



MTECH (Regular) IN CYBER SECURITY

Semester wise Courses

SEMESTER 1	SEMESTER 2
Numerical Methods and Optimization Techniques	Advance Cryptography and Polymorphic Data Encryption
Literature Review and Technical Writing	Virtuaization, Cluster and Cloud Computing
Security Threats and Malware Analysis	Penetration Testing using Python
Critical Information Infrastructure and Attack Modeling	Incident Response and Redressal Methods
Open Elective - 1	Data Wiping and Destruction
<ul style="list-style-type: none"> • Yoga and Meditation for Digital Citizens / World • Adressing Social Problems through Technology Proliferation 	Course Elective - 2
Course Elective 1	<ul style="list-style-type: none"> • Data Encoding and Comnpression Techniques • Web Services and Service Oriented Architecture • Multidimensional Data Modelling
<ul style="list-style-type: none"> • Computational Intelligence • Game Theory • Man Machine Interface and IoT • Personality Development and Communication Skills 	Open Elective - 2
Specialization Elective	<ul style="list-style-type: none"> • CSR Fund Raising for Socialtal Benefits • Mental Conditioning and Stress Management
<ul style="list-style-type: none"> • Security Metrics and Key Performnce Indiactors • Cyber Crime, Cyber Law and IT Act • Cyber Forensics Aaudit and Investigation 	Specialization Elective 2
Practical	<ul style="list-style-type: none"> • Digital Devices Security • Information Security Management Certification • CyberPeace Corps Social Internship
Literature Review and Technical Writing - Lab	Practical
Security Threats and Malware Analysis - Lab	Advance Cryptography and Polymorphic Data Encryption - Lab
Critical Information Infrastructure and Attack Modeling - Lab	Virtuaization, Cluster and Cloud Computing - Lab
	Penetration Testing using Python - Lab
	Basics of Incidence Response and Malware Analysis - Lab
	Course Elective - 2 Lab

SEMESTER 3	SEMESTER 4
Research Methodology	Internship and Dissertation
Hardware and Firmware Security	
Project Ideation and Designing DPR	
Specialization Elective	
<ul style="list-style-type: none"> ● Working on Security Issues in BFSI 	
<ul style="list-style-type: none"> ● Working on Security Issues in Homeland Security 	
<ul style="list-style-type: none"> ● Working on Security Issues in Governance 	
<ul style="list-style-type: none"> ● Working on Security Issues in General Public 	
<ul style="list-style-type: none"> ● Working on Security Issues in Any other open area of interest 	
Practical	
Research Methodology Lab	
Hardware and Firmware Security Lab	
Project Ideation and Designing DPR Lab	