

M.TECH (CSE) with specialization in Cyber Forensics and Information Security

SEMESTER II EXAMINATION, 2023

Paper Code: MTCFIS PE 241

SECURITY ASSESMENT AND RISK ANALYSIS

Time: 2 ½ Hours

Maximum Marks: 60

SECTION A

Note: Attempt All Questions from this Section

5 X 4 = 20

Q.No.	Questions	Marks	CO	BL
1	Explain the concept of Non-Repudiation, Authentication in information security.	4	CO-1	BL-2
2	What is Hacking. How can we prevent hacking.	4	CO-2	BL-1
3	Explain the concept of Threats and its types. How are threats managed in a connected network environment.	4	CO-3	BL-3
4	Explain 4 points of differences between virus, malware, and worms.	4	CO-4	BL-4
5	Explain the concept of data, information, and knowledge.	4	CO-1	BL-5 and BL-6

SECTION B

Note: Attempt any FOUR (04) Questions

4 X 10 = 40

1	Explain the concept of Risk Management. What are the steps involved in risk management.	10	CO-2	BL-3
2	Explain the concept of passwordless security.	10	CO-5	BL-6
3	What are Botnets. Explain the Botnet Command and Control Architecture.	10	CO-1	BL-4
4	What is Security Audit? Why is it important to perform a security audit.	10	CO-3	BL-1 and BL-2
5	Explain steps of security system development life cycle.	10	CO-5	BL-2
6	Encrypt the Message "My Name is XYZ" using substitution cipher when Key = 4.	10	CO-4	BL-3

(CO- Course Outcome)

(BL- Bloom's Taxonomy Levels (1- Remembering, 2-Understanding, 3-Applying, 4-Analysing, 5-Evaluating, 6-Creating))