / CIT credits that are not part of a completed degree, either transfer or Ferris, that are older than 10 years will not be counted toward the degree requirements for CIS/CIT program. Exceptions to this rule may be considered by petitioning the program coordinator.

Program Delivery Locations and Contact Information:

Main Campus, Big Rapids

College of Business

(800) 433-7747 | (231) 591-2420 | [College of Business Email](#) | [College of Business Website](#)

**Select courses may be delivered online and/or in a mixed delivery format (i.e. a mix of online and face-to-face instruction at the Ferris Main Campus or at an off-campus location).*

General Admission Criteria

Transfer Students

- Combined college or university GPA of 2.5 (on a 4.0 scale) from all institutions attended. GPA is based on completion of 12 credit hours or more. Developmental courses will not be considered in computing the GPA requirement.
- Transfer equivalency for FSU ENGL 150 or placement during the first semester at FSU which would require an ACT English score of 16 or higher; or SAT ERW score of 450 or higher; or Accuplacer English score of 6 or higher.
- Transfer equivalency for FSU MATH 114/115 or placement during the first semester at FSU which would require an ACT Math score of 19 or higher; SAT Math score of 500 or higher; or Accuplacer Math scores: Elementary Algebra score 75 or higher and College Level Math 0-49.
- **Degree Completion at the Community College through Ferris Statewide or Online program:** Minimum 48 transferable credit hours ("C" or better on 4.0 scale) from an accredited college or university.

Advising Notes

It is recommended that potential applicants meet with an advisor to review the degree, course schedule, and have any questions answered prior to completing an application. Students who are completing the MTA may have different general education course requirements for the particular degree selected. Meeting with a Ferris advisor prior to the selection of general education or elective course work may reduce the chance of completing a course that will not apply toward the selected degree. Once admitted, students must continue to meet with an advisor as they work toward graduation.

Transfer Student Orientation

All new students to Ferris State University are required to complete an orientation.

Reverse Transfer Agreement

The Community College and Ferris have entered into a partnership in order to work collaboratively and creatively to increase student completion of associate and bachelor degrees. The partners work together to provide a seamless transfer experience and increase student retention and completion at both the community college and Ferris.

Michigan Transfer Agreement (MTA)

Ferris participates in the Michigan Transfer Agreement (MTA). This agreement will facilitate the transfer of general education requirements from one Michigan institution to another. Students may complete the MTA as part of a degree program or as a stand-alone package. The MTA consists of a minimum of 30 general education credit hours as identified by the college or university.

Students transferring to Ferris with the Michigan Transfer Agreement (MTA) and entering a degree program will have met a 30-hour block of lower-level general education courses. However, this does not exempt students from completing program specific prerequisites or higher-level general education course requirements. Students should contact their advisor regarding classes that meet the MTA.

Students must work with their Ferris advisor to declare a Minor or Concentration and for selection of Directed Electives.

Disclaimer

This is a guide for students who plan to transfer to Ferris State University. This guide is not intended to be a contract with Ferris. The information on this guide is subject to change. Students should contact their community college or Ferris to keep informed of changes. Final responsibility for verifying all transfer information lies with the student. Please refer to effective and/or revised date on the bottom of this guide.