6th Semester Computer Science & Engineering

Cryptography & Network Security(CST-603)

Probable questions for council examination

Group – A

(Twenty very short type questions, 2 marks each)

1. What do you mean by cryptography?
2. Distinguish between plain text and cipher text.
3. Differentiate between Encryption and Decryption?
4. Define Digital signature?
5. Define Password.
6. What is digital envelope?
7. Define digital certificate.
8. What do you mean by IP Security?
9. What is firewall ?
10. What is Time stamping protocol?
11. What do you mean by Biometric Authentication?
12. What do you mean by Trusted System?
13. Define Smart Card.
14. Name various types of attacks on computer system
15. What is IP datagram ?
16. Define virus. Name two virus.
17. What is the role of SHTTP in cryptography?
18. Define Authentication.
19. Define public key and private key.
20. Define substitution technique.

Group- B

(15 Long questions, 5 marks each)

1. Write the comparison between Symmetric & Asymmetric key cryptography.
2. Explain different principles of security with example.
3. What is Encryption ? what is decryption? Draw a block diagram showing plain text , cipher text encryption and decryption.
4. Describe Biometrics Authentication.
5. State and explain the RSA algorithm.
6. Explain PKIX model.
7. Describe SSL and explain how it works.
8. Explain the differences between substitution and transposition techniques.
9. What do you mean by DES ? Explain how does DES work.
10. What is digital certificate and write different steps used in obtaining a digital certificate?
11. What is VPN ? Explain its working principle in the field of network security.
12. Explain private key management.
13. Describe the position of SSL in TCP/IP protocol suite with diagram.
14. Define authentication token . Explain the features of authentication token.
15. Explain various types of substitution techniques used in Cryptography.

Group – C

(10 Very long type questions, 7 marks each)

1. Explain RSA algorithm. Describe the example of RSA.
2. What do you mean by Secure Electronic Transaction ? Explain the SET process.
3. Describe Substitution techniques and Transposition techniques.
4. What is Firewalls ? Explain different types of Firewalls.
5. Explain Virtual Private Network. Describe VPN architecture.
6. What do you mean by DES? Explain how DES works.
7. Describe Symmetric and Asymmetric key cryptography.
8. Describe different types of attacks to a computer system.
9. What is TCP/IP ? Explain the function of each layer in TCP/IP protocol suite.
10. Explain the various symmetric key algorithm types used in the field of cryptography and network security.

COMPUTER SYSTEM MANAGEMENT PLANNING & MAINTENANCE
PROBABLE QUESTIONS

GROUP-A
(Very Short Type Questions, 20 Nos., 2 marks each)

1. Write the standard specification of a computer system.
2. Name two major vendors in computer hardware and software.
3. Define UPS.
4. What is BIOS?
5. Define CMOS setup.
6. Define POST.
7. Write basic components required to setup a computer laboratory.
8. Name the factors affecting selection and evaluation of computer.
9. Name two diagnostic program and tools.
10. What is the function of isolation circuit and UPS?
11. Name two antivirus software.
12. Name various computer make and installation in India.
13. What is the layout plan for computer room?
14. Write the detailed configuration of Pentium-4 computer system.
15. Write the function of SMPS.
16. What is the function of network interfacing card?
17. Define AMC.
18. Define wiring diagram.
19. Expand the terms ISA & VESA.
20. Explain the formula concept.

GROUP-B
(Short Type Questions, 15 Nos., 5 marks each)

1. Classify the computer personnel and guest in an organization and explain their duties briefly.
2. What is the function of SMPS? Explain briefly.
3. How different industries are classified as per their computer requirements?
4. What is HDD? Explain the functioning of and partitioning of HDD.
5. Identify different standard expansion units and explain briefly.
6. What is a fault? explain different categories of fault and how they are removed?
7. What do you mean by basic maintenance of a computer system? Explain the preventive and corrective measures.
8. Describe the need of management in computer centres.
9. Explain the interpretation of the installation and wiring diagram.
10. Explain hardware - BIOS interaction.
11. Explain the software setting of computers after installation (CMOS setup).
12. Explain the formula concept.
13. Explain the steps for assembling a computer.
14. Explain various layout factors and their effect in brief.
15. Why staff training is needed? Explain how to training is conducted.

