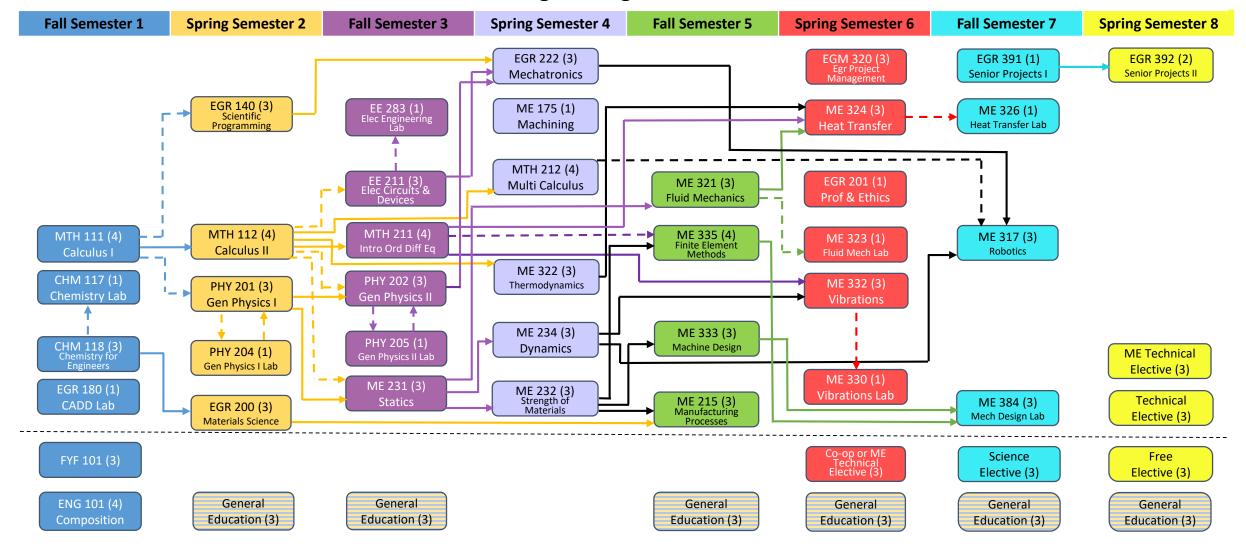
## Wilkes University

## **Mechanical Engineering Curriculum Flowchart**



Some pre-requisite lines shown may be listed as concurrent or as co-requisite in the Bulletin. Please be sure to confirm with your advisor and the latest Bulletin.

The requisites of a course's requisite are requisites of the course. Solid lines indicate prerequisite and dashed lines corequisites.

Credit hours are listed in parentheses following each course number.

CHART IS FOR ILLUSTRATION PURPOSES ONLY: SEE UNDERGRADUATE BULLETIN FOR PRE-REQUISITES/CONCURRENT REQUIREMENTS.

## Wilkes University

				g Curriculum	T
	First Semester	Credits		Second Semester	Credits
EGR 180	CADD Lab	1	EGR 140	Scientific Programming	3
CHM 118	, ,	3	EGR 200	Materials Science	3
CHM 117	Chemistry Lab for Engineers	1	MTH 112	Calculus II	4
MTH 111	Calculus I	4	PHY 201	General Physics I	3
ENG 101	Composition	4	PHY 204	General Physics I Lab	1
FYF 101	First-Year Foundations	3		General Education	3
	Total (	Credits 16		Total	Credits 17
					1
	Third Semester	Credits		Fourth Semester	Credits
MTH 211	Differential Equations	4	EGR 222	Mechatronics	3
PHY 202	General Physics II	3	ME 232	Strength of Materials	3
PHY 205	General Physics II Lab	1	ME 234	Dynamics	3
EE 211	Electrical Circuits and Devices	3	ME 322	Thermodynamics	3
EE 283	Electrical Engineering Lab	1	MTH 212	Multivariable Calculus	4
ME 231	Statics	3	ME 175	Machining	1
	General Education	3		Total	Credits 17
	Total	Credits 18			
	Fifth Semester	Credits	_	Sixth Semester	Credits
ME 321	Fluid Mechanics	3	-	Co-op or ME Technical Elective*	3
ME 333	Machine Design	3	EGR 201	Professionalism and Ethics	1
	Manufacturing Processes	3	EGM 320	Engineering Project Management	3
	Manufacturing Frocesses	J 3		Linginizering i roject Management	_
ME 215	_	1	NAE 222	Vibrations	2
ME 335	Finite Element Methods	4	ME 332	Vibrations Laboratory	3
	Finite Element Methods General Education	3	ME 330	Vibrations Laboratory	1
	Finite Element Methods General Education		ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab	1 1
	Finite Element Methods General Education	3	ME 330	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer	1 1 3
	Finite Element Methods General Education	3	ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education	1 1 3 3
	Finite Element Methods General Education	3	ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education	1 1 3
	Finite Element Methods General Education	3	ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education	1 1 3 3
	Finite Element Methods  General Education  Total (	3 Credits 16	ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education Total	1 1 3 3 Credits 18
ME 335	Finite Element Methods General Education  Total (	3 Credits 16 Credits	ME 330 ME 323	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education Total  Eighth Semester	1 1 3 3 Credits 18 Credits
ME 335	Finite Element Methods General Education  Total (  Seventh Semester  Robotics	3 Credits 16 Credits	ME 330 ME 323 ME 324	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education  Total  Eighth Semester  ME Technical Elective*	1 1 3 3 Credits 18 Credits 3
ME 335	Finite Element Methods General Education  Total (  Seventh Semester  Robotics  Science Elective**	Credits 16  Credits 3 3	ME 330 ME 323 ME 324	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education  Total  Eighth Semester  ME Technical Elective* Senior Projects II	1 1 3 3 3 Credits 18 Credits 2 2
ME 335  ME 317  ME 326	Seventh Semester Robotics Science Elective** Heat Transfer Laboratory	Credits 16  Credits 3 3 1	ME 330 ME 323 ME 324	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education  Total  Eighth Semester  ME Technical Elective* Senior Projects II Technical Elective***	1 1 3 3 Credits 18 Credits 3 2 3
ME 317 ME 326 ME 384	Seventh Semester Robotics Science Elective** Heat Transfer Laboratory Mechanical Design Laboratory	Credits 16  Credits 3 3 1 3	ME 330 ME 323 ME 324	Vibrations Laboratory Fluid Mechanics Lab Heat Transfer General Education  Total  Eighth Semester  ME Technical Elective* Senior Projects II Technical Elective*** Free Elective***	1 1 3 3 3 Credits 18 Credits 3 2 3 3 3

<sup>\*</sup>ME Technical Elective at 200 level or above. \*\*Science elective from approved list. \*\*\*Math/Science/Engineering elective at 200 level or above.

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<sup>\*\*\*\*</sup>Free elective any course 101 level or above. This chart is for illustration purposes only. See Undergraduate Bulletin for specific requirements.