

CS & IT ENGINEERING

Data Structure



Tree
Chapter- 5
Lec- 06

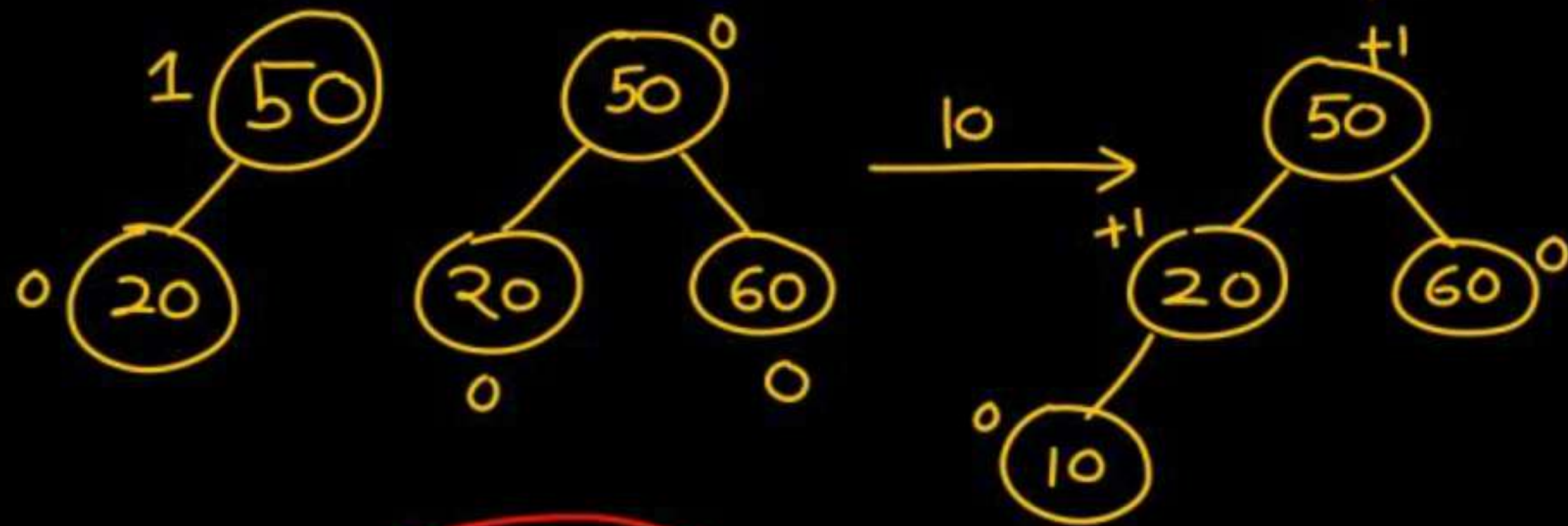


