

Bharath Institute of Higher Education and Research, Chennai

Curriculum Chart – B.Tech. –Mechanical Engineering – CBCS System

		L-Lecture Hrs/Week				T – Tutorial Hours / Week				C- Credits				P – Practical Hours/Week																																																																																			
Category	Category wise % of Credits	Year - I																Year - II																Year - III																Year - IV																																															
		Semester - 1								Semester - 2								Semester-3								Semester - 4								Semester - 5								Semester-6								Semester-7								Semester-8																																							
		Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C	Course Code	Course Title	L	T	P	C																																										
Art & Humanities-H	9.64%	BEN101	English-I	3	1	0	3	BEN 201	English-II	3	1	0	3							BCE406	Environmental Studies	3	0	0	3							BSS601	Value Education and Professional Ethics	3	0	0	3																																																												
		BBA101	Personality Development	1	1	0	2		Foreign/Indian Language	3	0	0	3																																																																																				
		BSS1L4/1L5/1L6	NCC/NSS/NSO				1	BSS2L7	Yoga				1																																																																																				
	19	Total				6	Total					7	Total					4	Total					3	Total					3	Total					3	Total					3	Total					3	Total					3	Total					3	Total					3	Total					3																									
Basic Sciences - B	16.75%	BMA101	Mathematics –I	3	1	0	3	BMA201	Mathematics- II	3	1	0	3	BMA301	Mathematics III	3	2	0	4	BMA401	Numerical Methods	3	2	0	4																			BME702	Operations Research for Engineers	4	0	0	4																																																
		BPH 101	Engineering Physics – I	3	0	0	3	BPH 201	Engineering Physics – II	3	0	0	3																																																																																				
		BCH101	Engineering Chemistry – I	3	0	0	3	BCH201	Engineering Chemistry – II	3	0	0	3																																																																																				
		BBT 102	Biology for Engineers	2	0	0	2	BPC2L1*	Physics and Chemistry Laboratory	0	0	3/3	1																																																																																				
		BPC1L1*	Physics and Chemistry Laboratory	0	0	3	0																																																																																										
33	Total				11	Total					10	Total					4	Total					4	Total					4	Total					4	Total					4	Total					4	Total					4	Total					4																																						
Engineering Science-E	8.63%	BCS101	Fundamentals of Computing and Programming	3	0	0	3	BME202	Engineering Mechanics	3	1	0	3																																																																																				
		BCE101	Basic Civil Engineering	2	0	0	2	BEE201	Basic Electrical and Electronics Engineering	2	0	0	2																																																																																				
		BME101	Engineering Graphics-E	2	3	0	4	BCS2L2	Computer Practices Lab	0	0	3	1																																																																																				
		BCM1L1	Basic Civil and Mechanical Engineering Practices Laboratory	0	0	3	1	BEE2L1	Basic Electrical and Electronics Engineering Practices	0	0	3	1																																																																																				
17	Total				10	Total					7	Total					4	Total					4	Total					4	Total					4	Total					4	Total					4																																																		
Professional Core - P	45.21%							BME301	Kinematics of Machines	4	0	0	4	BME401	Dynamics of Machines	4	0	0	4	BME501	Machine Design I	3	2	0	4	BME601	Machine Design II	4	0	0	4	BME701	Industrial Engineering	3	0	0	3																																																												
								BME302	Thermodynamics	4	0	0	4	BME402	Thermal Engineering I	4	0	0	4	BME502	Thermal Engineering II	3	0	0	3	BME602	Finite element	4	0	0	4	BM7L1	Fluid Power Automation Lab	0	0	3	2																																																												
								BME303	Mechanics of Solids	4	0	0	4	BME403	Industrial Metallurgy	3	0	0	3	BME503	Fluid Power Systems	3	0	0	3	BME603	Heat and Mass Transfer CAD/CAM	4	0	0	4	BME7L1	Computer Aided Analysis and Simulation Lab	0	0	3	2																																																												
								BME304	Fluid Mechanics and Machinery	3	0	0	3	BME404	Engineering Metrology and Instrumentation	3	0	0	3	BME504	Automobile Engineering	3	0	0	3	BME604	Heat Transfer Lab	3	0	0	3																																																																		
								BME305	Manufacturing Technology –I	4	2	0	3	BME4L1	Metrology and Metallurgy Lab	0	0	3	2	BME505	Manufacturing Technology –II	3	0	0	3	BME6L1	CAD/CAM Lab	0	0	3	2																																																																		
								BME3L1	Machine Drawing	2	0	2	3	BME4L2	Manufacturing Technology Lab-I	0	0	3	2	BME5L1	Thermal Engineering Lab	0	0	3	2	BME6L2	Instrumentation and Dynamics lab	0	0	3	2																																																																		
								BCE3L3	Fluid Mechanics, Machinery and Strength of Materials Lab	0	0	3	2							BME5L2	Manufacturing Technology Lab-II	0	0	3	2																																																																								
	89	Total					Total					23	Total					18	Total					22	Total					19	Total					7	Total					7																																																							
Open Electives	3.04%																																																																																																
	6	Total					Total					Total					Total					Total					Total						Total						Total																																																										
Projects/Internships	7.61%													BME4L3	Technical Seminar-I	0	0	2	1	BME5C1	Comprehension-I	0	0	0	1	BME6L3	Technical Seminar -II	0	0	2	1	BME7P1	Term Paper	0	0	4	2	BME8P1	Project work	0	0	18	9	BME8C1	Comprehension-II	0	0	0	1																																																
	15	Total					Total					Total				1	Total				1	Total				1	Total				2	Total					10																																																												
Core Electives	4.56%																																																																																																
	9	Total					Total					Total					Total				3	Total				3	Total				3	Total					3																																																												
Non-Major Electives	4.56%																																																																																																
	9	Total					Total					Total					Total				3	Total				3	Total				3	Total					3																																																												
Total Credits	197					27					24					27						26						26						26						25						16																																																			