School of Engineering Education

→ PURDUE UNIVERSITY

→ LEARNING to Make a DIFFERENCE

MDE Concentration Guideline-Theatre Engineering

Semester 1			Semester 2		
CHM 11500	GENERAL CHEMISTRY	4	ENGR 13200	TRANS IDEAS TO INNOV II	2
ENGR 13100	TRANS IDEAS TO INNOV I	2	GEN ED	GEN ED (Found Outcome OC) ²	3
GEN ED	GEN ED (Found Outcome WC) ¹	3	MA 16600	PL ANLY GEO CALC II	4
MA 16500	PL ANAL GEO CALC I	4	PHYS 17200	MODERN MECHANICS	4
			SCI SEL	FYE SCIENCE SELECTIVE	3
	Total	13		Total	16
Semester 3			Semester 4		
IDE 30100	PROF PREP IN IDE SEMINAR	1	ECE 20001	ELEC ENGR FUND I	3
MA 26100	MULTIVARIATE CALCULUS	4	ECE 20007	ELEC ENGR FUND I LAB6	1
ME 20000	THERMODYNAMICS ³	3	MA 26200	LIN ALG AND DIF EQU ⁷	4
ME 27000	BASIC MECHANICS I ⁴	3	ME 27400	BASIC MECHANICS II ⁸	3
PHYS 24100	ELECTRICITY & OPTICS ⁵	3	THTR 36800	THEATRE PRODUCTION II	2
THTR 15001	INTRO TO DRAFTING	1	THTR 55000	ADV SCENERY TECH9	3
THTR 15002	INTRO TO SCNRY CONST TOOLS & TECH	1			
THTR 15003	INTRO TO RIGGING FOR THTR	1			
	Total	17		Total	16
Semester 5			Semester 6		
CE 34000	HYDRAULICS ¹⁰	3	ENGR ELECTIVE	ENGINEERING ELECTIVE ¹²	3
CE 34300	HYDRAULICS LAB ⁶	1	ENGR SLECTIVE	ENGINEERING SELECTIVE (design) ¹⁴	3
CM 16400	GRAPHICS FOR CE&CONST ¹¹	2	IDE 36000	MDE STATISTICS ¹⁵	3
ENGR ELECTIVE	ENGINEERING ELECTIVE ¹²	3	THTR 20100	THTR APPRN (Found Outcome H) ¹⁶	3
NUCL 27300	MECHANICS OF MATERIALS ¹³	3	THTR 59700	PRODUCTION&DESIGN SEM ^{17,18}	3
THTR 55000	ADV SCENERY TECH ⁹	3	THTR 36800	THEATRE PRODUCTION II	1
	Total	15		Total	16
Semester 7			Semester 8		
ENGR ELECTIVE	ENGINEERING ELECTIVE ¹²	3	ENGR ELECTIVE	ENGINEERING ELECTIVE ¹²	3
GEN ED	GEN ED (Found Outcome STS) ¹⁹	3	GEN ED	GEN ED (Found Outcome BSS) ²¹	3
GEN ED	GEN ED ¹⁸	3	GEN ED	GEN ED (300 level or non intro) ¹⁸	3
IDE 48300	MDE ENGR ANALYSIS/DECISION ²⁰	1	IDE 48500	MDE ENGR DESIGN PROJ ²²	3
IDE 48400	MDE DESIGN METHODOLOGY ²²	1			
IDE 48700	MDE SENIOR DEVELOPMENT	1			
THTR 59700	PROD & DESIGN SEM ^{17,21}	3			
	Total	15		Total	12

¹Written Communication University foundational outcome. Courses can be found at: http://www.purdue.edu/provost/students/s-initiatives/curriculum/courses.html

²Oral Communication University foundational outcome. Courses can be found at: http://www.purdue.edu/provost/students/s-initiatives/curriculum/courses.html

³other options include ABE 20100, 21000, CE 21101, CHE 21100, MSE 26000

⁴other options include CE 29700, AAE 20300

⁵ sophomore science selective. Other options include PHYS 27200 or BIOL 11000, 20300, 22100, 23000 23100 or CHM 11600, 25500, 25700, 26100, 32100 or EAPS 10400, 10500, 10900, 11100, 11200, 11300, 11600, 11700, 12000, 13800, 17100 (May not be the same course used as FYE Science Selective.)

