

--	--	--	--	--	--	--	--	--	--

Eighth Semester B.E. Degree Examination, June/July 2011

Information and Network Security

Time: 3 hrs.

Max. Marks:100

**Note: Answer FIVE full questions selecting
at least TWO questions from each part.**

PART – A

- 1 a. Define policy and explain issue specific security policy. (10 Marks)
b. Explain the importance of incident response planning strategy. (10 Marks)
- 2 a. What is firewall? Explain categories of firewalls based on processing mode. (10 Marks)
b. What are virtual private networks? Explain different techniques to implement a virtual private network. (10 Marks)
- 3 a. Explain network based intrusion detection and prevention systems. (10 Marks)
b. Describe the need of operating system detection tools. (10 Marks)
- 4 a. List out the elements of cryptosystems and explain transposition cipher technique. (10 Marks)
b. Who can attack cryptosystems? Discuss different categories of attacks on cryptosystems. (10 Marks)

PART – B

- 5 a. Compare active and passive attacks. (05 Marks)
b. With a neat diagram, explain network security model. (07 Marks)
c. List out the differences between Kerberos version 4 and version 5. (08 Marks)
- 6 a. Explain PGP message generation and PGP message reception techniques. (10 Marks)
b. Describe S/MIME functionality. (05 Marks)
c. Explain S/MIME certificate processing method. (05 Marks)
- 7 a. Describe SA parameters and SA selectors in detail. (10 Marks)
b. Describe Oakley key determination protocol. (10 Marks)
- 8 a. Explain SSL handshake protocol with a neat diagram. (10 Marks)
b. List out the key features of secure electronic transaction and explain in detail. (10 Marks)

* * * * *

Important Note : 1. On completing your answers, compulsorily draw diagonal cross lines on the remaining blank pages.
2. Any revealing of identification, appeal to evaluator and /or equations written eg, 42+8 = 50, will be treated as malpractice.