



First Year Teaching Scheme

Admission Year 2026-27

**Master of Technology
CSE (Cyber Security)**

Faculty of Engineering & Technology

Parul University

Vadodara, Gujarat, India

Semester - 1

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023301P C01	Advanced Web Applications Security	3	3	-	-	20	-	20	60	-	50	-	100
03023301P C02	Advanced Web Applications Security Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023301P C03	Advanced Mobile Application Architecture & Security	3	3	-	-	20	-	20	60	-	50	-	100
03023301P C04	Advanced Mobile Application Architecture & Security Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023301P C05	Advanced Computer Networks & Security	3	3	-	-	20	-	20	60	-	50	-	100
03023301P C06	Advanced Computer Networks & Security Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
	Humanities and Social Science, including Management Course (HSMC)-I (2025-26)	4	-	-	-	-	-	-	-	-	-	-	
	Mandatory Course (MNC)-I (2025-26)	0	-	-	-	-	-	-	-	-	-	-	
	Profession Elective Course Lab (PEC Lab)-I (2025-26)	1	-	-	-	-	-	-	-	-	-	-	
	Professional Elective Course (PEC)-I (2025-26)	3	-	-	-	-	-	-	-	-	-	-	
	Total	20	9	6									450

Semester - 1 : Humanities and Social Science, including Management Course (HSMC)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03020201H M01	Research Methodology & IPR	4	4	-	-	20	-	20	60	-	50	-	100

Semester - 1 : Mandatory Course (MNC)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03020001M C01	English for Research Paper Writing	0	2	-	-	-	-	50	-	-	25	-	50
03021601M C01	Disaster Management	0	2	-	-	-	-	50	-	-	25	-	50

Semester - 1 : Profession Elective Course Lab (PEC Lab)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023301P E02	Applied Cryptography Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023301P E04	Digital Forensic & Incident Response Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023301P E06	Machine Learning Laboratory	1	-	2	-	-	20	-	-	30	-	25	50

Semester - 1 : Professional Elective Course (PEC)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023301P E01	Applied Cryptography	3	3	-	-	20	-	20	60	-	50	-	100
03023301P E03	Digital Forensic & Incident Response	3	3	-	-	20	-	20	60	-	50	-	100

Semester - 1 : Professional Elective Course (PEC)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023301P E05	Machine Learning	3	3	-	-	20	-	20	60	-	50	-	100

Lect - Lecture, **Tut** - Tutorial, **Lab** - Lab, **T** - Theory, **P** - Practical, **CE** - CE, **T** - Theory, **P** - Practical
Theory Passing % : 50 Practical Passing % : 50

Semester - 2

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P C01	Security Monitoring	3	3	-	-	20	-	20	60	-	50	-	100
03023302P C02	Security Monitoring Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023302P C03	Information Security Management System	3	3	-	-	20	-	20	60	-	50	-	100
03023302P C04	Information Security Management System Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
	Mandatory Course (MNC)-II (2025-26)	0	-	-	-	-	-	-	-	-	-	-	
	Multidisciplinary Open Professional Electives Course (MOPEC)-I (2025-26)	4	-	-	-	-	-	-	-	-	-	-	
	Profession Elective Course Lab (PEC Lab)-II (2025-26)	1	-	-	-	-	-	-	-	-	-	-	
	Profession Elective Course Lab (PEC Lab)-III (2025-26)	1 - 3	-	-	-	-	-	-	-	-	-	-	
	Professional Elective Course (PEC)-II (2025-26)	3	-	-	-	-	-	-	-	-	-	-	
	Professional Elective Course (PEC)-III (2025-26)	3	-	-	-	-	-	-	-	-	-	-	
	Total	20	6	4									300

Semester - 2 : Mandatory Course (MNC)-II (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03020002M C01	Pedagogy Studies	0	2	-	-	-	-	50	-	-	25	-	50
03020002M C02	Personality Development through Life Enlightenment Skills	0	2	-	-	-	-	50	-	-	25	-	50

Semester - 2 : Mandatory Course (MNC)-II (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302M C01	Indian Cyber Law and Ethics	0	2	-	-	-	-	50	-	-	25	-	50

Semester - 2 : Multidisciplinary Open Professional Electives Course (MOPEC)-I (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03020202U E01	Augmented Reality and Virtual Reality	4	4	-	-	20	-	20	60	-	50	-	100
03020202U E02	Cyber Physical Systems	4	4	-	-	20	-	20	60	-	50	-	100
03020202U E03	Social Networking	4	4	-	-	20	-	20	60	-	50	-	100
03020502U E01	Business Analytics	4	4	-	-	20	-	20	60	-	50	-	100
03020602U E01	Industrial Safety	4	4	-	-	20	-	20	60	-	50	-	100
03020702U E01	IOT and Smart Cities	4	4	-	-	20	-	20	60	-	50	-	100
03022002U E01	Waste to Energy	4	4	-	-	20	-	20	60	-	50	-	100

Semester - 2 : Profession Elective Course Lab (PEC Lab)-II (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P E02	Mobile and wireless communication security Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023302P E04	Reverse Engineering and Malware Analysis Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023302P E06	CyberLaws and Ethics Laboratory	1	-	2	-	-	20	-	-	30	-	25	50

Semester - 2 : Profession Elective Course Lab (PEC Lab)-III (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P E08	Fundamentals of InfoSec, SCADA & IOT Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023302P E10	Game Theory and Hacking Laboratory	1	-	2	-	-	20	-	-	30	-	25	50
03023302P E12	Cloud Computing & Security Laboratory	1	-	2	-	-	20	-	-	30	-	25	50

Semester - 2 : Professional Elective Course (PEC)-II (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P E01	Mobile and wireless communication security	3	3	-	-	20	-	20	60	-	50	-	100
03023302P E03	Reverse Engineering and Malware Analysis	3	3	-	-	20	-	20	60	-	50	-	100

Semester - 2 : Professional Elective Course (PEC)-II (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P E05	CyberLaws and Ethics	3	3	-	-	20	-	20	60	-	50	-	100

Semester - 2 : Professional Elective Course (PEC)-III (2025-26)

						Internal Marks			External Marks		Passing Marks (Theory + CE)	Passing Marks (Practical)	Total Marks
Code	Subject	Credit	Lect	Lab	Tut	T	P	CE	T	P	Int. + Ext.	Int. + Ext.	
03023302P E07	Fundamentals of InfoSec, SCADA & IOT	3	3	-	-	20	-	20	60	-	50	-	100
03023302P E09	Game Theory and Hacking	3	3	-	-	20	-	20	60	-	50	-	100
03023302P E11	Cloud Computing & Security	3	3	-	-	20	-	20	60	-	50	-	100

Lect - Lecture, **Tut** - Tutorial, **Lab** - Lab, **T** - Theory, **P** - Practical, **CE** - CE, **T** - Theory, **P** - Practical
Theory Passing % : 50 Practical Passing % : 50