By- Pankaj Sharma sir

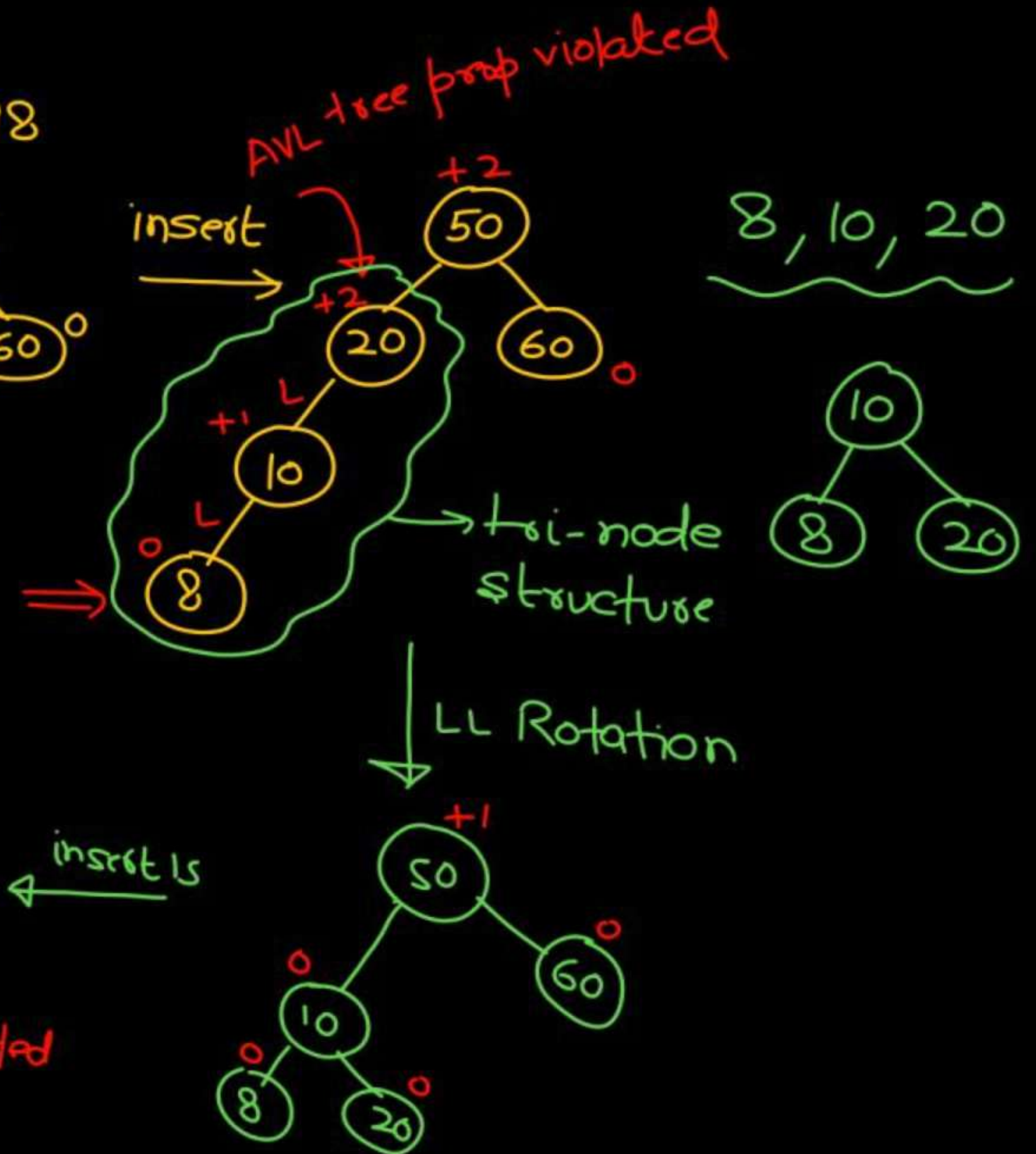
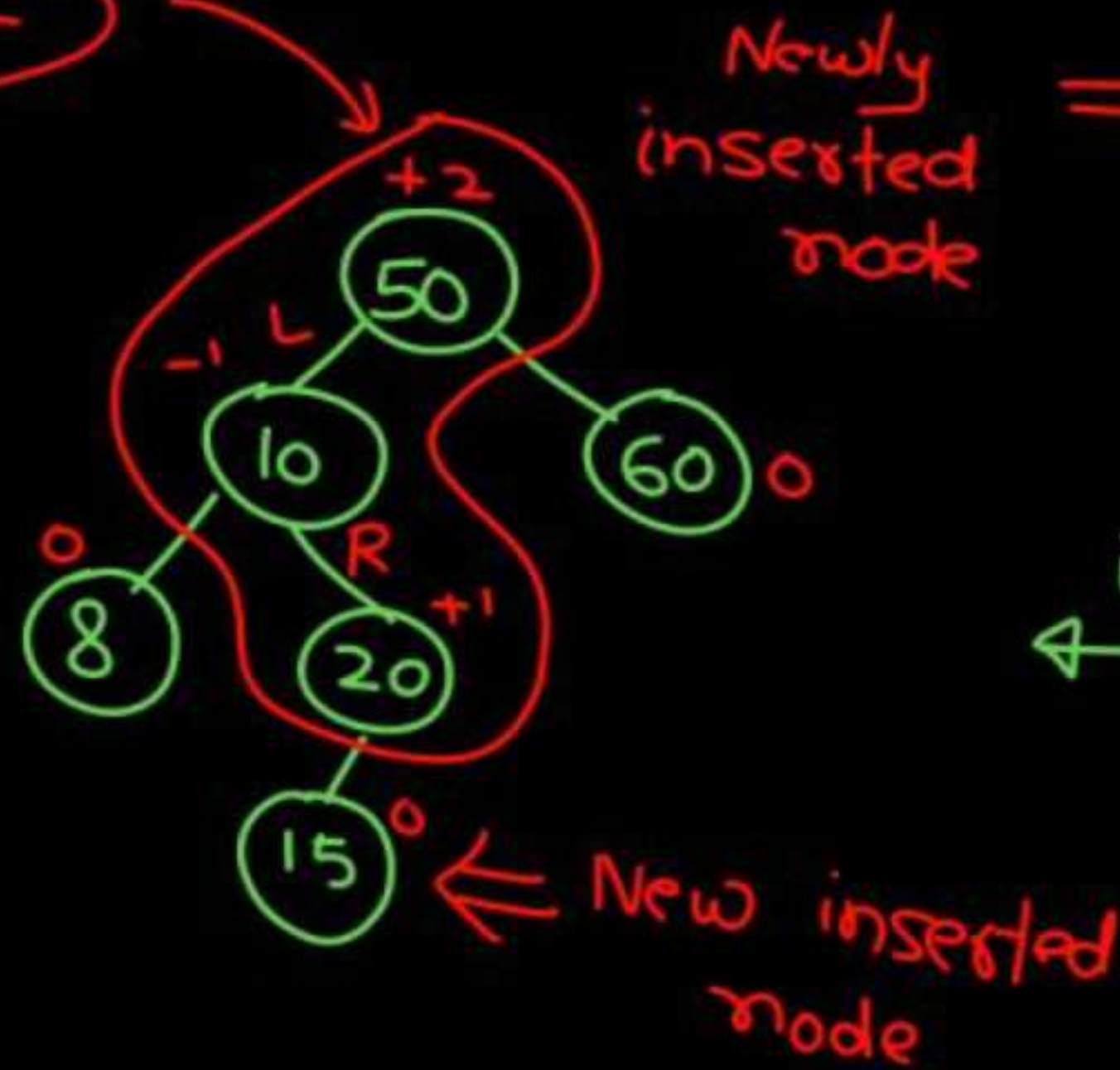
TOPICS TO BE
COVERED

