

“At A Glance” ISEM Master’s Program and Related Courses (version 06/22/23)
(See HU Graduate Catalog for Course Details)

<ul style="list-style-type: none"> (Year 1, Semester 1) ISEM 501: Introduction to Digital Technologies (Preparatory Elective course)
“Mandatory Core” courses (5 Courses = 15 semester hours)
<ul style="list-style-type: none"> (Year 1, Semester 1) ISEM 500: Strategic Planning for Digital Transformation (Year 1, Semester 1) MGMT 510: Business Strategy & Management Principles (Year 1, Semester 2) ISEM 540: Architecture & Integration of Modern Enterprises (Year 1, Semester 2) ISEM 530: Systems Engineering Principles
Then “Pick 1” from the following list of five (5) courses (3 Semester hours):
<ul style="list-style-type: none"> (Year 1, Semester 3) ISEM 502 / ISEM 534 / ISEM 551 / ISEM 570 / MGMT 511 (also listed below)

ISEM Elective and Concentration Courses (5 Courses = 15 semester hours)	
These courses start Year 1, Semester 3, following completion of all “Mandatory Core” courses	
Course Number and Title	Course Number and Title
<p><u>Current and Emerging Technology Courses</u></p> <ul style="list-style-type: none"> ISEM 502: User-Centered Design ISEM 533: Distributed Databases, Administration and Security Systems ISEM 534: Database Design and Management ISEM 536: IT Infrastructure & Cloud Computing ISEM 550: Cyber Security Management ISEM 551: Web-based Software Engineering ISEM 558: IoTs and Industry 4.0 ISEM 570: IT Quality Assurance ISEM 572: Smart Cities and Strategic Intelligence ISEM 582: Cloud Computing Applications for Business 	<p><u>Management Sciences</u></p> <ul style="list-style-type: none"> ISEM 503: Artificial Intelligence Principles and Applications ISEM 505 AI Systems Engineering ISEM 564: Big Data Emerging Applications ISEM 565: Business Intelligence and Decision Support ISEM 585 Introduction to Modeling, Optimization and Decision Making
<p><u>Blockchain and Cryptocurrency</u></p> <ul style="list-style-type: none"> ISEM 574: Bitcoin Blockchain ISEM 575: Ethereum Blockchain ISEM 576: Cryptocurrency and Regulation ISEM 577: Blockchain Scalability ISEM 578: Decentralized Finance 	<p><u>Digital Health</u></p> <ul style="list-style-type: none"> ISEM 541: Healthcare Systems ISEM 542: Health Informatics and Information Systems ISEM 543: Digital Health ISEM 545: Healthcare Data
<p><u>Enterprise Management</u></p> <ul style="list-style-type: none"> ISEM 528: Industry Analysis & Technology Patterns ISEM 547: Technology Management MGMT 511: Digital and Global Enterprises MGMT 512: Marketing in the Digital Age MGMT 513: Financial and Managerial Accounting 	<p><u>Techpreneurship (ENTP) Courses</u> <i>(available through MS Techpreneurship Program)</i></p> <ul style="list-style-type: none"> ENTP 500 Entrepreneurship and Innovation ENTP 510 Entrepreneurship: From Traction to Scale ENTP 520 Economics of Innovation ENTP 530 Financial Sustainability
ISEM Capstone Sequence (2 Courses = 6 semester hours). Typically taken in semesters 5, 6.	
<ul style="list-style-type: none"> GRAD 695: Research Methods and Writing ISEM / GRAD 699: Applied Project or Research Thesis 	
ISEM PhD Preparatory Course	
<ul style="list-style-type: none"> GRAD 509: Research Methods 	