

# Bachelor of Science – Engineering Innovation and Leadership

## Degree Plan-Engineering Innovation Concentration (checklist)

2021

Catalog: 2020-2021  
Expires: 08/01/2027

Last Name \_\_\_\_\_

First Name \_\_\_\_\_ M.I. \_\_\_\_\_

UTEP ID \_\_\_\_\_

**NOTE: Overall GPA ≥ 2.0 AND In-Major GPA ≥ 2.0 REQUIRED for graduation**

A Core Curriculum (45 SCH) (minimum of "C" grade required)		Semester Completed	Final Grade	SCH	Sub #
<b>1 Communication (6 credit hours required)</b>					
RWS 1301*	Rhetoric and Composition I				
RWS 1302*	Rhetoric and Composition II				
<b>2 Mathematics (4)</b>					
MATH 1411*	Calculus I				
<b>3 Life and Physical Sciences (8)</b>					
PHYS 2420*	Introductory Mechanics				
PHYS 2421*	Fields and Waves				
<b>4 Language, Philosophy, and Culture (3)</b>					
PHIL 2306*	Ethics				
<b>5 Creative Arts (3)</b> Select and circle one:					
ART 1300*, ARTH 1305*, 1306*, DANC 1304*, FILM 1390*, MUSL 1321*, 1324*, 1327*, THEA 1313*					
<b>6 American History (6)</b>					
HIST 1301*	History of the U.S. to 1865				
HIST 1302*	History of the U.S. since 1865				
<b>7 Government/Political Science (6) -- all 6 SCH must be completed at the same institution</b>					
POLS 2310*	Introduction to Politics				
POLS 2311*	American Govt. & Politics				
<b>8 Social and Behavioral Sciences (3)</b>					
CE 2326*	Econ. For Engrs & Scientists				
<b>9 Component Area Option (6)</b>					
UNIV 1301*	Foundations of Engineering				
CS 1320 <sup>a</sup>	Computer Programming Sci. / Engr.				

B Foundational Math & Science (15 SCH)		Semester Completed	Final Grade	SCH	Sub #
CHEM 1305*	General Chemistry				
MATH 1312*	Calculus II				
MATH 2313*	Calculus III				
MATH 2326*	Differential Equations				
MATH 3323*	Matrix Algebra				

SUBSTITUTIONS**				
Sub #	Course on degree plan to substitute	Institution where course was taken	Name of Course as it appears on UTEP Transcript	Course as it appears on UTEP Transcript
ex	EL 1302	Other		ENGR 13TR
1				
2				
3				
4				

C Engineering Leadership Coursework (28 SCH)		Semester Completed	Final Grade	SCH	Sub #
EL 1405*	Fundamentals of Eng. Leadership and Graphics				
EL 1302*	Intro to Eng. Design & Leadership				
EL 3003*	Professional Practice I				
EL 3005*	Professional Practice II				
EL 2301*	Modeling and Simulation				
EL 3302*	Engineering Measurements				
EL 3332*	Engineering Entrepreneurship: Products to People				
EL 3331*	Engineering Design: People to Products				
EL 3373*	Engineering Probability & Stat. Models				
EL 4395*	Capstone Design I: Definition & Exploration				
EL 4396*	Capstone Design II: Development & Evaluation				
D Engineering Innovation Concentration Required Courses (16 SCH)		Semester Completed	Final Grade	SCH	Sub #
MME 2303	Intro to Materials Sci & Engrg				
MME 2434	Mechanics of Materials				
CE 2377	Electro Mechanic Systems				
CE 2338	Mechanics II (Dynamics)				
MECH 2311	Intro to Thermo Fluid Science				

E Major: Emphasis Courses (12 SCH)		Semester Completed	Final Grade	SCH	Sub #
<b>See advisor for list of emphasis &amp; approved courses within emphasis.</b>					

F Upper Division Engineering Technical Elective (9 SCH)		Semester Completed	Final Grade	SCH	Sub #
see advisor for approved courses					

**BSEL Total Hours 125**

**NOTES:**

a--COMM 1302 is required for CS Concentration

\* -- C or better required

\*\* -- requires submission of official substitution form available at

<https://www.utep.edu/engineering/student-resources/student-resources-forms.html>

APPROVALS:	
ADVISOR	DATE
CHAIR	DATE