COMPUTER/INFORMATION TECH (CMPL)

Visit the Course Schedule Search website to find out when courses will be offered during the academic year.

Read more about the courses within this subject prefix in the descriptions provided below.

CMPL 801 - Principles of Information Technology for IT Managers
Credits: 3
This course introduces foundational concepts in technology management, with a focus on the strategic and operational aspects of overseeing technology resources within organizations. Topics include IT staff formation, project governance, data compliance and security, IT asset management, financial management, contracts and service-level agreements, AI trends, and disaster recovery.
Grade Mode: Letter Grading

CMPL 802 - Managing Virtualization and Cloud Systems
Credits: 3
Through theoretical and practical exercises, students design and configure cloud and virtual environments essential to managing cloud technologies. Students engage directly with foundational cloud concepts, virtual hardware, migration strategies, and networking to develop cloud security, identity management, storage, and performance management implementations. Emphasis is on employing automated processes in maintaining and optimizing cloud resources, and using platforms like AWS, Microsoft Azure, and Google Cloud Platform.
Grade Mode: Graduate Credit/Fail grading

CMPL 810 - Current and Emerging Technologies
Credits: 3
This course introduces foundational concepts in technology management, with a focus on the strategic and operational aspects of overseeing technology resources within organizations. Topics include IT staff formation, project governance, data compliance and security, IT asset management, financial management, contracts and service-level agreements, AI trends, and disaster recovery.
Grade Mode: Letter Grading

CMPL 815 - Managing Artificial Intelligence
Credits: 3
This course explores the transformative potential of artificial intelligence in the business context. Participants will learn how to effectively manage AI technologies to enhance business operations, foster innovation, and drive competitive advantage. Through a mix of theoretical content, case studies, interactive discussions, and practical exercises, learners will gain a deep understanding of how to blend AI with human capabilities to optimize performance and strategy.
Grade Mode: Letter Grading

CMPL 820 - Information Privacy, Security, and Continuity
Credits: 3
This course focuses on critical aspects of IT security and risk management, emphasizing how an IT Manager will handle these responsibilities. It comprises threat assessment, risk mitigation, security policies, incident response, and compliance with legal and regulatory requirements. Students will learn not only the vulnerabilities of an organization but also security controls and risk management plans to mitigate risks to data security and the organization's continuity. In this regard, the course uses case studies, practical exercises, and discussions to equip IT managers with adequate tools to manage IT security and risk management issues.
Grade Mode: Letter Grading

CMPL 825 - Designing and Analyzing Information Systems
Credits: 3
This course explores the integration of Business Intelligence (BI) strategies and Big Data technologies to enhance organizational decision-making and performance. Students will develop a comprehensive BI strategy that aligns with an organization's goals and objectives, leveraging the Hadoop Ecosystem to manage and process large datasets. Emphasis is placed on understanding the Software Development Lifecycle (SDLC) and its impact on long-term systems planning within IT departments. Through case studies and practical applications, students will learn to design data-driven systems that support key performance indicators (KPIs) and executive decision-making, while transforming Information Systems (IS) and Decision Support Systems (DSS) to meet organizational needs.
Grade Mode: Letter Grading

CMPL 850 - Managing Information Technology Capstone
Credits: 3
Information Technology Management Capstone is the culminating, research-based course for the Master of Science in Information Technology Management program. This graduate-level course integrates and applies the knowledge and skills acquired throughout the program. The capstone course requires students to engage in comprehensive research and demonstrate their ability to manage IT strategy, operations, and projects in a real-world or simulated environment. Students will explore advanced concepts of IT management, including IT strategy, operations management, project management, agile methodologies, IT portfolio management, project governance, and IT security. The course emphasizes the practical application of these principles through research, preparing students to effectively lead and manage IT departments.
Grade Mode: Letter Grading