Tree-VI

Q1. 50, 20, 60, 10, 8, 15, 32, 46, 11, 48

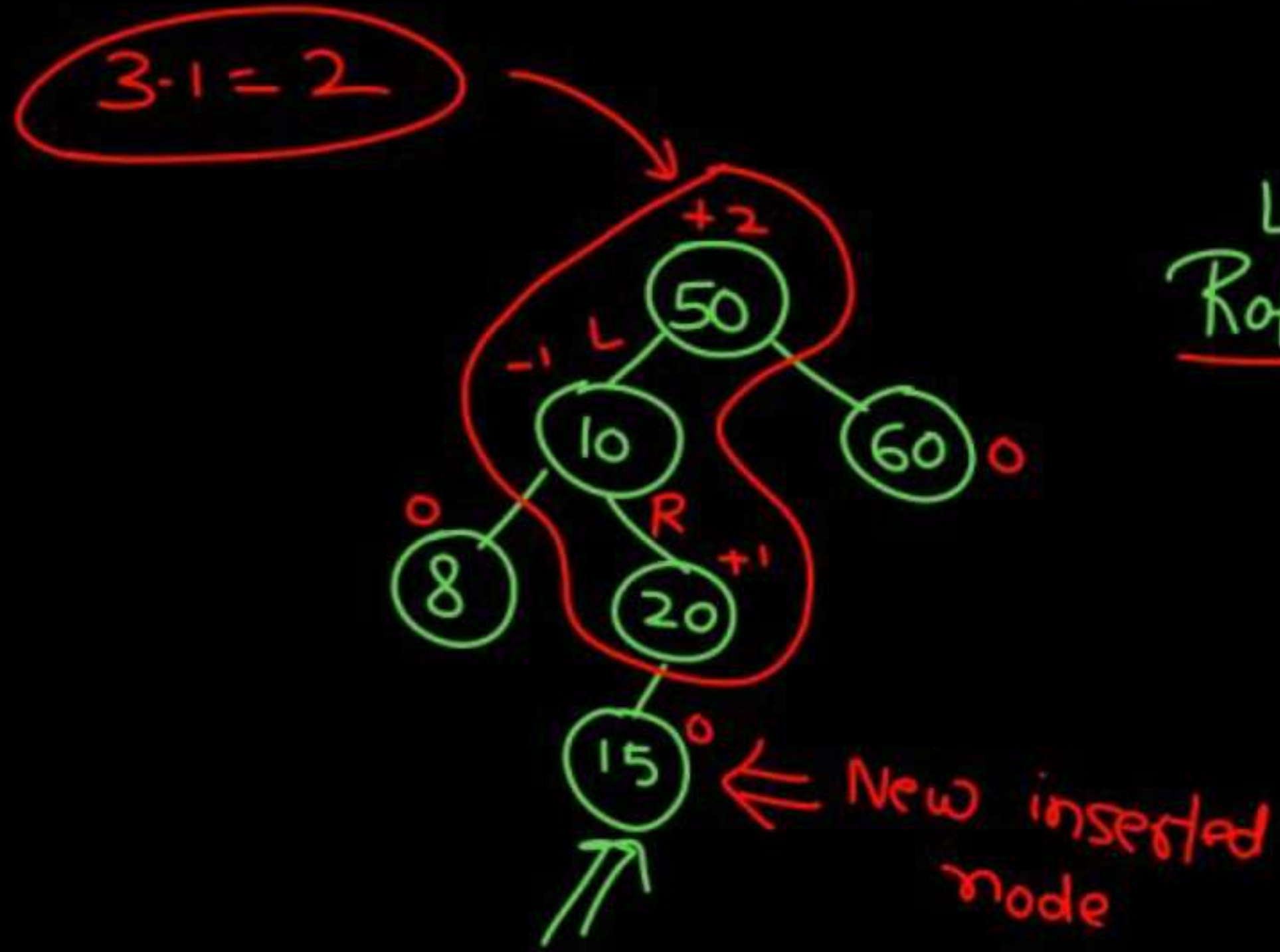
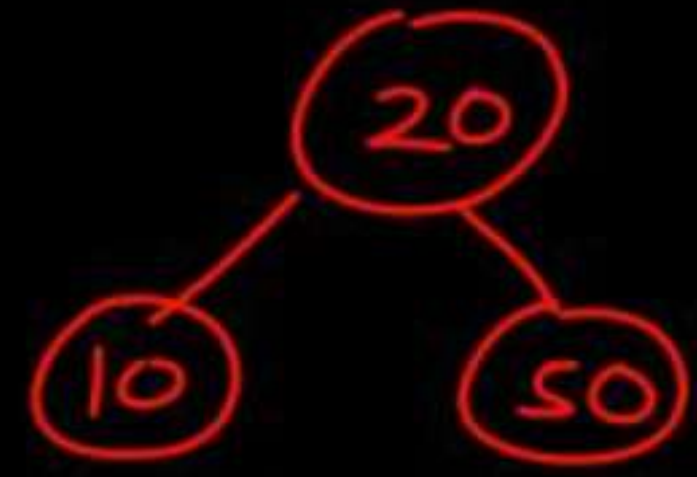


