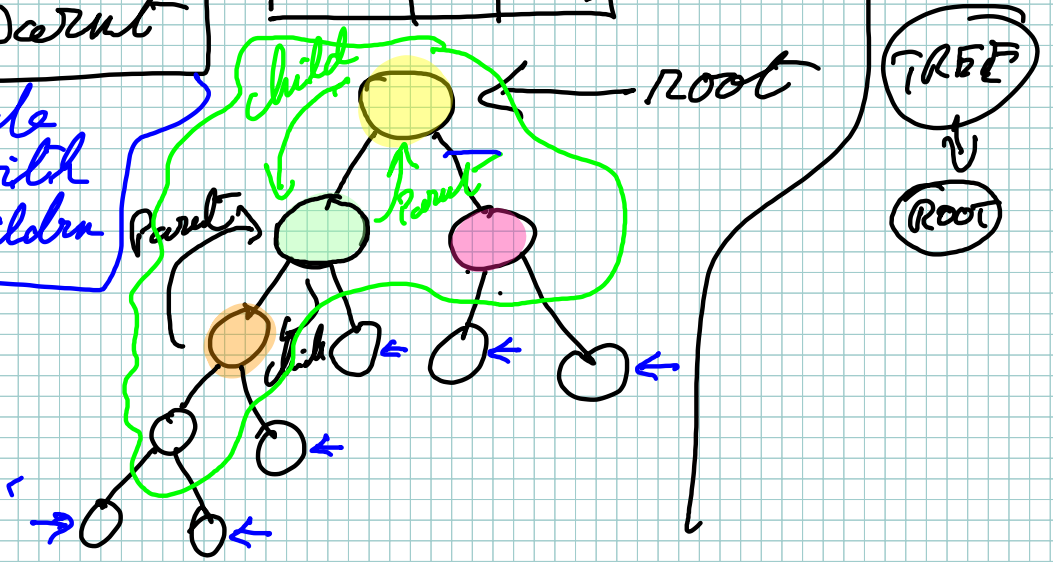


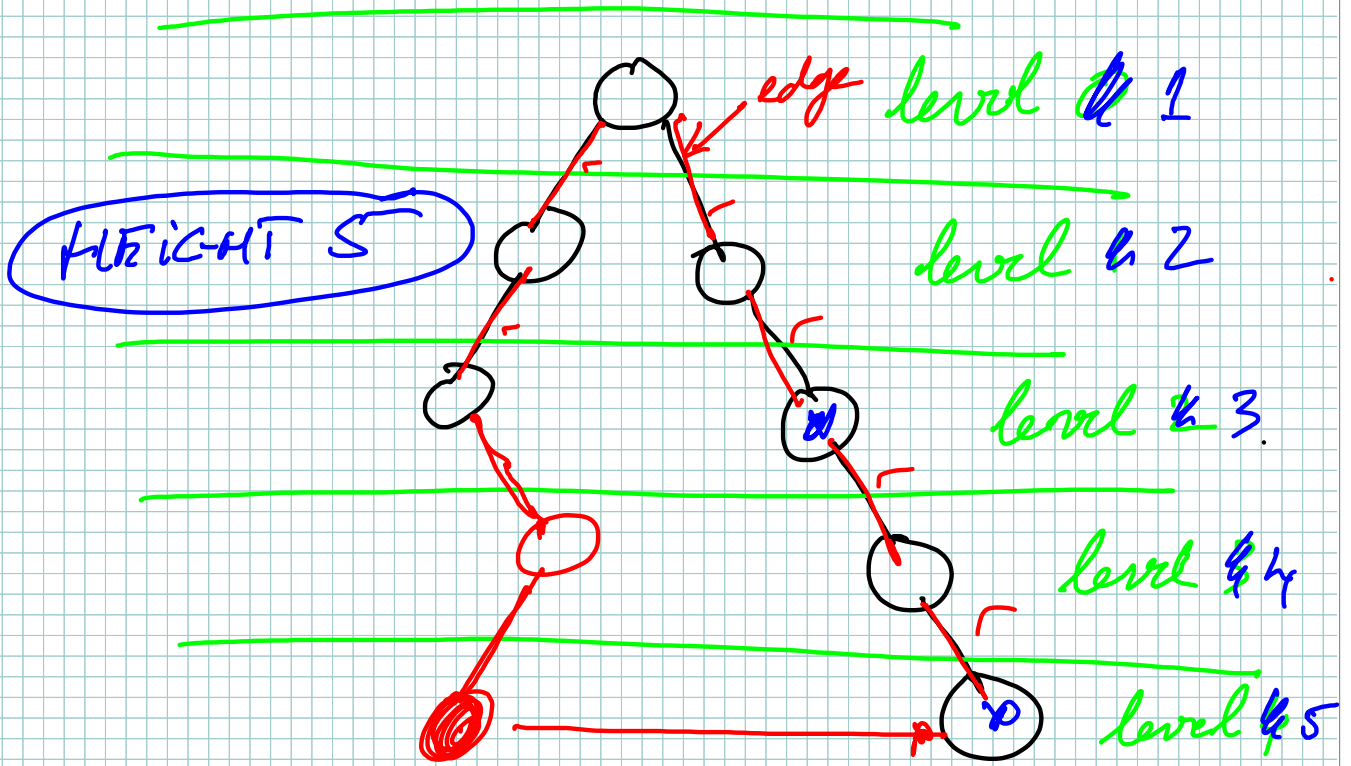
LISTS
QUEUES
STACKS } linear

root has no parent

leaf node
node with no children

PARENT		
