

INFORMATION TECHNOLOGY (M.S.)

Requirements

The MSIT degree requires 10 graduate-level courses for a total of 30 credits. Students must take six core courses (18 credits) and four elective courses (12 credits). The program allows students to specialize in one of four career-oriented tracks, according to their interests. They can choose from tracks in Business Analytics, Cybersecurity, Digital Transformation, and Enterprise Computing.

Prerequisites

Students who completed a non-business undergraduate major are required to do a self-study module on IT and business to ensure that they have a basic understanding of the material covered in our Business IT course. In addition, data mining and other data analytics courses may require an understanding of basic statistics.

Curriculum

Students who have advanced experience or a deep academic background may substitute up to two of the core courses with advanced information systems electives, with permission from the area chair.

Students may choose elective courses that meet their individual interests and career aspirations. Conversations with the program director and academic adviser will help in this process.

Course	Title	Credits
ISGB 7902	System Analysis & Design	3
ISGB 7973	Database Management	3
ISGB 7955	Project Management	3
ISGB 7905	Web Applications Development	3
ISGB 7967	Data Mining for Business	3
ISGB 7910	Info Systems Strategy & Mgmt	3
Four elective courses, for example: ¹		12
<i>Three courses from one of the following tracks: ²</i>		
	Business Analytics	
	Cybersecurity	
	Digital Transformation	
	Enterprise Computing	
Total Credits		30

¹ For a full list of courses that fulfill the MSIT elective requirement, see the below list.

² For details on the four MSIT tracks, see the Tracks (p.) tab.

Electives

Courses in this group have the ISEL attribute.

Course	Title	Credits
ACGB 7185	Derivatives and Analytics for Accounting	3
ACGB 719G	Audit Data Analytics	3
ACGB 719H	IT Audit and Information Assurance	3
DGGB 6820	Statistics	3

DGGB 7844	Stat Methods and Comp I	3
ISGB 6910	Business Tech & Analytics	3
ISGB 7901	E Business Strategies & Appl	3
ISGB 7922	Healthcare IT	3
ISGB 7924	Mobile E-Commerce and Apps	3
ISGB 7932	Accounting Info System	3
ISGB 7933	Audit Data Analytics	3
ISGB 7934	Artificial Intelligence	3
ISGB 7942	Optimization Models in Bus	3
ISGB 7943	Programming with Python	3
ISGB 7944	Sports Analytics	3
ISGB 7945	IT and Sustainability	3
ISGB 7975	Business Analytics for Managers	3
ISGB 7977	Text Analytics	3
ISGB 7978	Web Analytics	3
ISGB 7980	Bus Modeling w/Adv Sprdsheets	3
ISGB 7985	Data Warehousing	3
ISGB 7988	Business Performance and Risk Management	3
ISGB 7990	Big Data Analytics	3
ISGB 799D	Cybersecurity for Business	3
ISGB 799L	Study Tour: Germany	3
ISGB 799R	IT Audit and Information Assurance	3
ISGB 799S	C++ Programming	3
ISGB 799V	R Statistical Programming	3
ISGB 799W	Java Programming	3
ISGB 799X	Fintech -An Introduction	3
ISGB 799Y	Blockchain Tech & App Dev	3
ISGB 799Z	Deep Learning	3
ISGB 79AA	Advanced Python for Financial Programming	3
ISGB 79AC	Cybersecurity Analytics for Business	3
ISGB 79AD	Digital Forensics	3
ISGB 79AE	Robotic Process Automation	3
MKGB 779I	Data-Driven Marketing Decisions	3
MKGB 879X	Applied CRM	1.5
OPGB 6627	Operations and Supply Chain Management	3
QFGB 8968	Blockchain Technology and Application Development	3
SDGB 7851	Measurement and Data Visualization	3

Students seeking special permission to count a course without the BYGB or ISGB subject code as an elective must follow the below, three-step approval process.

Only 6000-level or above courses may be considered for electives to count towards MSIT.

1. The student should send a detailed petition to the MSIT Program Director explaining why they are considering a non-BYGB or ISGB subject code course as an elective.
2. The student should request permission from the instructor of the relevant course to join the elective, who should then send an email to the student authorizing the student's enrollment in the

2 *Information Technology (M.S.)*

course. The student should forward that email to the MSIT Program Director and MSIT Advising Dean.

3. The MSIT Program Director and MSIT Advising Dean will discuss the request, giving it due consideration, and render a decision on whether the non-BYGB or ISGB subject code course may be accepted as an elective.

Note: all advanced ISGB courses with prerequisites must be met (please discuss with the Program Director/Advising Dean).