

# GENERAL ENGINEERING - ASSOCIATE OF SCIENCE

**(60 credits)**

## A Suggested Plan of Study

The contents of this roadmap may vary depending on initial student placement in mathematics and English. This is only a suggested plan of study for students, and is not intended as a contract. Individual student academic plans may vary. Please contact your academic advisor to create a plan that works for you. Course availability may vary from fall to spring semester and may be subject to modification or change.

NOTE: Students must earn a final grade of C- or better in all required Technical Requirements and achieve a cumulative grade-point average of at least 2.0. A grade of C- or better is required in ENGL 1110G Composition I and designated Mathematics courses.

Students must complete all University degree requirements, which include: General Education requirements and elective credits to total at least 60 credits. Developmental coursework will not count towards the degree requirements and/or elective credits, but may be needed in order to take the necessary English and Mathematics coursework.

Semester 1		Credits
Area I: Communications - English Composition Level I		4
ENGL 1110G	Composition I	
Area II: Mathematics		4
MATH 1511G	Calculus and Analytic Geometry I	
Area III: Laboratory Sciences - Choose one from the following (total of 16 credits from different prefixes/areas):		4
CHEM 1215G	General Chemistry I Lecture and Laboratory for STEM Majors	
CHEM 1225G	General Chemistry II Lecture and Laboratory for STEM Majors	
GEOL 1110G	Physical Geology	
PHYS 1310G & PHYS 1310L	Calculus -Based Physics I and Calculus -Based Physics I Lab	
PHYS 1320G & PHYS 1320L	Calculus -Based Physics II and Calculus -Based Physics II Lab	
Or other approved Area III NM General Education course in the NMSU/DACC Catalog.		
ENGR 100G	Introduction to Engineering	3
<b>Credits</b>		<b>15</b>

Semester 2		Credits
Area III: Laboratory Sciences - Choose one from the following (total of 16 credits from different prefixes/areas):		4
CHEM 1215G	General Chemistry I Lecture and Laboratory for STEM Majors	
CHEM 1225G	General Chemistry II Lecture and Laboratory for STEM Majors	
GEOL 1110G	Physical Geology	
PHYS 1310G & PHYS 1310L	Calculus -Based Physics I and Calculus -Based Physics I Lab	
PHYS 1320G & PHYS 1320L	Calculus -Based Physics II and Calculus -Based Physics II Lab	
Or other approved Area III NM General Education course in the NMSU/DACC Catalog.		
Area IV: Social/Behavioral Sciences		3
ECON 2110G	Macroeconomic Principles	

General Education Elective - Area II: Mathematics		4
MATH 1521G	Calculus and Analytic Geometry II	
ENGR 110	Introduction to Engineering Design	3
<b>Credits</b>		<b>14</b>

Semester 3		Credits
Area I: Communications - English Composition Level 2		3
ENGL 2210G	Professional and Technical Communication Honors	
Area I: Communications - Oral Communications		3
COMM 1115G or COMM 1130G	Introduction to Communication or Public Speaking	
Area III: Laboratory Sciences - Choose one from the following (total of 16 credits from different prefixes/areas):		4
CHEM 1215G	General Chemistry I Lecture and Laboratory for STEM Majors	
CHEM 1225G	General Chemistry II Lecture and Laboratory for STEM Majors	
GEOL 1110G	Physical Geology	
PHYS 1310G & PHYS 1310L	Calculus -Based Physics I and Calculus -Based Physics I Lab	
PHYS 1320G & PHYS 1320L	Calculus -Based Physics II and Calculus -Based Physics II Lab	
Or other approved Area III NM General Education course in the NMSU/DACC Catalog.		
Engineering and Related Course - Choose one from the following:		3
C E 151	Introduction to Civil Engineering	
C E 233	Mechanics-Statics	
CHME 201	Energy Balances & Basic Thermodynamics	
MATH 2530G	Calculus III	
Or any ENGR course		
Approved Elective		3
<b>Credits</b>		<b>16</b>

Semester 4		Credits
Area III: Laboratory Sciences - Choose one from the following (total of 16 credits from different prefixes/areas):		4
CHEM 1215G	General Chemistry I Lecture and Laboratory for STEM Majors	
CHEM 1225G	General Chemistry II Lecture and Laboratory for STEM Majors	
GEOL 1110G	Physical Geology	
PHYS 1310G & PHYS 1310L	Calculus -Based Physics I and Calculus -Based Physics I Lab	
PHYS 1320G & PHYS 1320L	Calculus -Based Physics II and Calculus -Based Physics II Lab	
Or other approved Area III NM General Education course in the NMSU/DACC Catalog.		
Area V: Humanities <sup>1</sup>		3
Area VI: Creative and Fine Arts <sup>1</sup>		3
Engineering and Related Course - Choose one from the following:		3
C E 151	Introduction to Civil Engineering	
C E 233	Mechanics-Statics	
CHME 201	Energy Balances & Basic Thermodynamics	
MATH 2530G	Calculus III	
Or any ENGR course		
Approved Elective		2
<b>Credits</b>		<b>15</b>
<b>Total Credits</b>		<b>60</b>

<sup>1</sup> See the General Education (<https://catalogs.nmsu.edu/dona-ana/general-education-and-transfer-options/transfer-new-mexico-institutions/>) section of the catalog for a full list of courses