$$3 - 1 = 2$$

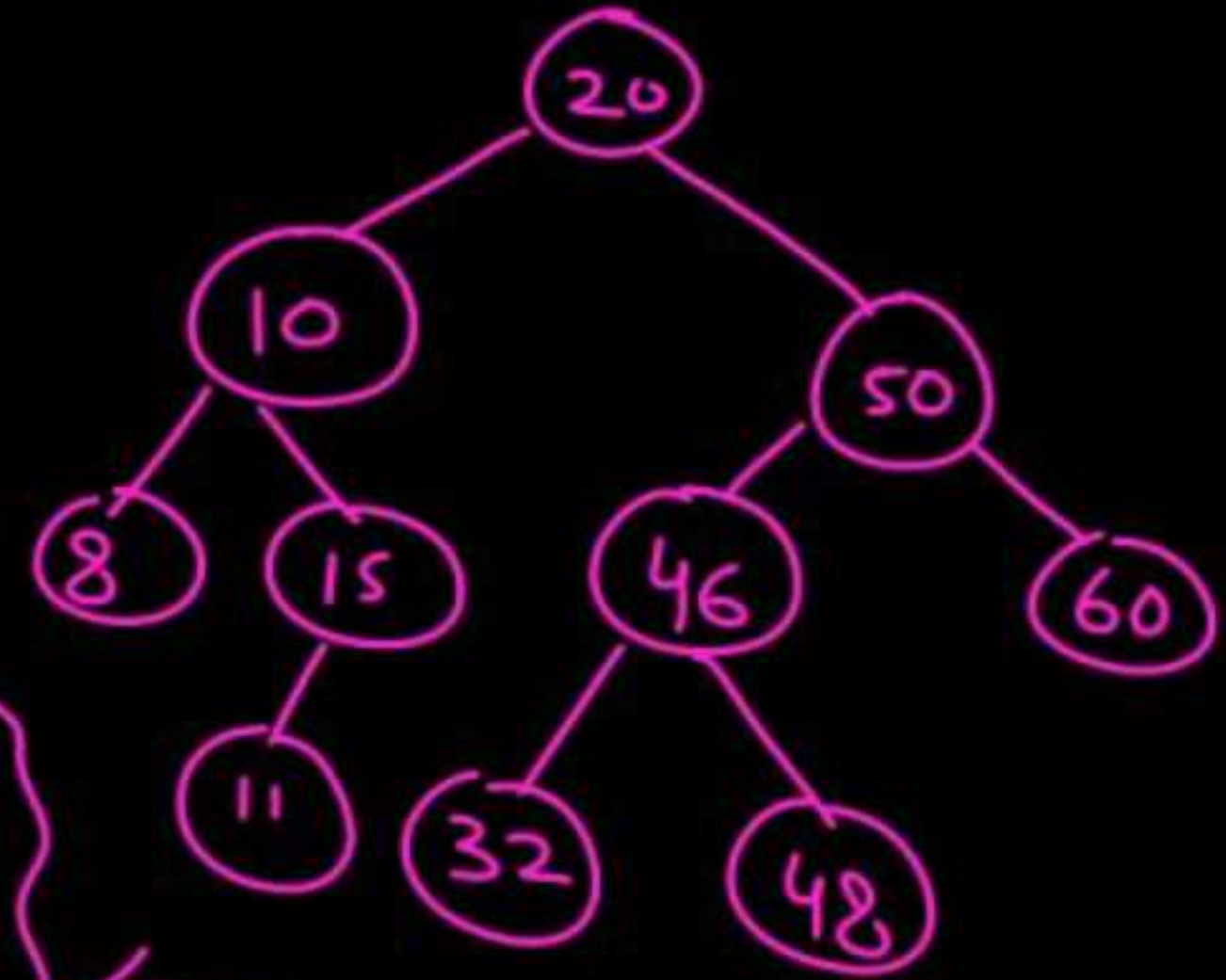
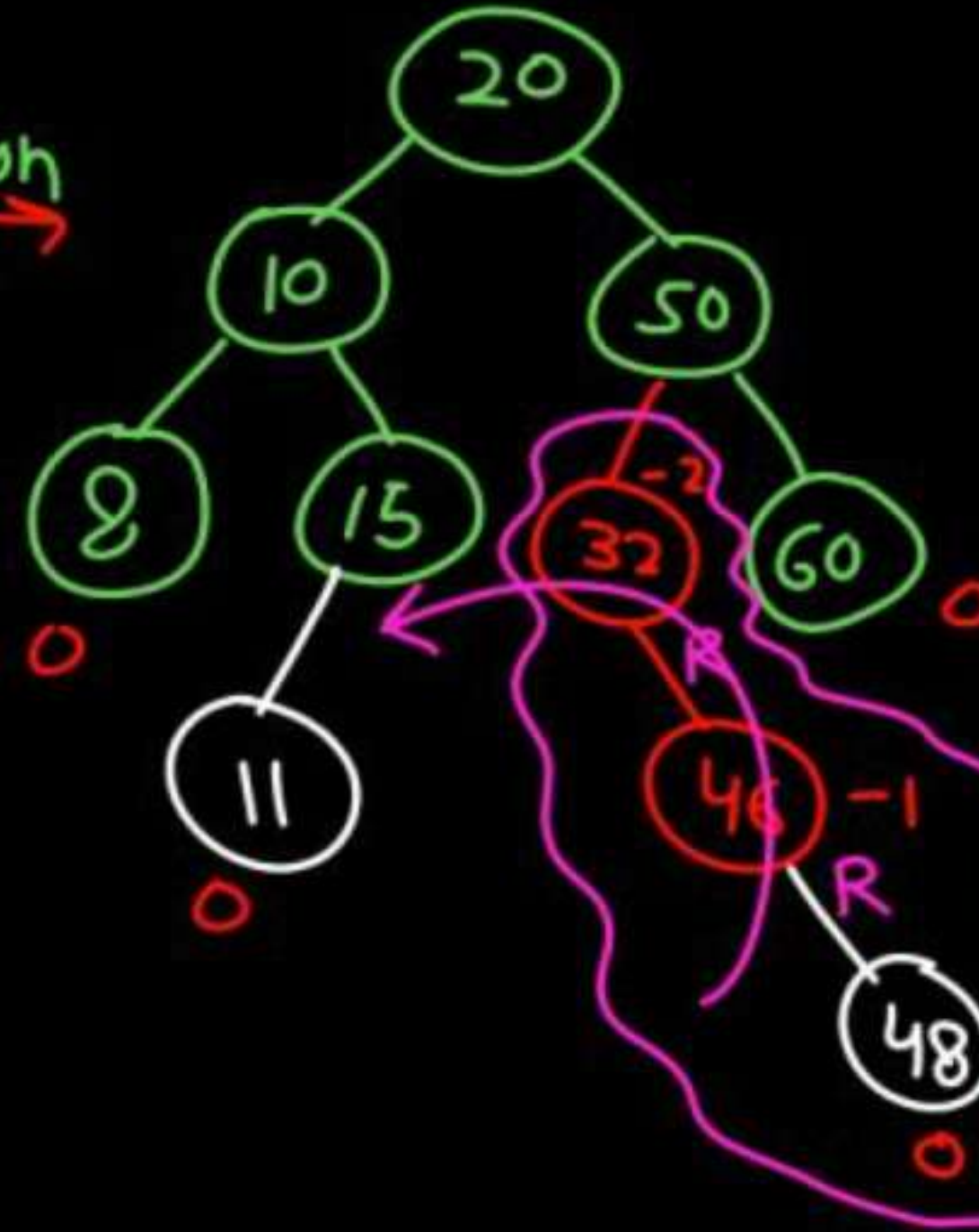


