Major/Program	Mathematics (Engineering)			
College	Science and Mathematics			
Department	Mathematics and Computing			
Contact	Dr. Jennifer Yates, Interim Dean			

Lander University 4-Year Major Guide

Even Year Fall Entry

**Yearly Totals** 

2023-2024

First Year

Second Year

Third Year

Summer

MATH 241

MATH 311

**PHYS 211** 

Course

First Semester		Second Semester			TOTALS		
Course	Notes	Hours	Course	Notes	Hours	_	
CHEM 111		4	CIS 130		4		
ENGL 101	Core Academic Skills (General Education)	3	ENGL 102	Core Academic Skills (General Education)	3		
HIST 101, HIST 102, HIST 113, ANTH 101, PSYC 101	Behavioral and Social Perspectives (General Education)	3	MATH 134		3		
MATH 141	Core Academic Skills (General Education)	4	MATH 142	Scientific and Mathematical Reasoning (General Education)	4		
LINK 101	Leadership, Involvement, Networking and Knowledge (General Education)	1	SOC1 101,SOCI 202,POLS 103,ECON 201,ECON 202	Behavioral and Social Perspectives (General Education)	3		
							Yearly Totals
	Subtotal	15		Subtotal	17	→-	32
Firs	t Semester		Secon	d Semester			
Course	Notes	Hours	Course	Notes	Hours		
CIS 202		3	<b>Elective OR Math Elective</b>		3		
Math Elective or World Cultures	World Cultures	3	ENGL 201, 202, 204, 205, ENGL 221, 241, or 251	Humanities and Fine Arts (General Education) {Clemson Literature Rqmnt]	3		

MATH 242

**PHYS 212** 

3

**First Semester** 

Scientific and Mathematical Reasoning (General Education)

Subtotal

Oour sc	Hotes	Hours
Elective OR Math Elective		4
HUMA 285, 330,THTR 201, MUSI 101, 333, 377, 378, or PHIL 102, 103	Humanities and Fine Arts (General Education) {Clemson Non Literature Rqmnt]	3
MATH 308		3
MATH 431 or MATH 421		3
Math Elective OR Elective		3
	Subtotal	16

Second Semester
-----------------

Secor	nd Semester			
Course	Notes	Hours		
CHEM 112, GEOL 111, or BIOL 101	as required by engineering field	4	•	
HIST 111R, HIST 112R, or POLS 101R	Founding Documents (General Education)	3		
Math Elective or Elective		3		
Math Elective OR World Cultures	World Cultures	3		
MATH 499		1		
*FALS 101	Univeristy Requirement	0	_	Yearly Totals
	Subtotal	14	-	30
Total H	ours Required From L	ander:		93
Course	Notes	Hours		
Clemson Course	Clemson encourages students to take one course at Clemson in the summer prior to entering the engineering program.	3		
	Subtotal	3		3
Course	Notes	Hours		
Transferred fr	om Clemson	24		
				Yearly Totals
	Subtotal	24		24
	Subtotal	24		

Subtotal

Civil Engineering requires GEOL 111. Electrical requires CHEM 112. Environmental requires CHEM 112, GEOL 111, and BIOL 101. Industrial may use any one of the three to complete lab science requirements at Clemson.

Students in Mechanical Engineering strongly encouraged to take MATH 300:Numerical Analysis. Students in Electrical Engineering strongly encouraged to take MATH 325 Discrete Mathematics and either MATH 431 Analysis I (even fall) or MATH 432 Complex Analysis (odd spring)

CIS 230 is required in the Electrical Engineering program.

CIS 231 (every fall) is recommended for Computer Engineering

SPCH 101 is strongly encouraged for Civil, Electrical and Industrial Engineering programs as it fulfills Clemson's Oral Communication requirement.

 $WRIT\ 450\ Technical\ Writing\ will\ fulfill\ a\ Clemson\ requirement\ for\ Civil,\ Computer,\ Electrical,\ and\ Mechanical\ engineering\ programs.$ 

<sup>\*</sup> FALS Requirement Temporarily Suspended