Indian Institute of Technology, Palakkad
Curriculum for B Tech Programme

Semester - I

Course No.	Course Name	Credits	Category
PH1010	Physics I	3	BST
CY1010	Chemistry I	3	BST
MA1010	Mathematics I	4	BST
CS1010/1100	Computational Engineering	4	BET
ID1010/1100	Concepts in Engineering Design + Introduction to Branch	2+1	ID
PH1110/1030	Physics Lab	2	BSP
ME1110/1120	Engineering Drawing	3	BEP
ME1120/WS1010	Workshop Practice I	2	BEP
	Total	**24**	

Semester - II

Course No.	Course Name	Credits	Category
PH1015/1020	Physics II	3	BST
CY1015/1020	Chemistry II	3	BST
MA1015/1020	Mathematics II	4	BST
CE1015/AM1100	Engineering Mechanics	4	BET
ME1015/1100	Thermodynamics	3	BET
ID1015/1200	Ecology and Environment	2	ID
GN1015/1100	Life Skills	2	GN
CY1115/1030	Chemistry Lab	2	BSP
ME1125/WS1020	Workshop Practice II	2	BEP
	Total	**25**	

Note: All numbers have been changed from IITM numbers to new numbers IITPalakkad. The faculty can be advised to make syllabus for these courses considering the contents of reference course of IIT Madras with suitable modifications, wherever felt necessary.

Civil Engineering

Course numbers entered in red color are old course numbers

Semester – III

Course No.	Course Name	Credits	Category
BT2010/1010	Life Sciences	2	BST
EE2010/1100	Basic Electrical Engineering	3	BET
CE2010/AM2200	Strength of Materials	4	PMT
CE2020/2230	Civil Engineering Materials and Construction	4	PMT
CE2030/1020	Functional Design of Buildings	2	PMT
CE2110/2050	Building Drawing	2	PMP
HS23xx+	Humanities Elective 1	3	HSE
MA24xx++	Mathematics Elective 1	3	MAE
	Total	23	

+HS1050: Principles of Economics   ++MA2020: Differential Equations

Semester – IV

Course No.	Course Name	Credits	Category
CE2015/2020	Structural Analysis	4	PMT
CE2025/2040	Hydraulic Engineering	4	PMT
CE2035/2060	Geology and Soil Mechanics	4	PMT
CE2045/2080	Surveying	4	PMT
CE2115/2100	Surveying Practical	2	PMP
HS23xx	Humanities Elective 2	3	HSE
MA24xx	Mathematics Elective 2	3	MAE
	Total	**24**	

Semester – V

Course No.	Course Name	Credits	Category
CE3010/3010	Transportation Engineering I	3	PMT
CE3020/3030	Water Resources Engineering	4	PMT
CE3030/3050	Basic R C Design	4	PMT
CE3040/3350	Geotechnical Engineering	4	PMT
CE3110/3410	Construction Materials Lab	2	PMP
GE35xx	General Elective 1	3	GCE
DE36xx	Department Elective 1	3	PME
DE38xx*	Department Elective 2	3	PME*
*for B.Tech Hons	**Total**	**23+3H**	

Semester – VI

Course No.	Course Name	Credits	Category
CE3015	Transportation Engineering II	3	PMT
CE3025	Environmental Engineering.	4	PMT
CE3035	Basic Steel Design	4	PMT
CE3115	Hydraulic and Environmental Engineering. Lab	2	PMP
CE3125	Industrial Training	2	PMP
GE35xx	General Elective 2	3	GCE
DE36xx	Department Elective 3	3	PME
DE38xx*	Department Elective 4	3	PME*
*for B.Tech Hons	**Total**	**21+3H**	

Semester – VII

Course No.	Course Name	Credits	Category
CE4010	Estimation and Construction Management	4	PMT
CE4120	Structural Engineering Lab	2	PMP
CE4100	Project I	3	PMP
GE45xx	General Elective 3	3	GCE
DE46xx	Department Elective 5	3	PME
DE48xx*	Department Elective 6	3	PME*
DE48xx*	Department Elective 7	3	PME*
*for B.Tech Hons	**Total**	**15+6H**	

Semester – VIII

Course No.	Course Name	Credits	Category
CE4105	Project II	7	PMP
HS4010	Professional Ethics	2	HSS
DE46xx	Department Elective 8	3	PME
DE48xx*	Department Elective 9	3	PME*
*for B.Tech Hons	**Total**	**12+3H**	

