```java
package esof322hw3;

/**
 *  ESOF 322 HW 3
 * @author Karl Molina, Dana Parker
 */
public class BinaryTree {
    private Node root;

    public BinaryTree(Node root) {
        this.root = root;
    }

    /**
     * Adds the node to the tree
     * @param n
     */
    public void addNode(Node n) {
        addNode(n, root);
    }

    /**
     * Recursive helper function to add the node to the correct spot in the tree
     * @param n
     * @param current
     */
    private void addNode(Node n, Node current) {
        if (n.getValue() < current.getValue()) {
            if (current.getLeft() == null) {
                current.setLeft(n);
            } else {
                addNode(n, current.getLeft());
            }
        } else {
            if (current.getRight() == null) {
                current.setRight(n);
            } else {
                addNode(n, current.getRight());
            }
        }
    }
}

/**
 * Node class that holds a value and left and right children
 * @author h89q624
 */
class Node {
    private Node left, right;
    private int value;

    /**
     * Initializes a Node with the value
     * @param value
     */
    public Node(int value) {
        this.value = value;
    }

    /**
     * Gets the node's value
     * @return
     */
    public int getValue() {
        return value;
    }

    /**
     * Gets the node's left child
```

```
70          * @return
71          */
72         public Node getLeft() {
73             return left;
74         }
75 
76         /**
77          * Gets the node's right child
78          * @return
79          */
80         public Node getRight() {
81             return right;
82         }
83 
84         /**
85          * Sets the node's right child
86          * @param n
87          */
88         public void setRight(Node n) {
89             right = n;
90         }
91 
92         /**
93          * Sets the node's left child
94          * @param n
95          */
96         public void setLeft(Node n) {
97             left = n;
98         }
99     }
```