G 1433 (Pages : 2) Reg. No.....

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering / Information Technology

SOFTWARE ENGINEERING (R, T)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Part A

Answer **all** *questions.*
Each question carries 4 *marks.*

1. Define and explain Software Engineering.
2. Explain in detail the phase in software development.
3. Define and explain profit scheduling.
4. Explain the cost estimation and uncertainties in project planning.
5. Explain coupling in System Design.
6. Explain the structured design methodologies.
7. What is structured programming ? Explain in detail.
8. Explain the principle of code reading ? Explain.
9. What are functional and structured testing ? Explain.
10. Define and explain error removal efficiency.

(10 × 4 = 40 marks)

Part B

Answer **all** *questions.*
Each question carries 12 *marks.*

11. Explain in detail the Software requirement specifications

Or

12. Describe in detail the role of Management in Software development.
13. Explain (1) Rayleigh ; (2) teamstructure in detail.

Or

14. Explain the project monitoring plans in detail.

Turn over

15. Explain the structured design methodologies in detail.

Or

16. Explain in detail the principles of system design.

17. Explain in detail the 'Information hiding'.

Or

18. Explain the following :—

    (a) Unit testing ;

    (b) Symbolic execution.

19. Compare and contrast verification and validation techniques. Explain the comparison.

Or

20. Discuss in detail the fundamentals of testing.

(5 × 12 = 60 marks)

G 1442 (Pages : 2) Reg. No.....

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering

PROJECT MANAGEMENT AND QUALITY ASSURANCE (R)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Answer **all** *questions.*

Part A

Each question carries 4 *marks.*

Write short notes on the following :—

1. 7's of Project Management.
2. Cost Benefit Analysis.
3. Uses of Information Systems.
4. Total Productive Maintenance.
5. Estimating population proportion.

(5 × 4 = 20 marks)

Part B

Each question carries 20 *marks.*

1. (a) Discuss some of the principal problems involved in an attempt to rank proposal alternative investment proposals in order their profitability.

Or

(b) Critically Evaluate the different methods of appraising an investment decision.

2. (a) Do you agree that element of risk can vary between zero infinity in a dynamic economy ? What do you regard to be the best method of treating risk involved in fresh investment decisions.

Or

(b) Distinguish between Benefit cost-ratio and Net Benefit cost ratio. State the decision rule of the BCR criterion and explain the advantages and disadvantages of BCR.

Turn over

3. (a) Discuss the advantages and disadvantages of project management software.

Or

(b) Elucidate the various performance evaluation methods of controlling project.

4. (a) Working individually or in a team Brain storm how to IPM could be applied to the following industries :—

(i) Photo Printing industry.

(ii) Copy centre.

(iii) Transmission shop.

(iv) Quick oil change shop.

(v) Gas station.

Or

(b) What is the overall aims of EMS standard ? How is the aim achieved ? Point out the precepts of ISO 9000.

(4 × 20 = 80 marks)

G 1424 (Pages : 2) Reg. No.....CS.....

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering

PC AND PC BASED SYSTEM (R)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Part A

Answer **all** *the questions.*
Each question carries 4 *marks.*

1. What is linear mode power supply ? Explain in detail.
2. Define and explain the parameters of power supply.
3. Explain the principle of magnetic data storage.
4. What is ultra DMA ? Explain in detail.
5. Explain the principle of CD-RW in detail.
6. Define and explain (1) Constant linear velocity ; (2) constant angular velocity.
7. Define and explain (1) Cache memory : (2) video memory.
8. Give an account on 'Advanced memory technologies.
9. Explain the USB standards in detail.
10. Give an account on 'EIDE'.

(10 × 4 = 40 marks)

Part B

Answer **all** *questions.*
Each question carries 12 *marks.*

11. Draw a neat block diagram of SMPs and explain its function in detail.

Or

12. Explain the need for slots and connectors in personal computers.
13. Explain in detail the disk magnetic properties.

Or

14. Explain the following in detail : (1) Disk formatting ; (ii) CHS addressing. (6 + 6 = 12 marks)

Turn over

15. Explain the principle of holographic storage in detail with neat sketches.

Or

16. Give an account on : (1) RAID ; (2) CDROM ; (3) Buffers. (3 × 4 = 12 marks)

17. Explain the structure of SRAM and DRAM with neat diagrams.

Or

18. Explain the extended expanded and cache memories in detail.

19. Explain the need for communication ports in detail with neat sketches.

Or

20. Write technical notes on : (1) AGP ; (2) ATA.

[5 × 12 = 60 marks]

G 1450 (Pages : 2) Reg. No.....

