Mechanical Engineering Associate of Science | Degree Map

	Course	Category	Credits	Session
SEMESTER 1	ECF100 First Year Seminar for Engineering & Computer Science	PC	2	I
	ENG101 English Composition I	RC	3	I
	MAT201 Calculus I (see Math note on back)	RC	4	I
	SCC201 General Chemistry I	PC	4	I
	MAC108 Introduction to Python	PC	3	II
	HUP104 Ethics & Moral Issues (recommended – see back)	FC	3	II

	Course	Category	Credits	Session
SEMESTER 2	ENG259 Technical Writing	RC	3	I
	MAT202 Calculus II (Scientific World: pre-req for MAT203)	FC	4	I
	MAE101 Engineering Lab I	PC	1	I
	SCP231 General Physics I (Life and Physical Sciences: pre-req for SCP232)	RC	4	I
	MAT203 Calculus III	PC	4	II

	Course	Category	Credits	Session
SEMESTER 3	SCP232 General Physics II (Scientific World)	FC	4	I
	SCC202 General Chemistry II	PC	4	I
	HUM101 Intro to Music or HUA101 Intro to Art (recommended)	FC	3	I
	SSA101 Cultural Anthropology (recommended)	FC	3	I
	MAT204 Elementary Differential Equations	PC	4	II

	Course	Category	Credits	Session
SEMESTER 4	MAE219 Thermodynamics (Capstone)	PC	3	I
	MAE211 Engineering Mechanics: Statics	PC	3	I
	MAE213 Electrical Circuits	PC	3	I
	MAT212 Linear Algebra & Vector Analysis	PC	3	I
	SSN187 Urban Sociology (Urban Study) (recommended)	FC	3	I
	Register for GRDOOO "Intent to Graduate" in CUNYfirst to apply for graduation in your final semester **Students must take at least one Urban Study course**			

LaGuardia Community College

Credits Required to Graduate	
Category	
Pathways Required Core (RC)	14
Pathways Flexible Core (FC)	20
Program Core (PC)	34
Total	68

More information at laguardia.edu/engineeringscience

Effective Fall 2025-Spring 2026 catalog. Updated: 1/6/2025

Follow the map for the catalog year in which you first enrolled.
Check Degree Audit & speak to an advisor for more support.

City College Dual Enrollment

Engineering is a "dual enrollment" program. Once students complete their studies at LaGuardia, they will have the opportunity to transition to City College as third year students in pursuit of a bachelor's degree.

Pathways Requirements & Transfer

PATHWAYS REQUIRED CORE (RC) Pathways is CUNY's general education framework. For Required Core, students must take 2 English courses, 1 Mathematics and Quantitative Reasoning course, and 1 Life and Physical Sciences course. For more details visit the Pathways Required Core website.

MATHEMATICS AND QUANTITATIVE REASONING MAT201 Calculus I is the required course but students may need to first take MAT115/117 Algebra & Trigonemetry and/or MAT200 Precalculus.

PATHWAYS FLEXIBLE CORE is CUNY's general education framework that allows students to choose courses based on interests, transfer or career plans, or for general exploration. Associate of Science students must take one course from each category listed below, plus an additional course from any category. View DegreeWorks or our Pathways website to see a full range of options, or talk with the program director or an advisor. Note: your program has specific requirements & recommendations listed below. The recommendations facilitate transfer to City College or other 4-year engineering programs.

- Creative Expression: **HUM101 Intro to Music** or **HUA101 Intro to Art**
- Individual & Society: **HUP104 Ethics & Moral Issues**
- Scientific World: **MAT202 Calculus II required**
- U.S. Experience in its Diversity: **SSN187 Urban Sociology**
- World Cultures and Global Issues: **SSA101 Cultural Anthropology**
- Additional (Scientific World): **SCP232 General Physics II required**

TRANSFER AGREEMENTS The Engineering program has an agreement with the following 4-year college. By graduating from LaGuardia and meeting certain requirements, you will be able to complete your studies at a 4-year college and earn a bachelor's degree. For more information, visit our Transfer Agreement (Articulation) web page. You may also speak to an advisor or Transfer Services for more support on transfer.

1. City College – Bachelor's of Engineering (dual enrollment program)