50, 20, 60, 10, 8, 15, 32, 46, 11, 48 ✓ ✓

10, 20, 50

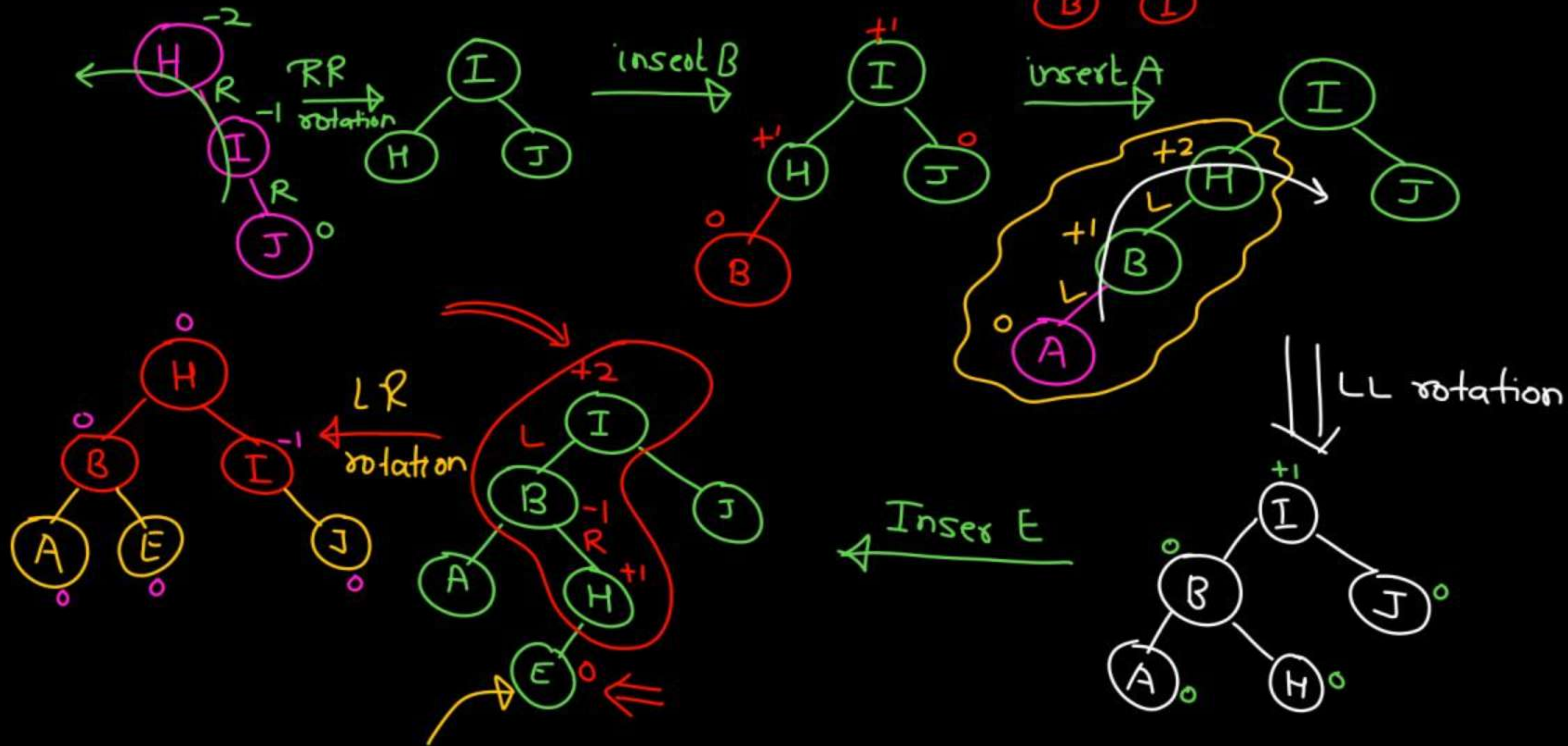


LR