LEFT CHILD	e	RIGHT CHILD

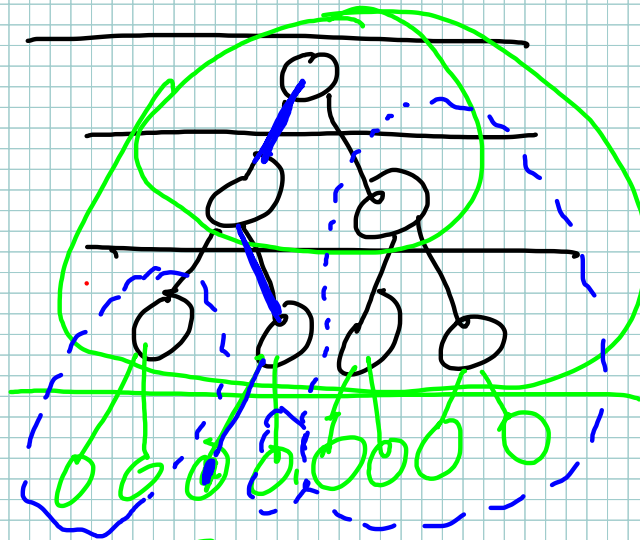




FULL

COMPLETE

PERFECT

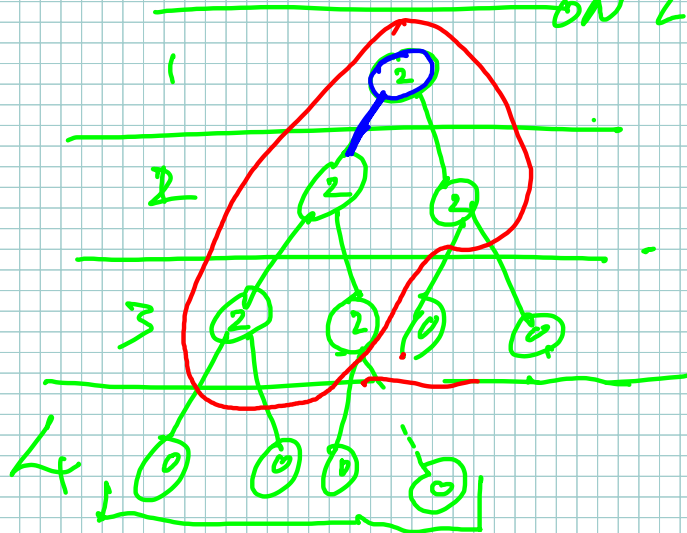


ALL INTERNAL
NODES HAVE
2 CHILDREN
↓
ALL LEAF