GROUP-C
(Long Type Questions, 10 Nos., 7 marks each)

1. What is the need of a computer centre? Write the steps to establish a computer centre with installation of computers and peripherals.
2. Name the network interconnecting devices and explain their functions briefly.
3. What do you mean by a layout of a computer centre? Identify different features to establish a computer centre.
4. Identify the power conditioning equipments. Explain the steps for actual installation and wiring diagram for site preparation of computer centre.
5. Name different components reside inside the system unit. Explain their function briefly.
6. What do you mean by troubleshooting? Compare the systematic way versus Ad-Hoc way of troubleshooting.
7. State and explain the steps for assembling a computer system. Write the advantages of a assembly computer system.
8. Discuss hierarchy of position of different levels and explain need for staff training.
9. Explain different standard of expansion unit: ISA, EISA, VESA, PCI.
10. Describe various components inside the computer system unit.

Data mining and data warehousing

Computer Science & Engineering

6th sem, CST 601

Group A

(Twenty probable questions, each 2marks)

1. What is data warehousing?
2. Define association rule?
3. Name the applications of frequent pattern mining?
4. Define classification?
5. What do you mean by data cleaning?
6. What are the 4 distance between cluster approaches?
7. Define clustering?
8. Define density based clustering?
9. Define OLAP server?
10. What do you mean by DWARF?
11. Define storage and chunks?
12. What do you mean by OLAP cube?
13. What is precision & recall?
14. Define data mart?

15. What is Data stream?

16. What are 5 major elements of data mining?

17. What is data model? Name different types of data model?

18. What are the applications of Clustering?

19. Define outlier?

20. Write down outlier detection techniques?

Group B

(Fifteen probable questions, each of 5marks)

1. Explain characteristics of data warehouse?

2. Difference between data mining & statistics?

3. Difference between data warehouse & data mining?

4. What is frequent pattern mining? What are it's applications?

5. What are the applications of classification?

6. What are the applications of outlier detection ?

7. Define clustering? Explain different types of Clustering algorithms?

8. What is clustering? Explain Hierarchical and partitioning Based Methods?

9. Explain ETL process with suitable diagram?

10. Describe about the interesting news of discoverd pattern?

11. Define data mining? Explain data mining user perspective and related disciplines?

12. What are chunks? What are the features of a chunk system?

13 .Explain data warehouse components?

14. What is OLAP? Give a description about different OLAP operations?

15. What is data warehousing? Explain it?

Group C

(Ten probable questions, each of 10 marks)

1. Define data warehouse? Briefly explain the architecture of data warehouse?

2. Define multidimensional data. Explain patter discovery in multidimensional data?

3. What is relational data? Explain the data model of relational data?

4. Define Time series data? Explain it's model & pattern discovery?

5. Describe similarity and distance measures in clustering?

6. What is density based method in clustering? Briefly explain about DBSCAN algorithm?

7. Define outlier? Explain outlier detection method in brief?

8. Explain FIM algorithm?

9. What is the need of data mining tools? Describe different types of data mining tools?

10. Explain mining association rules with examples?

E-COMMERC (Code- CST-601)

(PROBABLE QUESTIONS)

(Very short type question 20nos,each 2 marks)

GROUP:A

1. Define e-commerce.
2. What do you mean by Internet?
3. What is SSL ?
4. Define E-Waste.
5. Define e-Governance.
6. Define e-payment system.
7. What is VPN ?
8. What is e-procurement ?
9. What's payment gateway?
10. Define EFT.
11. What is EDI.
12. What is E-Business ?
13. What is B2C ?
14. What is B2B ?
15. What is Cryptography?
16. Define Extranet.
17. Define digital signature.
18. What do you mean by firewall?
19. Define digital envelope.
20. Define internet banking.