Rotation



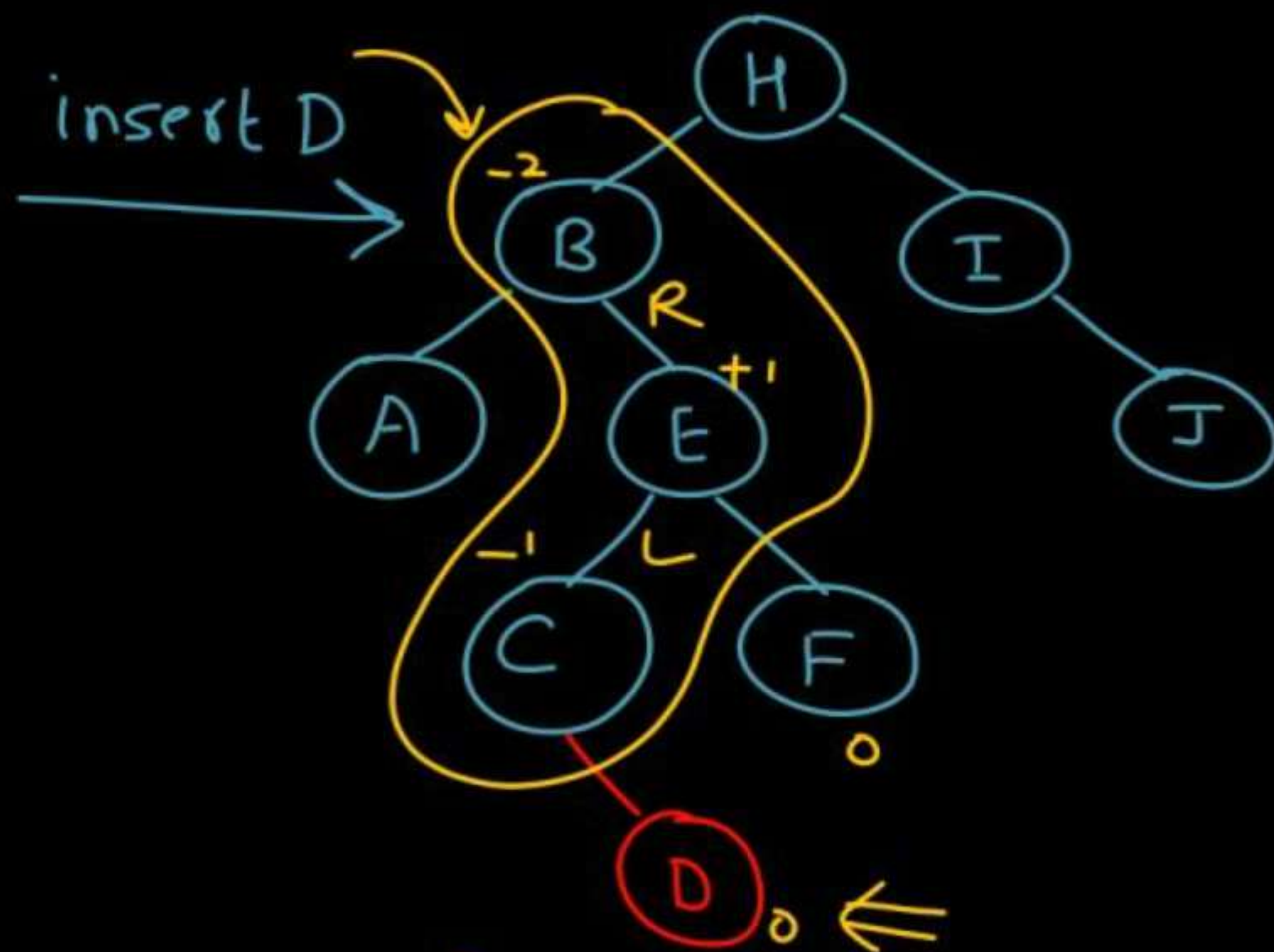
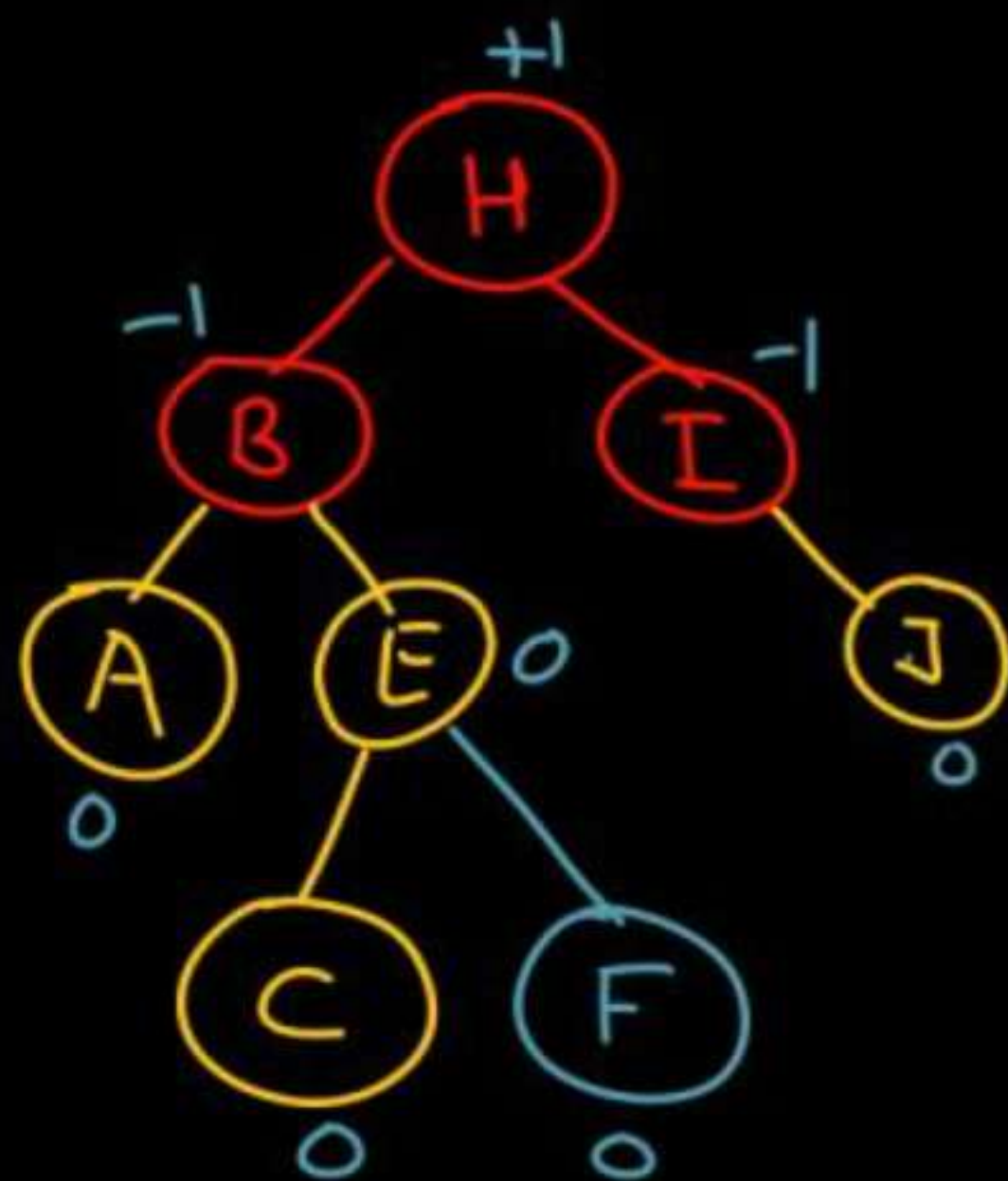
Q2:

H, I, J, B, A, E, C, F, D, G, K, L



Q2:

H, I, J, B, A, E, C, F, D, G, K, L

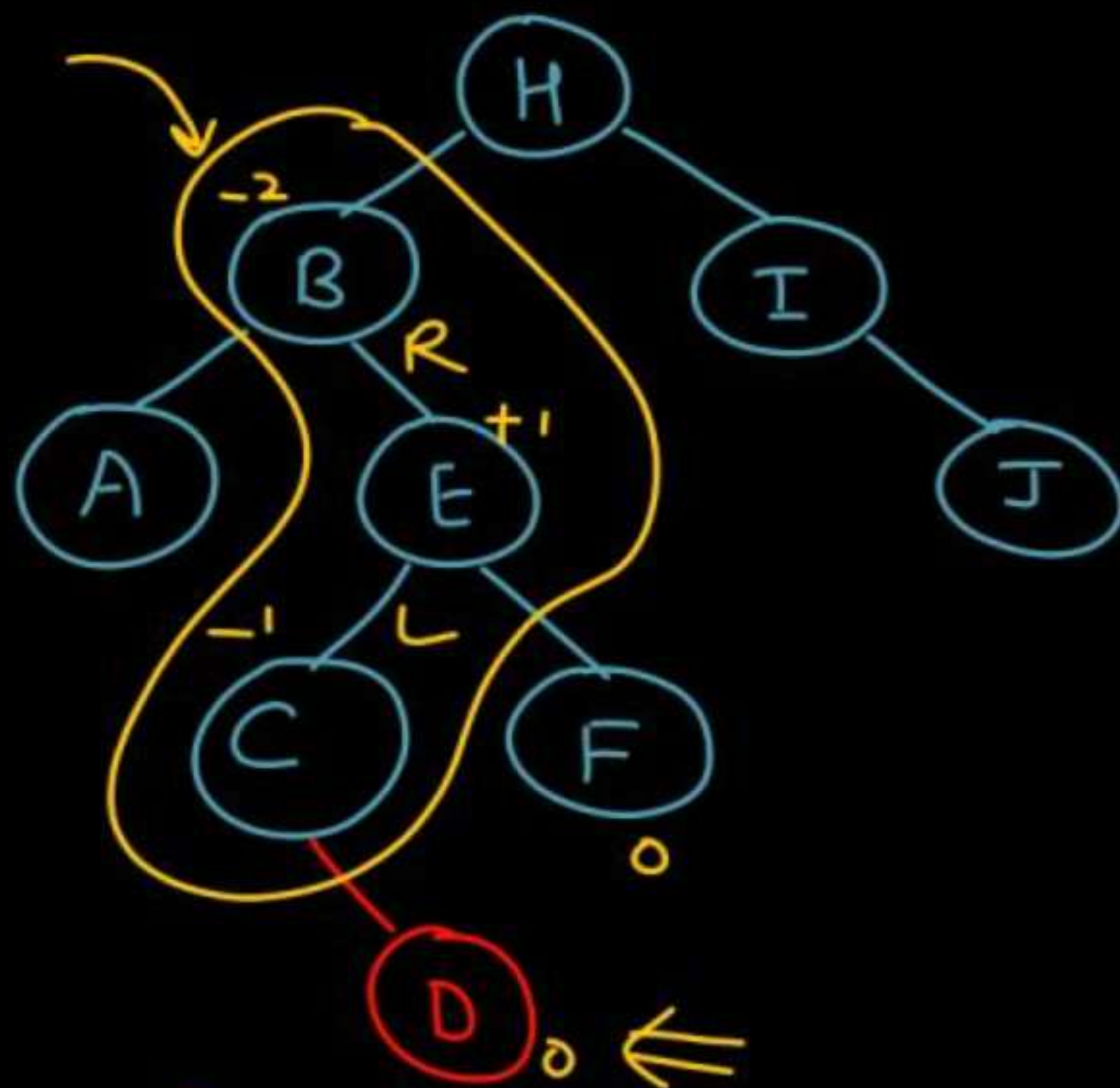