NODES
ARE AT
1 SAME LEVEL

PERFECT, COMPLETE, FULL

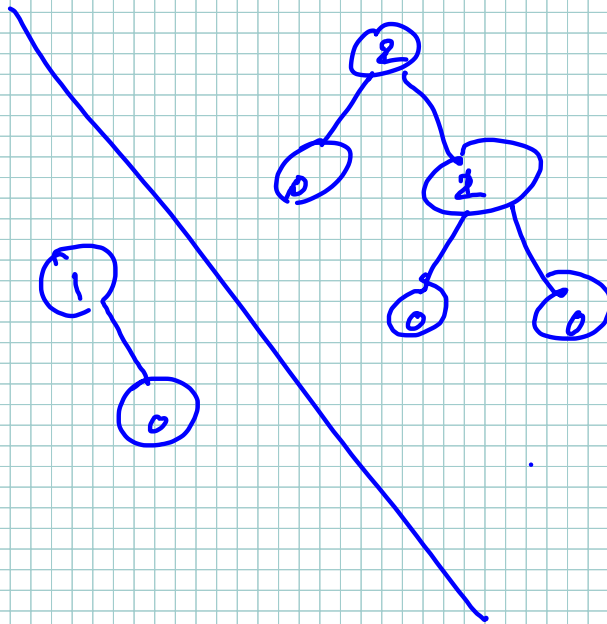
COMPLETE

IF ALL LEVELS, EXCEPT
LAST LEVEL CONTAIN
ALL POSSIBLE NODES.
AND THE LAST LEVEL
