# Rajalakshmi Engineering College

Name: Haaniya M

Email: 241501062@rajalakshmi.edu.in

Roll no: 241501062 Phone: 6385042979

Branch: REC

Department: I AI & ML FA

Batch: 2028

Degree: B.E - AI & ML



# NeoColab\_REC\_CS23231\_DATA STRUCTURES

REC\_DS using C\_Week 5\_MCQ

Attempt : 1 Total Mark : 15

Marks Obtained: 15

Section 1: MCQ

1. Which of the following operations can be used to traverse a Binary Search Tree (BST) in ascending order?

Answer

Inorder traversal

Status: Correct Marks: 1/1

2. Find the post-order traversal of the given binary search tree.

Answer

10, 17, 20, 18, 15, 32, 21

Status: Correct Marks: 1/1

3. Find the pre-order traversal of the given binary search tree.

#### Answer

13, 2, 1, 4, 14, 18

Status: Correct Marks: 1/1

4. The preorder traversal of a binary search tree is 15, 10, 12, 11, 20, 18, 16, 19. Which one of the following is the postorder traversal of the tree?

#### Answer

11, 12, 10, 16, 19, 18, 20, 15

Status: Correct Marks: 1/1

5. Find the preorder traversal of the given binary search tree.

#### **Answer**

9, 2, 1, 6, 4, 7, 10, 14

Status: Correct Marks: 1/1

6. Which of the following is a valid preorder traversal of the binary search tree with nodes: 18, 28, 12, 11, 16, 14, 17?

#### Answer

18, 12, 11, 16, 14, 17, 28

Status: Correct Marks: 1/1

7. How many distinct binary search trees can be created out of 4 distinct keys?

Answer

14

Status: Correct

Marks : 1/1

8. Find the in-order traversal of the given binary search tree.

**Answer** 

1, 2, 4, 13, 14, 18

Status: Correct Marks: 1/1

9. While inserting the elements 71, 65, 84, 69, 67, 83 in an empty binary search tree (BST) in the sequence shown, the element in the lowest level is

Answer

67

Status: Correct Marks: 1/1

10. While inserting the elements 5, 4, 2, 8, 7, 10, 12 in a binary search tree, the element at the lowest level is \_\_\_\_\_.

Answer

12

Status: Correct Marks: 1/1

11. Which of the following is the correct post-order traversal of a binary search tree with nodes: 50, 30, 20, 55, 32, 52, 57?

**Answer** 

20, 32, 30, 52, 57, 55, 50

Status: Correct Marks: 1/1

12. Which of the following is the correct pre-order traversal of a binary search tree with nodes: 50, 30, 20, 55, 32, 52, 57?

## **Answer**

50, 30, 20, 32, 55, 52, 57

Status: Correct Marks: 1/1

13. Which of the following is the correct in-order traversal of a binary search tree with nodes: 9, 3, 5, 11, 8, 4, 2?

### **Answer**

2, 3, 4, 5, 8, 9, 11

Status: Correct Marks: 1/1

14. Find the postorder traversal of the given binary search tree.

#### **Answer**

1, 4, 2, 18, 14, 13

Status: Correct Marks: 1/1

15. In a binary search tree with nodes 18, 28, 12, 11, 16, 14, 17, what is the value of the left child of the node 16?

#### Answer

14

Status: Correct Marks: 1/1

041501062

247507062