Computer Science and Engineering

Semester – III

Course No.	Course Name	Credits	Category
BT2010/1010	Life Sciences	2	BST
EE2030/EE1101	Signals and Systems	4	PMT
EE2040/EE2001	Digital Systems	4	PMT
CS2010/CS2100	Discrete Mathematics for Computer Science	3	PMT
CS2110/CS2110	Computer Programming Lab	2	PMP
EE2110/EE2702	Digital Circuits Lab	2	PMP
HS23xx	Humanities Elective 1	3	HSE
MA24xx	Mathematics Elective 1	3	MAE
	Total	**23**	

Semester – IV

Course No.	Course Name	Credits	Category
CS2015/CS2600	Computer Organization	3	PMT
CS2025/CS2800	Data Structures and Algorithms	4	PMT
CS2035/CS2200	Language Machines and Computations	4	PMT
CS2115/CS2610	Computer Organization Laboratory	2	PMP
CS2125/CS2810	Data Structures and Algorithms Lab	2	PMP
HS23xx	Humanities Elective 2	3	HSE
MA24xx	Mathematics Elective 2	3	MAE
	Total	**21**	

Semester – V

Course No.	Course Name	Credits	Category
CS3010/CS3100	Paradigms of Programming	4	PMT
CS3020/CS3300	Language Translators	3	PMT
CS3030/CS3500	Operating Systems	3	PMT
CS3115/CS3310	Language Translators Lab	2	PMP
CS3125/CS3510	Operating Systems Lab	2	PMP
GE35xx	General Elective 1	3	GCE
DE36xx	Department Elective 1	4	PME
DE38xx*	Department Elective 2	4	PME*
*for B.Tech Hons	**Total**	**21+4H**	

Semester – VI

Course No.	Course Name	Credits	Category
CS3015/CS3200	Computer Networks	3	PMT
CS3025/CS3700	Introduction to Database Systems	3	PMT
CS3135/CS3210	Computer Networks Lab	2	PMP
CS3145/**	Database Systems Lab	2	PMP
CS3100/CS3660	Industrial Training	2	PMP
GE35xx	General Elective 2	3	GCE
GE35xx	General Elective 3	3	GCE
DE36xx	Department Elective 3	4	PME
DE38xx/*	Department Elective 4	4	PME*
*for B.Tech Hons	**Total**	**22+4H**	

** Database Systems Lab was not part of IITM 2014 curriculum, and hence does not have an old course number.

Semester – VII

Course No.	Course Name	Credits	Category
CS4010/CS3400	Principles of Software Engineering	3	PMT
CS4110/CS3410	Principles of Software Engineering Lab	2	PMP
CS4100/**	Project I	3	PMP
GE35xx	General Elective 4	3	GCE
DE36xx	Department Elective 5	4	PME
DE36xx	Department Elective 6	4	PME
DE36xx	Department Elective 7	3	PME
DE38xx*	Department Elective 8	3	PME*
*for B.Tech Hons	**Total**	**22+3H**	

Semester – VIII

Course No.	Course Name	Credits	Category
CS4105/CS4800	Project II	7	PMP
HS4010/HS3050	Professional Ethics	2	HSS
DE48xx*	Department Elective 9	4	PME*
*for B.Tech Hons	Total	9+4H	

Electrical Engineering

Semester – III

Course No.	Course Name	Credits	Category
BT2010/1010	Life Sciences	2	BST
EE2020/1001	Electrical and Magnetic Circuits	4	PMT
EE2030/1101	Signals and Systems	4	PMT
EE2040/2001	Digital Systems	4	PMT
EE2110/2702	Digital Circuits Lab	2	PMP
HS23xx	Humanities Elective 1	3	HSE
MA24xx	Mathematics Elective 1	3	MAE
	Total	**22**	

Semester – IV

Course No.	Course Name	Credits	Category
CS2015/2600	Computer Organization	3	PMT
EE2015/2005	Electrical Machines	4	PMT
EE2025/2006	Electromagnetic Fields	4	PMT
EE2035/3002	Analog Circuits Theory	4	PMT
EE2115/2701	Computer Aided Design (CAD) Lab	2	PMP
CS2115/2610	Computer Organization Laboratory	2	PMP
HS23xx	Humanities Elective 2	3	HSE
MA24xx	Mathematics Elective 2	3	MAE
	Total	**25**	

Semester – V

Course No.	Course Name	Credits	Category
EE3010/2004	Digital Signal Processing	4	PMT
EE3020/3001	Solid State Devices	4	PMT
EE3030/3004	Control Engineering	4	PMT
EE3040/3005	Analog and Digital Communication Systems	4	PMT
EE3110/3702	Electrical Machines Lab	2	PMP
EE3120/3703	Analog Circuits Lab	2	PMP
DE38xx*	Department Elective 1	3	PME*
*for B.Tech Hons	**Total**	**20+3H**	