ALL NODES ARE CLUSTERED
ON LEFT

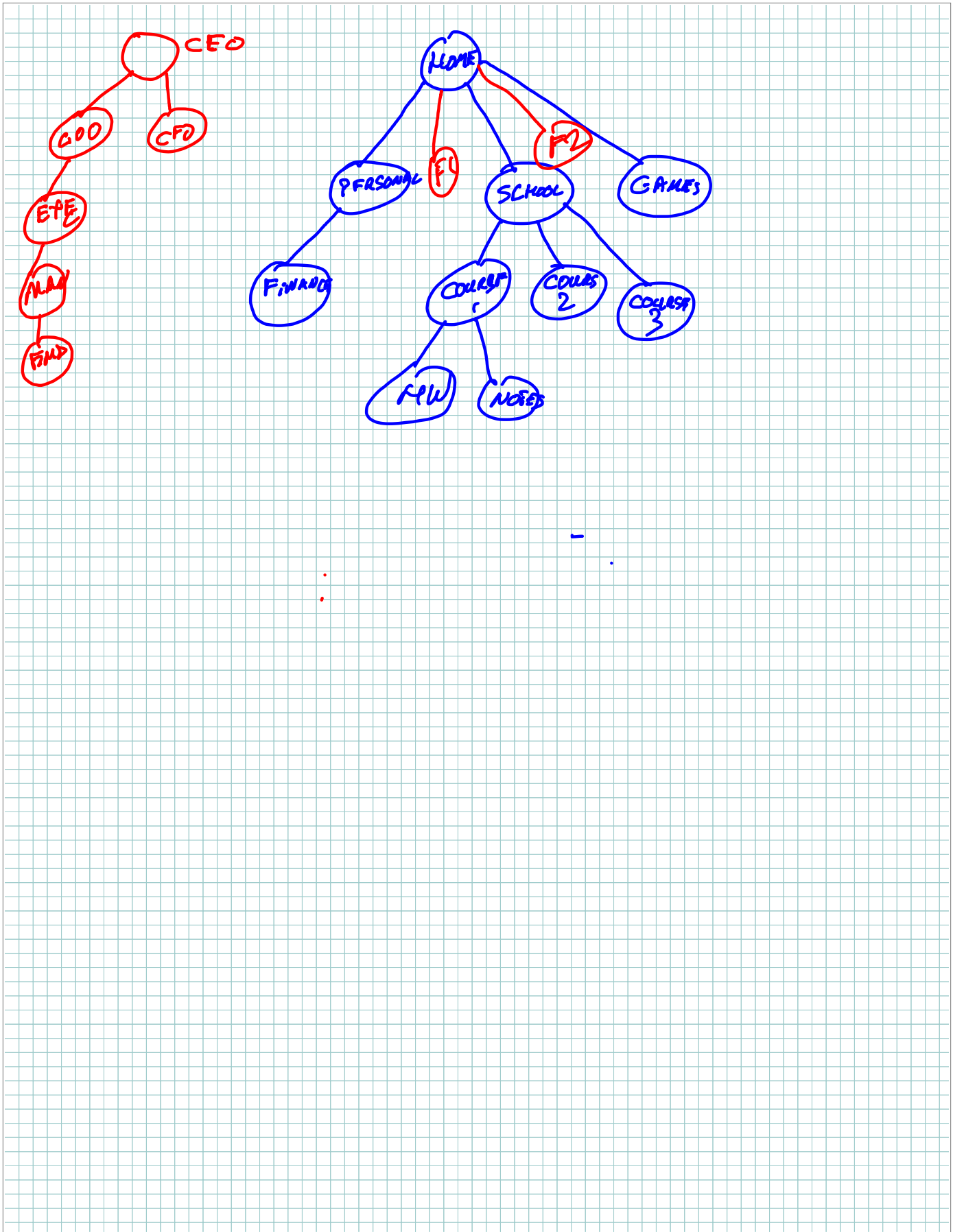


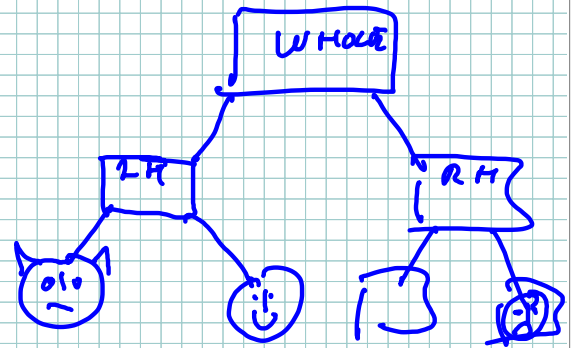
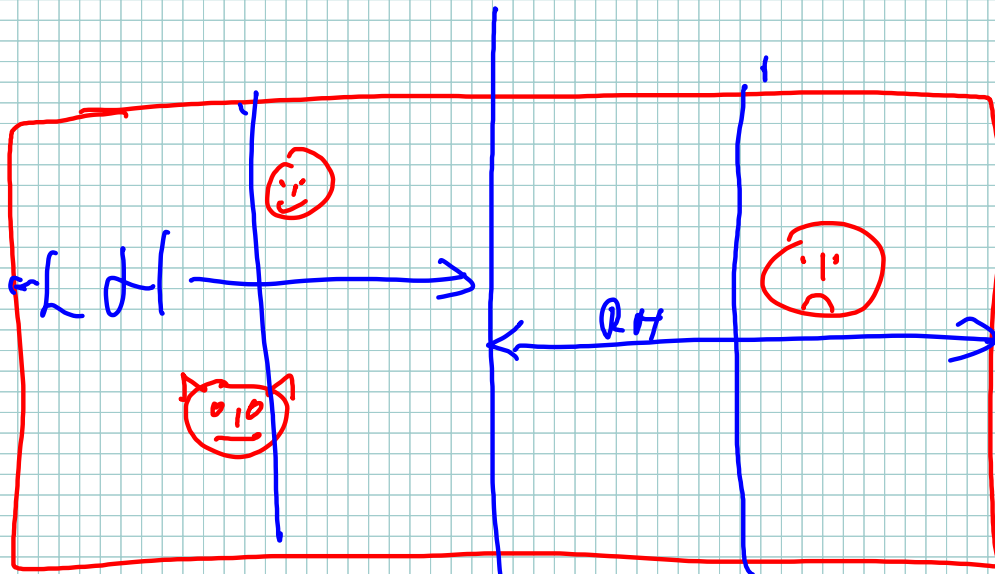
COMPLETE, FULL

