

MAHATMA GANDHI UNIVERSITY (Accredited with 'B+' grade by NAAC) NALGONDA- 508254(T.G)

Lr.No.480 /MGU /AAC/NLG /2024-25

Date: 25.05.2025

To

All the Principals of UG Colleges Under the Jurisdiction of Mahatma Gandhi University Nalgonda

Sub: MGU-AAC- NLG- Implementation of Cyber Security Course (GE)–III Semester-for all UG & BBA programmes– Revised Syllabus- Reg.

Ref: 1. Lr. No.172/ MGU/AAC/NLG/2024-25, dated: 20.11.2024 of MGU, NLG

- 2. Lr. No.182/ MGU/AAC/NLG/2024-25, dated: 25.11.2024 of MGU, NLG
- 3. Note approval of the Hon'ble Vice-Chancellor, Dated: 06.05.2025

& & &

Adverting to the subject cited, the University has informed to all the Principals of UG Colleges Under the jurisdiction of Mahatma Gandhi University, Nalgonda that the Cyber Security Course (GE) with 4 credits is to be implemented in III Semester in all UG & BBA programmes from the academic year 2025-26 onwards (ref.1).

In view of the above, the syllabus of Cyber Security (GE) has been revised keeping in view of Non-Computer Science UG programmes and will be implemented in III Semester from the academic year 2025-26 onwards.

Encl: Revised Syllabus of Cyber Security

REGISTRAR MAHATMA GANDHI UNIVERSITY NALGONDA-508 254.

Copy to:

- 1. The Dean, Faculty of Engineering & Technology, MGU
- 2. The Controller of Examinations, MGU
- 3. All the Head of the Departments, MGU
- 4. All the Chairpersons, BoS, MGU
- 5. PS to VC, MGU
- 6. PA to Registrar, MGU
- 7. Stack file

UNIT -I Introduction to Cyber Security

15 Hours

Definition and basics of Computers, Electronic Devices, Operating Systems, Cyber Safety, Cyber Security, CIA Triad (Confidentiality, Integrity & Availability of Information), Fundamentals of Digital Hygiene, Types of Cyber Threats. Architecture of Cyberspace, Communication and Web technology, Internet, World Wide Web, Advent of Internet, Internet infrastructure for data transfer and governance, Internet society.

UNIT-II: Introduction to Cyber Laws

15 Hours

Introduction to Cyber Law: An overview of Information Technology Act 2000. Definition of basic legal terms of IT law, Investigative framework, the role of *Cert-In* in Collection, Dissemination, and Advisories on cyber-crimes incidence, Legal recognition of Electronic Records and Electronic Signatures, Functions and liabilities of IT Intermediaries, Basics of SPDI (Sensitive Personal Data or Information) Rules 2011

UNIT-III: Introduction to Cyber Crimes

15 Hours

Definition of Cyber-Crimes under IT Act 2000

Types of Cyber Crimes: Hacking (Computer Viruses, Time Bombs, Trojans, Malicious Code "Malware", DOS, DDOS, Web defacement, Phishing, cloning, financial frauds, social engineering attacks, malware and ransom ware attacks, zero-day and zero click attacks), Cyber Stalking, Cyber Bullying, Cyber Pornography, Child Pornography, Cyber Laundering, Online betting and games, Violation of Cyber Privacy, Voyeurism, Data Privacy, Data Theft, and Cyber Terrorism.

UNIT IV: Social Engineering Awareness

15 Hours

Definition of Social Engineering techniques & tactics in Cyber Frauds, Methods of identifying and preventing social engineering cybercrimes like Impersonation, Mule Identity, Identity Theft, Phishing, Spear Phishing, Pretexting, Baiting, Scareware, Tailgating, Quid Pro Quo, etc

Revistulo25

=H. Roll



References

- 1. Cyber Crime Impact in the New Millennium, R. C Mishra, Auther Press. Edition 2010.
- 2. Cyber Security Understanding Cyber Crimes, Computer Forensics and Legal Perspectives Sumit Belapure and Nina Godbole, Wiley India Pvt. Ltd. (First Edition, 2011)
- 3. Security in the Digital Age: Social Media Security Threats and Vulnerabilities Henry A. Oliver, Create Space Independent Publishing Platform. (Pearson, 13th November, 2001)
- 4. Cyber Laws: Intellectual Property & E-Commerce Security by Kumar K, Dominant Publishers.
- 5. Network Security Bible, Eric Cole, Ronald Krutz, James W. Conley, 2nd Edition, Wiley India Pvt. Ltd.

Rentistations Japon CH. Code CH. Code