

## Master of Engineering Management (MEM in ENGMT) Required and Elective Courses

The Master of Engineering Management degree will be awarded upon successful completion of the 33-credit program, and completion of [SARI](#).<sup>\*</sup> The courses are not listed in sequential order. All module course work is subject to change as new courses are developed or renumbered.

**The capstone course, ENGMT 539, will only be available during fall semesters.**

**If you have any questions throughout your studies, please email [EngHelp@psu.edu](mailto:EngHelp@psu.edu).**

<b>18-Credit Required Curriculum</b>			
Course #	Course Titles	Semester	Grade
ENGMT 501	Engineering Management Science		
ENGMT 510	Economics and Financial Studies for Engineers		
SYSEN 805	Technical Project Management ( <i>Formerly SYSEN 505. This course is offered online ONLY.</i> )		
SYSEN 536	Decision & Risk Analysis in Engineering		
SYSEN 850	Creativity & Problem Solving I		
ENGMT 841	Applications of Statistics in Quality and Continuous Improvements in Engineering		
<b>12-Credit Elective Curriculum</b>			
Course #	Course Titles	Semester	Grade
<b>3-Credit Required Capstone</b> (to be taken after completing 27 credits in program) <i>The Capstone Course is only offered in Fall Semesters</i>			
ENGMT 539	Engineering Management Strategy GCAPSTONE-Prof. Masters Capstone Project		
<b>SARI Requirement</b> <b>Scholarship and Research Integrity</b>			
<a href="#">SARI</a>	Scholarship and Research Integrity Program		

**\*NOTE: Students must maintain a minimum grade point average of 3.0 (B) throughout the program. A 3.0 cumulative GPA is required to graduate. All course work toward the Master of Engineering Management degree must be completed within eight years of admission to the program.**

**Questions & Advising - Students should contact their assigned faculty advisors with any questions or for advice on course selection. Students considering taking online classes must get approval from their academic advisor before requesting enrollment through [EngHelp@psu.edu](mailto:EngHelp@psu.edu).**

## Master of Engineering Management (MEM in ENGMT)

Course Descriptions/Prerequisites - Do not check course descriptions from the registration web page. Please check this advising sheet or the course descriptions at this [link](#).

### Program Electives

<b>12-Credit Electives (Choose 4 courses from the following)</b>	
<b>Quality Management Across Product Life Cycle</b>	
DAAN 871	Data Visualization for Analytics
ENGMT 520	Systems Optimization (Formerly SYSEN 530)
STAT 500	Applied Statistics
<b>Quantitative Decision Making for Engineering Managers</b>	
BA 810	Operations Management (Prerequisite: ENGMT 501 <u>and</u> ENGMT 510)
DAAN 881	Data-Driven Decision Making (Prerequisite: STAT 500 <u>or</u> ENGMT 841)
SYSEN 532	Simulation in Systems Engineering: Discrete-Time Systems
<b>Technical Management &amp; Leadership</b>	
BA 800	Marketing Management
BA 810	Operations Management (Prerequisite: ENGMT 501 <u>and</u> ENGMT 510)
BADM 828	Negotiation
MNGMT 511	Organizational Behavior (Offered online only)
STS 589	Ethics and Values in Science and Technology
SYSEN 555	Invention and Creative Design (SYSEN 850 is recommended prior to SYSEN 555, but not required)
<b>Data Analytics for Engineering Managers</b>	
DAAN 871	Data Visualization for Analytics
DAAN 881	Data-Driven Decision Making (Prerequisite: STAT 500 <u>or</u> ENGMT 841)
DAAN 897	Enterprise Analytics Strategies
IE 575	Foundations of Predictive Analytics (Prerequisite: STAT 500 <u>or</u> ENGMT 841)
<b>System Data Analytics</b>	
ENGMT 520	Systems Optimization (Formerly SYSEN 530)
DAAN 881	Data-Driven Decision Making (Prerequisite: STAT 500 <u>or</u> ENGMT 841)
SYSEN 532	Simulation in Systems Engineering: Discrete-Time Systems