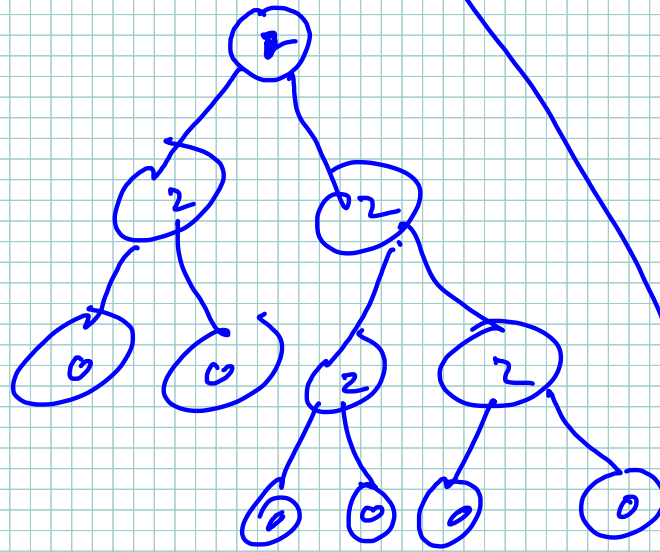
FULL
EVERY NODE HAS
0 OR 2 CHILDREN



~

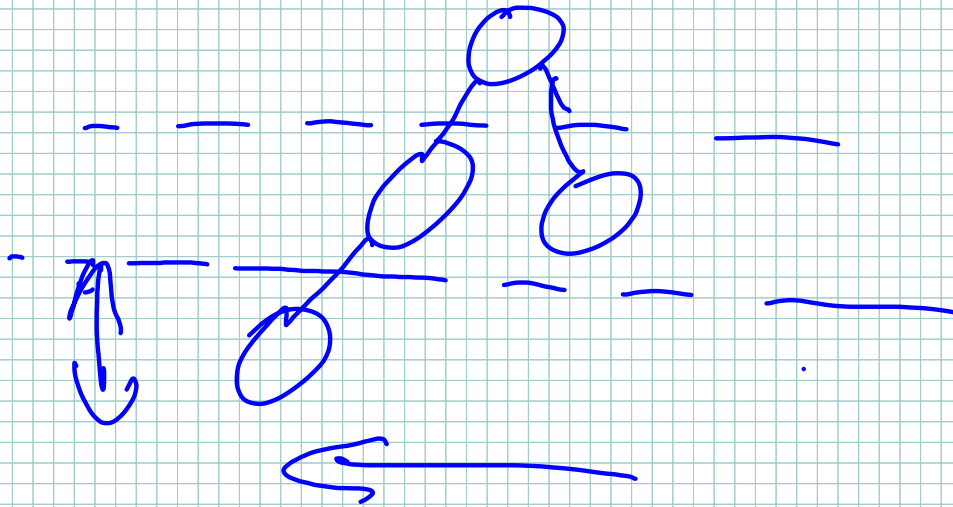






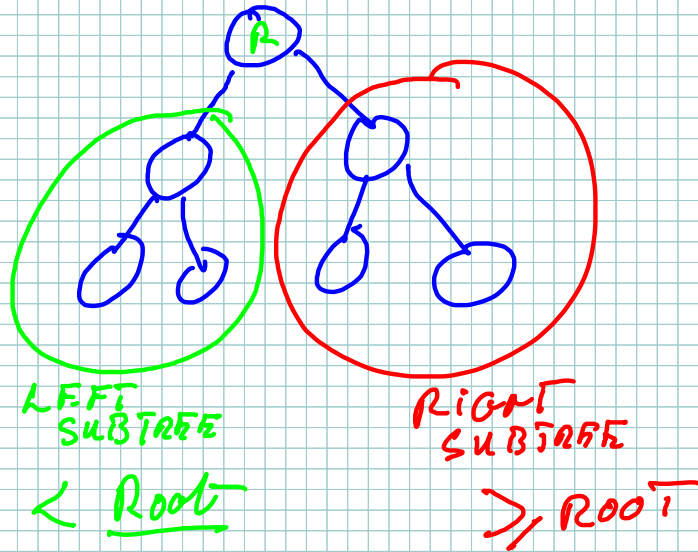
0
F, C, P

~~COMPLETE~~



COMPLETE

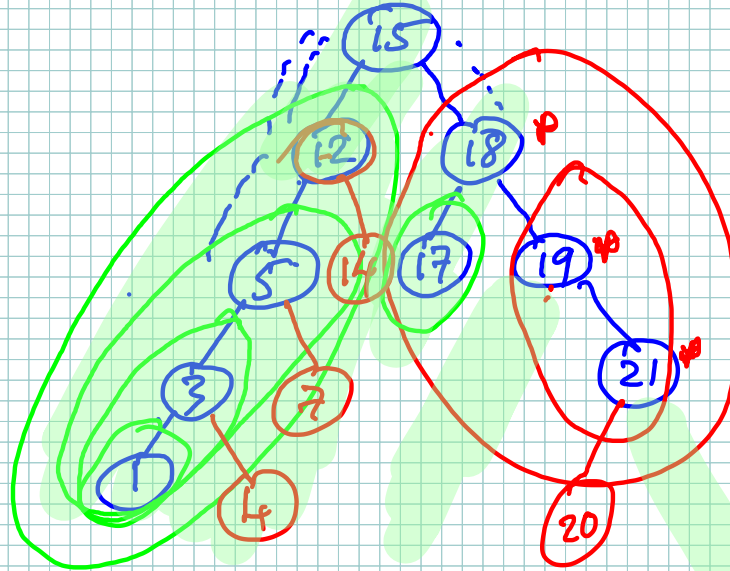
BINARY SEARCH TREE



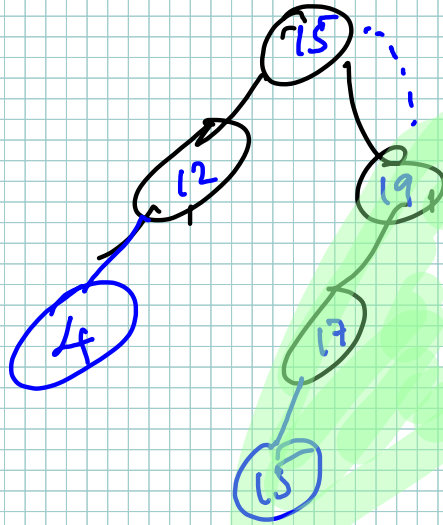
BINARY SEARCH TREE (BST)

15, 18, 12, 19, 5, 3, 1, 17, 21, 14, 7, 20,

14



15, 12, 19, 17, 15, 4



$$\log_2 8 = 3$$

$$2^3 = 8$$

1, 2, 3, 4, 5, 6, 7

7, 6, 5, 4, 3, 2, 1