GROUP: B

(Long Type 10 questions , each 5 marks)

1. Compare between traditional and electronic commerce.
2. Define contrast between B2B and B2C.
3. Define firewall.explain different types of firewalls.
4. Explain various advantage and disadvantage of e-commerce.
5. Describe the limitations of e-commerce.
6. Explain the role of e-commerce in whole sale.
7. Describe the supply chain management in details.
8. Explain the different elements of IT ifrastructure.
9. State the function of firewall in e-commerce.

10. Explain client- server network security.
11. Explain the role of e-commerce in service sector.
12. What is B2B? Explain it's various benefits.
13. Explain different application area of e-commerce.
14. Explain the different strategies of online marketing.
15. Explain the steps and advantage of EDI system.

GROUP: C

(Long type question 10nos each 7marks)

1. Explain traditional options of web promotion briefly.
2. Explain the working of e-commerce application in wholesale sector.
3. What is supply chain? Explain management in details.
4. Explain the advantage of XML as a technology How is it different from HTML.
5. What is e-procurement? How to implementing e-procurement write the steps.
6. What is E-Business? How e-commerce different traditional commerce.
7. Explain the working of B2C e-commerce in details.what are the different challenge involved in it.
8. What are the model of e-commerce? Explain any two e-commerce model.
9. Compare intranet, internet and extranet.
10. Explain digital signature and also explain how does bit works.

Internet And Web Technology

Probable Questions

Group -A

(Very short type questions, 20 no. s, 2 marks each)

1. Define Internetworking ?
2. What is the function of a Router ?
3. How many bits are there in an IP address write with an example ?
4. Define SMTP ?
5. What is the function of a browser. Give one example ?
6. What is the function of default router ?
7. Identify the two techniques to reduce congestion ?
8. What is URL ?
9. Write two applications of Internet ?
10. What is protocol ?
11. Why checksum is calculated ?
12. What is the function of Transparent Router ?
13. Explain Dotted decimal notation ?
14. What is original class full addressing scheme ?
15. What is hyper text ?
16. What is E-mail ?
17. Name the types of Internet connectivity ?
18. Define URL ?
19. Define IRC ?
20. Define End points ?

Group -B

(Short type questions, 15no. s, 5 marks each)

1. Who is ISP? State the factors for choosing an ISP ?
2. What is routing of an internet? Differentiate Direct and indirect delivery service ?
3. What do you mean by reliable delivery system ? Explain the properties of reliable delivery service ?
4. What is subject address extension? Write the techniques to minimize the network members ?
5. Define WWW? What is a browser? Write the important components of a WWW ?
6. What do you mean by Internet Architecture? Explain original classfull addressing scheme ?
7. What is connectionless delivery system. Explain ?

8. Explain how an XML document is developed? Write the parts of an XML document ?
9. State and explain Java Script ?
10. Define FTP? Explain FTP client server model with suitable example ?
11. Define subnet addressing? Explain Routing in presence of subnet ?
12. Discuss the several types of connectivity in computer network ?
13. Explain the TCP segment format with a diagram ?
14. Why congestion occurs ? Write the techniques to resolve/reduce congestion?
15. What is IRC? Explain the functions of channel ?

Group-C

(Long type questions, 10 no. s, 7 marks each)

1. Explain TCP/IP layers reference model with suitable example ?
2. Write the different features of FTP? Explain the FTP process model by a suitabldiagramam ?
3. What is DNS? Explain the mapping of domain names to address ?
4. Define E-mail? Write the advantages of E-mail? Write the format of an E-mail message ?
5. Write the salient features of HTML briefly ?
6. Define UDP ? Explain the field of UDP message format ?
7. State and explain connectionless data gram delivery system ?
8. Explain how the idea behind the slide window concept improves the system. Explain by diagram ?
9. Explain the routing mechanism in internet protocol ?
10. Write short notes on (2.5x4)
    (a) Internet architecture board
    (b) Telnet protocol
    (c) Transparent Router
    (d) Datagram