

TCMG - TECHNOLOGY MANAGEMENT (TCMG)

TCMG 272 Technology and End-User Support

Credits 3. 3 Lecture Hours.

Upgrading, setup, configuration, troubleshooting of computer systems; development of skills to work with end-users; technology needs assessment; escalation and defusing strategies; service learning and community engagement.

Prerequisite: Sophomore classification.

TCMG 274 Foundations of Networking in Education

Credits 3. 3 Lecture Hours. 1 Lab Hour.

Development of knowledge towards application of telecommunications facilities in networking; technical alternatives for delivery of subject matter for educators and trainers.

Prerequisites: TCMG 272 or concurrent enrollment, or approval of instructor.

TCMG 285 Directed Studies

Credits 0 to 12. 0 to 12 Lecture Hours.

Directed readings or research problems in industrial technology.

TCMG 289 Special Topics in...

Credits 1 to 4. 1 to 4 Lecture Hours. 0 to 4 Lab Hours.

Selected topics in an identified area of industrial technology. May be repeated for credit.

TCMG 291 Research

Credits 0 to 4. 0 to 4 Lecture Hours.

Research conducted under the direction of faculty member in technology management. May be repeated 3 times for credit.

Prerequisites: Freshman or sophomore classification and approval of instructor.

TCMG 303 Unix System Administration Practices

Credits 4. 3 Lecture Hours. 3 Lab Hours.

Development and system administration of the Unix operating system; technical alternatives for proactive and reactive maintenance of system health.

Prerequisites: TCMG 272 and TCMG 274 with a grade of C or better; junior or senior classification or approval of instructor.

TCMG 308 Cybersecurity and Digital Ethics

Credits 3. 3 Lecture Hours.

Introduction to cybersecurity; analysis of threats and risks from the environment; development of appropriate strategies to mitigate impact; ethics of extraordinary administrative access; ethics of digital forensics and implications to society.

Prerequisites: TCMG 272 and TCMG 274 with a grade of C or better; junior or senior classification or approval of instructor.

TCMG 316 Database Systems Administration and Application

Credits 4. 3 Lecture Hours. 3 Lab Hours.

Database administration and application use techniques; database structures, modeling, configuration, development, security, topologies and access; focus on system administration of Unix-based database systems.

Prerequisite: TCMG 303 with a grade of C or better.

TCMG 396 Foundations of Data Analytics in Technology Management

Credits 3. 3 Lecture Hours.

Development of knowledge and skills towards gathering, describing, and analyzing data, and use of advanced statistical tools for decision making on technology management, organization operations, risk management, and educational human resources development, etc; identification, location, analysis, and reporting of data sources both qualitatively and quantitatively; hands-on practical experience including statistical inference, time series analysis, Monte Carlo simulation, and optimization models, etc.

Prerequisite: Grade of C or better in EHRD 391; junior classification; or approval of instructor.

TCMG 402 Instructional Technology and Design

Credits 3. 3 Lecture Hours.

Design principles; development of instruction; contemporary issues and trends; foundations in learning research; requirements for instruction, task and needs analysis; learning situations and instructional models; hardware and software innovations; assessing instructional outcomes; factors affecting utilization.

Prerequisites: EHRD 371 with a grade of C or better; junior or senior classification or approval of instructor.

TCMG 412 Contemporary Issues in Technology Management

Credits 3. 3 Lecture Hours.

Specific innovation or practices nascent to the professional information technology industry; discovery of practical applications and analytics of new innovation.

Prerequisites: TCMG 272 and TCMG 274 with a grade of C or better; junior or senior classification.

TCMG 476 Technical Network Capstone

Credits 4. 3 Lecture Hours. 3 Lab Hours.

Development of knowledge and skills towards the application of technical network management in public education and corporate training settings; focus on practices, techniques and tools for managers of technical networks.

Prerequisites: TCMG 303 or TCMG 304 with a grade of C or better; junior or senior classification.

TCMG 484 Professional Internship

Credits 6. 6 Other Hours.

Directed internship in an organization to provide students with a learning experience supervised by professionals in organizational settings appropriate to the student's professional objectives; must be in good standing with the University. Must be taken on a satisfactory/unsatisfactory basis.

Prerequisites: EHRD 481 and EHRD 490 with a grade of C or better; approval of instructor.

TCMG 485 Directed Studies

Credits 0 to 12. 0 to 12 Other Hours.

Directed readings or research problems in industrial technology.

Prerequisites: Junior or senior classification; approval of directed studies application.

TCMG 489 Special Topics in...

Credits 1 to 4. 1 to 4 Lecture Hours. 0 to 4 Lab Hours.

Selected topics in an identified area of industrial technology. May be repeated for credit.

Prerequisite: Approval of instructor.

TCMG 491 Research

Credits 0 to 4. 0 to 4 Other Hours.

Research conducted under the direction of faculty member in technology management.

Prerequisites: Junior or senior classification; approval of instructor.