MSE–033

MASTER OF SCIENCE
(INFORMATION SECURITY) (MSCIS)
Term-End Examination
December, 2023
MSE-033 : WEB APPLICATION TESTING AND AUDIT

Time : 3 Hours *Maximum Marks : 100*

Note : *Question No.* **1** *is compulsory. Answer any* **three** *questions from the rest.*

1. (a) Describe the most common authentication protocols. Give example. 10

   (b) Explain XML digital signatures with their types and structure. 10

   (c) How do authorization vulnerabilities arise ? Give illustration. 10

   (d) Discuss models of web application components with illustration. 10

2. Explain common cyber-attack vectors in term of : 20

   (i) Missing or poor encryption

(ii) Misconfiguration

(iii) Ransomware

(iv) Phishing

(v) Trust relationships and zero day vulnerabilities

3. (a) Describe the fundamentals of web application security audit.　　10

 (b) Explain weblog evaluation in the context of generic weblog examination data, possible purposes and common logs.　　10

4. (a) Explain methodologies for session management scheme testing.　　10

 (b) How does direct API intersection work ? Give illustration.　　10

5. Write short notes on the following :　　4×5=20

 (a) Mobile application forensics

 (b) HTML5 Security

 (c) Multiple Web Servers, Multiple database

 (d) Encryption Application