⁶hands on (not computer) engineering lab; other options include 1 credit engineering lab class (AAE 20401, AAE 33301, CE 34300, ME 30801 etc.); 1 credit from a 2 credit engineering lab class (BME 306, NUCL 205, etc.); 1 credit from a 3 credit engineering class that includes a lab (ABE 30500, IE 38600, MSE 23500, etc.); 1 credit from a 4 credit engineering class that includes a lab (CE 20300, CHE 37700, ECE 27000 etc.). Consult academic academic advisor for list of engineering lab courses.

⁷other option MA 26500 + MA 26600

⁸other option CE 29800

⁹Student will enroll twice. Topics vary by semester and include Control Systems for Scenery Automation, Show Networks and Integration, Project Planning for the Stage, Advanced/Arena Rigging, Statics and Structures for the Stage, and Mechanical Design for the Stage.

¹⁰other options include AAE 33300, ME 30800, CHE 37700

¹¹other options include MFET 16300; THTR 25400, 55400.

¹²Engineering electives are chosen based on a student's educational objective. Consult academic advisor.

¹³other "materials course" options include MSE 23000, AAE 20400, ABE 30500, CHE 33000, ME 32300 (CODO's from ME only)

¹⁴ option must be approved, consult academic advisor. Some examples are: ABE 33000, ABE 43500, AAE 25100, CE 31100, CE 45600, CE 47000, ECE 27000, EPCS 30000+ level, IDE 38500, IE 38600, ME 26300(CODO's from ME only), ME 35400, ME 41300, ME 44400

¹⁵other options include IE 23000, IE 33000

¹⁶Humanities University foundational outcome. Courses can be found at: http://www.purdue.edu/provost/students/s-initiatives/curriculum/courses.html THTR 201 is used to satisfy the humanities outcome for this plan of study.

¹⁷Three occurrences of THTR 59700 will be taken. The first two occurrences are exposure and practicum based, and the 3rd occurrence is the culminating capstone structured experience, as an individual project

with high-level engineering focused deliverables as an outcome. This first occurrence counts as a general education elective 300+ level. The second occurrence counts as an Area Class. The third occurrence counts as the engineering capstone design course.

¹⁸General education courses can be taken from the College of Liberal Arts, the Krannert School of Management, and/or the Honors College provided such courses are not focused primarily on engineering, technology, the natural sciences, or mathematics. Consult academic advisor for acceptable general education courses.

¹⁹Science Technology and Society University foundational outcome. Courses can be found at: http://www.purdue.edu/provost/students/s-initiatives/curriculum/courses.html If EPCS is used to satisfy this outcome, 3 credits of EPCS must be taken, and an additional general education elective is required.

²⁰other option IE 34300

²¹Behavioral/Social Sciences University foundational outcome. Courses can be found at: http://www.purdue.edu/provost/students/s-initiatives/curriculum/courses.html

²²other capstone design option instead of IDE 48400 + IDE 48500 is EPCS 41200 + EPCS 41200, or IDE 48400 + THTR 59700 (See footnote 18). Consult academic advisor.

Additional Requirements:

A course listed on the Concentration Guideline *is not a guarantee that the course will be accessible/made available to a student*. Lack of availability could be due to any number of circumstances beyond the control of either student or program.

Engineering credits: A minimum 45 credits at 200+ level, of which at least 18 credits are at 300+ level and 6 credits of the 18 must be at 400+ level. Maximum number of credits in any engineering discipline is 24. It is the student's responsibility to see that all prerequisites are met for selected courses.

30 credits must be Math and Basic Science (MA, BIOL, CHM, PHYS, EAPS, SLHS are some examples)

32 credits at 300+ level (any courses) must be taken at Purdue West Lafayette.

3 credits of "hands-on" (not computer lab) required. 2 credits must be engineering (See footnote 4). The third credit may be engineering on non-engineering. A non-engineering lab credit would be included in an AREA class. Some examples are BIOL, CHM, or PHYS lab classes **or** THTR and AD classes that include a studio component. Consult academic advisor for details.