

Master of Science in Management Information Systems Curriculum Planner, 2025-26

The University at Buffalo School of Management continuously strives to comply with Web Content Accessibility Guidelines to make documents accessible to visitors with disabilities using assistive technology. If you need help accessing any of this document's content, contact the School of Management Graduate Programs Office at 716-645-3200 or by email at mgtgsrv@buffalo.edu.

CORE CURRICULUM (13 credits total)

Required core courses (6 credits)

Course Number	Course Title	Credits	Semester
MGQ 606	Statistical Foundations of Analytics	3	Fall
MGS 607	Technology and Innovation Management	3	Spring

Required Flexcore courses: Choose at least 2 below (6 credits),

Availability varies by semester. Refer to catalog.

Course Number	Course Title	Credits
MGS 602	Information Technology and Cloud Infrastructure Management	3
MGS 613	Database Management Systems	3
MGS 614	Systems Analysis and Design	3
MGS 616	Predictive Analytics	3
MGS 628	Data Visualization	3
MGS 639	Cybersecurity, Privacy and Ethics	3

Required capstone: Choose 1 below (1 credit)

Course Number	Course Title	Credits	Semester
MGS 646	MIS Project Guidance (Certification)	1	Winter semester
MGS 649	MS Practicum (Full-time internship)	1	Second summer

ELECTIVES (18 credits total)

Choose 6 courses (3 in Fall, 3 in Spring) from below and next page.

Availability varies by semester. Refer to catalog.

Course Number	Course Title	Credits
MGS 602	Information Technology and Cloud Infrastructure Management	3
MGS 610	Digital Forensics	3
MGS 613	Database Management Systems	3
MGS 614	Systems Analysis and Design	3
MGS 616	Predictive Analytics	3
MGS 617	Spreadsheet and Statistical Programming for Business	3
MGS 618	Special Topics: Adopting Generative AI in the Enterprise	3
MGS 618	Special Topics: System Security	3
MGS 623	IT Process Quality Management	3
MGS 625	Management of IT Projects	3
MGS 628	Data Visualization	3

Rev: 10/24

Course Number	Course Title	Credits
MGS 632	Seminar in Health Information Systems	3
MGS 635	Digital Product Management	3
MGS 636	Applied AI for Managers	3
MGS 637	Cloud Computing Security Concepts	3
MGS 638	Cybersecurity Analytics	3
MGS 639	Cybersecurity, Privacy and Ethics	3
MGS 640	IT Risk Management	3
MGS 642	IS Auditing for IT Managers	3
MGS 647	Supervised Research (Faculty Director approval required)	3
MGS 650	Information Security and Assurance	3
MGS 653	Social Network Analytics	3
MGS 655	Distributed Computing and Big Data Technologies	3
MGS 657	Cloud Data Warehousing and Data Engineering	3
MGS 659	Web Analytics and Optimization Techniques for E-Commerce	3
MGS 662	Optimization Methods for Machine Learning	3
MGS 684	CRM Apps Consulting Practices	3
MGS 686	Tech Consulting for Social Impact	3
MGS 687	Experiential IT Project	3
MGG 524	Management Communications*	1.5
MGG 525	Leading Teams and Organizations*	1.5
MGM 653	Digital Marketing Analytics	3

SUMMARY

13 core credits + 18 elective credits = 31 credits required for degree Students may only enroll in 12 credits per semester.

^{*} Courses noted must be taken together † Additional flexcore course may be taken from the list. Any classes beyond the required 6 credits will then count as an elective.

^{*} Curricular offerings and requirements are subject to change.