Semester – VI

Course No.	Course Name	Credits	Category
EE3015/3003	Power Systems	4	PMT
EE3015/3006#	Principles of Measurements	2	PMT
EE3115/3006#	Measurements Laboratory	2	PMP
EE3125/xxxx##	Control Systems Laboratory	2	PMP
EE3100/3020	Industrial Training	2	PMP
GE35xx	General Elective 1	3	GCE
DE36xx	Department Elective 2	3	PME
DE36xx	Department Elective 3	4	PME
DE38xx*	Department Elective 4	3	PME*
*for B.Tech Hons	**Total**	**22+3H**	

IITM has a combined Lab + Theory course for Principles of Measurements & Measurements Laboratory
IITM does not have a separate course for Control Systems Lab.

Semester – VII

Course No.	Course Name	Credits	Category
HS4010	Professional Ethics	2	HSS
EE4015/xxxx[#]	DSP + Communication Systems + Power Systems Lab	2	PMP
EE4100/4900[##]	Project I	3	PMP
GE45xx	General Elective 2	3	GCE
GE45xx	General Elective 3	3	GCE
DE46xx	Department Elective 5	3	PME
DE46xx	Department Elective 6	3	PME
DE48xx	Department Elective 7	3	PME*
DE48xx	Department Elective 8	3	PME*
*for B.Tech Hons	**Total**	**19+6H**	

[#] IITM does not have a separate course for this lab.
[##] Project at IITM appears only in Sem 8.

Semester – VIII

Course No.	Course Name	Credits	Category
EE4115/4900[##]	Project II	7	PMP
GE45xx	General Elective 4	3	GCE
DE48xx*	Department Elective 9	3	PME*
*for B.Tech Hons	**Total**	**10+3H**	

[##] Project at IITM appears only in Sem 8.

Mechanical Engineering

Semester – III

Course No.	Course Name	Credits	Category
BT2010/1010	Life Sciences	2	BST
EE2010/1100	Basic Electrical Engineering	3	BET
ME2020	Foundations of Fluid Mechanics	4	PMT
CE2010/AM2200	Strength of Materials	4	PMT
ME2060	Machine Drawing Practice	4	PMP
HS23xx	Humanities Elective 1	3	HSE
MA24xx	Mathematics Elective 1	3	MAE
	Total	23	

Semester – IV

Course No.	Course Name	Credits	Category
ME2015/ 2220	Kinematics and Dynamics Machinery	4	PMT
ME2025	Measurement, Instrumentation and Control	4	PMT
ME2035/2260	Materials and Design	4	PMT
ME2045/2280	Manufacturing Technology	4	PMT
ME2070/2540	Applied Mechanics Laboratory	2	PMP
HS23xx	Humanities Elective 2	3	HSE
MA24xx	Mathematics Elective 2	3	MAE
	Total	24	

Semester – V

Course No.	Course Name	Credits	Category
ME3010	Gas Dynamics	3	PMT
ME3020	Heat Transfer	4	PMT
ME3030	Combustion and I C Engines	4	PMT
ME3040	Design of Machine Elements	4	PMT
ME3050	Machine Tools and Metrology	4	PMT
ME3060	Mechanical Engineering Lab I	2	PMP
GE35xx	General Elective 1	3	GCE
DE38xx*	Department Elective 1	3	PME*
*for B.Tech Hons	**Total**	**24+3H**	

Semester – VI

Course No.	Course Name	Credits	Category
ME3015	Applied Thermo-fluids Engineering	4	PMT
ME3025	Mechanical Vibrations	3	PMT
ME3035	Automation in Manufacturing	3	PMT
ME3100	Industrial Training	2	PMP
ME3070	Mechanical Engineering Lab II	2	PMP
GE35xx	General Elective 2	3	GCE
DE36xx	Department Elective 2	3	PME
DE38xx*	Department Elective 3	3	PME*
*for B.Tech Hons	**Total**	**20+3H**	

Semester – VII

Course No.	Course Name	Credits	Category
HS4010	Professional Ethics	2	HSS
ME4010	Industrial Engineering and Management	4	PMT
ME4060	Mechanical Engineering Lab III	2	PMP
ME4100	Project I	3	PMP
DE46xx	Department Elective 4	3	PME
DE46xx*	Department Elective 5	3	PME*
DE48xx*	Department Elective 6	3	PME*
*for B.Tech Hons	**Total**	**14+ 6H**	

Semester – VIII

Course No.	Course Name	Credits	Category
ME4110	Project II	7	PMP
GE45xx	General Elective 3	3	GCE
DE46xx	Department Elective 7	3	PME
DE48xx*	Department Elective 8	3	PME*
*for B.Tech Hons	**Total**	**13+3H**	