

Practice Questions

Binary Trees

1. Write a method to find the depth of any node.
2. Write a method to find the size of a tree. (use recursive and non recursive approach)
3. Write a method to find the height of the tree. (use recursive and non recursive approach)
4. Write a method to find the level of a tree. (use recursive and non recursive approach)
5. Write a method to calculate the number of full nodes in a tree.
6. Write a method to calculate the number of leaf nodes in a tree.
7. Write a method to calculate the number of neither nodes in a tree.
8. Write a method to calculate the number of descendants of any node.
9. Write a method to find the number of ancestors of any node.
10. Write a method to check if the tree is a full binary tree.
11. Write a method to check if the tree is a complete binary tree.
12. Write a method to check if the tree is a perfect binary tree.
13. Write a method to traverse the binary tree using breadth first search traversal.
14. Write a method to traverse the binary tree using in-order, pre-order, and post-order traversal. (use recursive and non recursive approach)
15. Implement all the operations of Binary Search Tree.

Good Luck