

FALL

SPRING

SUMMER

FRESHMAN (2018)

+ MAT 131	Calculus I	5
+ PHY 221	Physics I	5
+ CHM 111	Chemistry I	4
IDS 101	Creativity & Innovation	2
IDS 103	Terra Firma I	1
		17

FRESHMAN (2019)

+ MAT 132	Calculus II	5
+ PHY 222	Physics II	5
+ EGR 106	Intro to Eng Design I (GV)	3
IDS 104	Terra Firma II	1
J REL 104	Old Testament	3
		17

2019

o COM 112	Communication in Culture	3
o ENG 212	Writing in Culture	3
		6

SOPHOMORE (2019)

+ MAT 234	Multivariate Calculus	3
+ EGR 107	Intro to Eng Design II (GV)	3
+ EGR 209	Mechanics (GV)	4
+ EGR 220	Data Analysis	1
+ MAT 251	Probability & Stats	3
IDS 202	Creativity in Conceptual Age	4
		18

SOPHOMORE (2020)

+ MAT 2XX	Diff Eq & Linear Algebra	3
+ EGR 250	Materials (GV)	4
+ EGR 214	Circuit Analysis	4
+ EGR 309	Machine Design I (GV)	4
J REL 204	New Testament	3
		18

2020

EGR 380	Engineering Internship I	3
		3

JUNIOR (2020)

EGR 345	System Modeling (GV)	4
EGR 367	Manufacturing Process (GV)	4
EGR 301	Product Design (GV)	4
IDS 312	Human Innovation	3
MDA 112	Design Drawing	3
		18

JUNIOR (2021)

EGR 226	Digital Systems	4
EGR 360	Thermodynamics (GV)	4
IDS 205	Thought & Design I	3
PHI 211	Philosophy in Culture	3
KIN 1XX	Activity Course	1
		15

2021

EGR 380	Engineering Internship II	3
		3

SENIOR (2021)

EGR 485	Capstone Project & Ethics	1
EGR 336	Project Management	3
IDS 313	Thought & Design II	3
HUM 311	Imagination in Culture	3
KIN 100	Fitness & Wellness	2
		12

SENIOR (2022)

EGR 486	Capstone Project II	2
IDS 413	Thought & Design III	3
J REL 352	Christian Beliefs & History	3
HIS 114	World Civ II	3
	Social Science Course	3
		14

TOTAL CREDITS

141

GV Course taken at GVSU

+ Engineering Foundations Track (Course required prior to secondary admission into Engineering Degree Program)

J Class taken during J-Term

o Class taken online

ENGINEERING CORE COURSES	# HOURS	ENGINEERING MAJOR COURSES	# HOURS
CHM 111 Chemistry I	4	EGR 301 Analytical Tools for Product Design (GV)	4
EGR 106 Intro to Engineering Design I (GV)	3	EGR 336 Project Management	3
EGR 107 Intro to Engineering Design II (GV)	3	EGR 367 Manufacturing Processes (GV)	4
EGR 209 Mechanics and Machines (GV)	4	IDS 101 Creativity, Innovation, and Problem Solving	2
EGR 214 Circuit Analysis I	4	IDS 202 Creativity in the Conceptual Age	4
EGR 220 Measurement & Data Analysis	1	IDS 205 Strategies for Innovative Thought & Design I	3
EGR 226 Intro to Digital Systems	4	IDS 312 Science of Human Innovation	3
EGR 250 Material Science and Engineering (GV)	4	IDS 313 Strategies for Innovative Thought & Design II	3
EGR 309 Machine Design I (GV)	4	IDS 413 Strategies for Innovative Thought & Design III	3
EGR 345 Dynamics Systems & Modeling (GV)	4	MDA 112 Design Drawing I	3
		TOTAL ENGINEERING MAJOR	32
<u>Choose 1 of the following 2 courses</u>			
EGR 360 Thermodynamics (GV)	4	CU FOUNDATIONS COURSES	
EGR 362 Thermal & Fluid Systems (GV)	4	COM 112 Communication in Culture	3
EGR 380 Internship I	3	ENG 212 Writing in Culture	3
EGR 380 Internship II	3	HIS 114 World Civilization II	3
EGR 485 Capstone Project & Ethics	1	HUM 311 Imagination in Culture	3
EGR 486 Capstone Project II	2	* IDS 101 Creativity, Innovation, & Problem Solving	0
MAT 131 Calculus I	5	IDS 103 CU Foundations I	1
MAT 132 Calculus II	5	IDS 104 CU Foundations II	1
MAT 234 Multivariate Calculus	3	KIN 100 Total Fitness & Wellness	2
MAT 2XX Diff Eq. and Linear Algebra	3	KIN 1XX Activity Course	1
MAT 251 Probability & Stats	3	PHI 211 Philosophy in Culture	3
PHY 221 Physics I	5	REL 104 Old Testament Literature	3
PHY 222 Physics II	5	REL 204 New Testament Literature	3
		REL 352 Christian Beliefs & History	3
TOTAL ENGINEERING CORE	77	Social Science Course (e.g., ECN-232)	3
		Global Studies Requirement (see CU Catalog)	0-3
TOTAL CORE + MAJOR	109	TOTAL CU FOUNDATIONS	32
+ CU FOUNDATIONS	32		
TOTAL CREDITS	141		

For a complete list of courses that satisfy CU Foundations requirements, refer to 2018/19 CU Course Catalog

* Note: IDS 101 concurrently satisfies 2 credits of CU Foundations (for Social Science course) **and** 2 credits of Design & Innovation Engineering major