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering/Information Technology

COMPUTER NETWORKS (R, T)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Part A

Answer **all** *questions.*
Each question carries 4 *marks.*

1. Compare ISO-OSI Reference model with TCP/IP reference model.
2. Compare satellite communication with Fiber optic communication.
3. What is static and dynamic channel allocation ?
4. Define ALOHA.
5. Explain flow based Routing.
6. Explain Jitter control.
7. Explain service provided by transport layer.
8. Define UDP.
9. Explain the operation of DNS.
10. Describe Bluetooth.

(10 × 4 = 40 marks)

Part B

Answer **all** *questions.*
Each question carries 12 *marks.*

11. Explain network hardwares in detail.

Or

12. Discuss various communication satellites.
13. Explain the performance of sliding window protocol.

Or

14. Explain carries sense Multiple access protocols.

Turn over

15. Explain the following :—

(a) Line state routing. (6 marks)

(b) Distance vector routing. (6 marks)

Or

16. Write notes on :

(a) Traffic shaping. (6 marks)

(b) Leaky bucket algorithm. (6 marks)

17. Explain the elements of transport protocols.

Or

18. Explain "Internet transfer protocols".

19. Explain MIME.

Or

20. Discuss various network topology in Mobile networks.

[5 × 12 = 60 marks]

G 1459 (Pages : 2) Reg. No.....3 copies

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering / Information Technology

NETWORK COMPUTING (R, T)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Part A

Answer **all** *questions.*
Each question carries 4 *marks.*

1. Explain style sheets.
2. Briefly explain Image maps.
3. What is meant by active control ?
4. What are the function of control statements ?
5. Explain the term Inheritance.
6. What is meant by Multi threaded programs ?
7. What is Applets and mention their application ?
8. Explain Datagrams.
9. Explain the term POST, HEAD.
10. What is meant by server side scripting ?

(10 × 4 = 40 marks)

Part B

Answer **all** *questions.*
Each question carries 12 *marks.*

11. Explain how to create HTML codes for a basic tables and frames.

Or

12. Write notes on :
    (i) Embedded style sheets. (6 marks)
    (ii) External style sheets. (6 marks)

Turn over

13. Discuss client side scripting.

Or

14. Explain dynamic updating of pages with Java script.

15. Write notes on :

    (i) Creating and using classes in Java. (6 marks)

    (ii) Static classes. (6 marks)

Or

16. Write notes on creating GUI with AWT and swing.

17. Write notes on thread and Thread synchronization.

Or

18. Explain TCP/IP programming with Java.

19. Explain server side scripting.

Or

20. Explain HTML forms and CGI-GET and POST.

[5 × 12 = 60 marks]

G 1468 (Pages : 2) Reg. No.....

Name.....

B.TECH. DEGREE EXAMINATION, MAY 2012

Sixth Semester

Branch : Computer Science and Engineering

ALGORITHM ANALYSIS AND DESIGN (R)

(Regular/Improvement/Supplementary)

Time : Three Hours Maximum : 100 Marks

Answer **all** *questions.*

Part A

Each question carries 4 marks.

1. What are the differences between deterministic and non-deterministic algorithms ?
2. Define space and Time Complexity.
3. Short note on 'Evaluation of matrix multiplication'.
4. Explain the stability of sorting method.
5. Discuss about Kruskal's Algorithm.
6. What is the relevance of greedy method to solve knapsack problem ?
7. What are Multi-stage graphs ?
8. Define principle of optimality.
9. What is Back tracking ? Explain.
10. Discuss about sum of subsets problem.

(10 × 4 = 40 marks)

Part B

11. Explain the function of Recurrence Relation and Recurrence Trees for Complexity evaluation. (12 marks)

Or

12. (a) What is an algorithm ? Discuss in details about its properties. (8 marks)

    (b) What are the difference between Algorithm and computational procedure ? (4 marks)

13. Explain in detail about binary search with an example. (12 marks)

Or

14. Explain the various steps involved in the Quick sorting with an example. (12 marks)

Turn over

15. Explain the Prim's algorithm and give its complexity. (12 marks)

Or

16. Discuss an algorithm to find minimum cost spanning tree and its application and complexity. (12 marks)

17. What are the various methods available in Tree-sort ? (12 marks)

Or

18. Explain travelling salesman problem. Suggest a solution for problem using dynamic programming. (12 marks)

19. Explain an algorithm to solve the "N" Queem problem. (12 marks)

Or

20. Short notes on :

    (a) FIFO and LIFO. (6 marks)

    (b) Knapsack problem. (6 marks)

(5 × 12 = 60 marks)