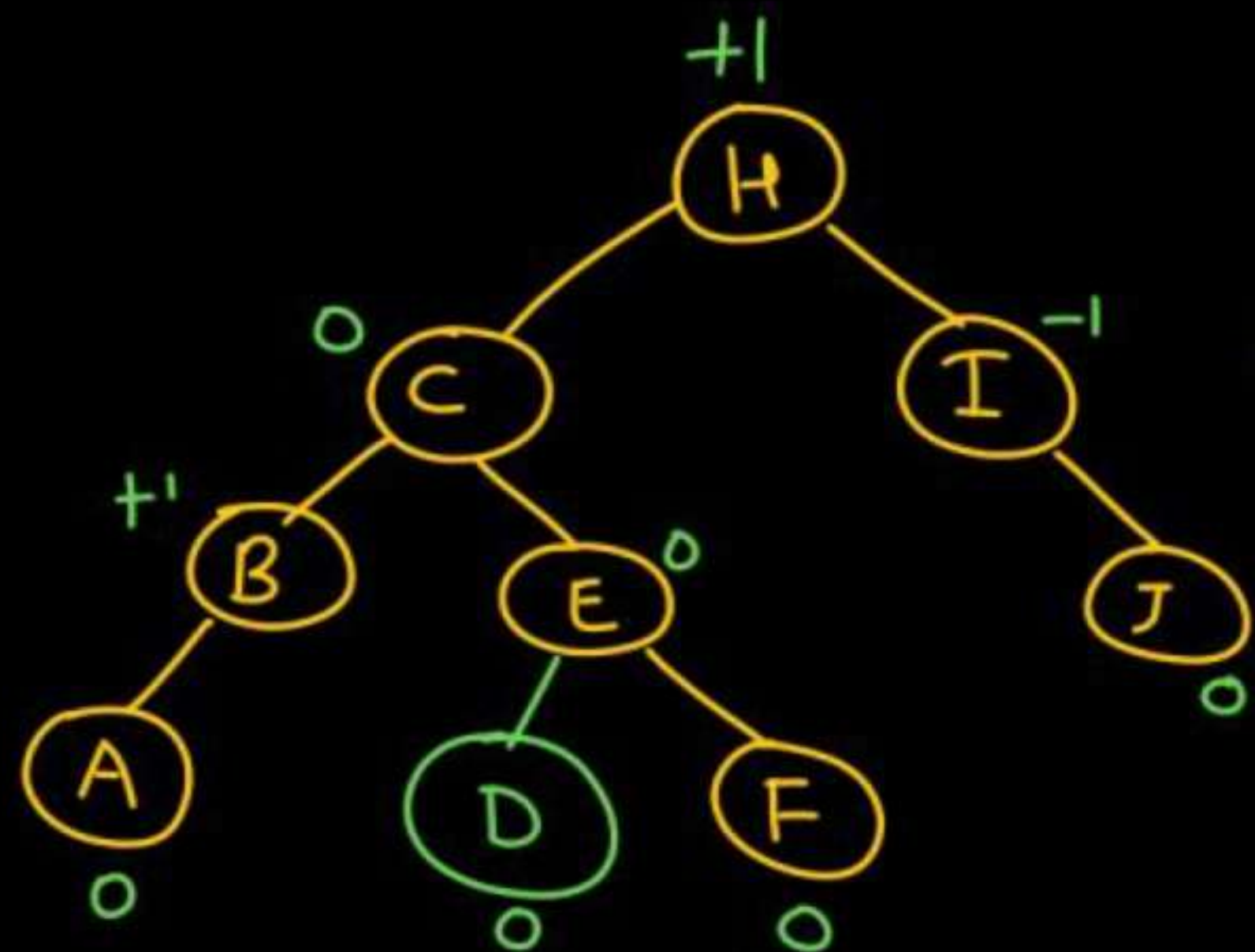


D is in the left subtree of
the right subtree of B

Q2:

H, I, J, B, A, E, C, F, D, G, K, L

B, C, E



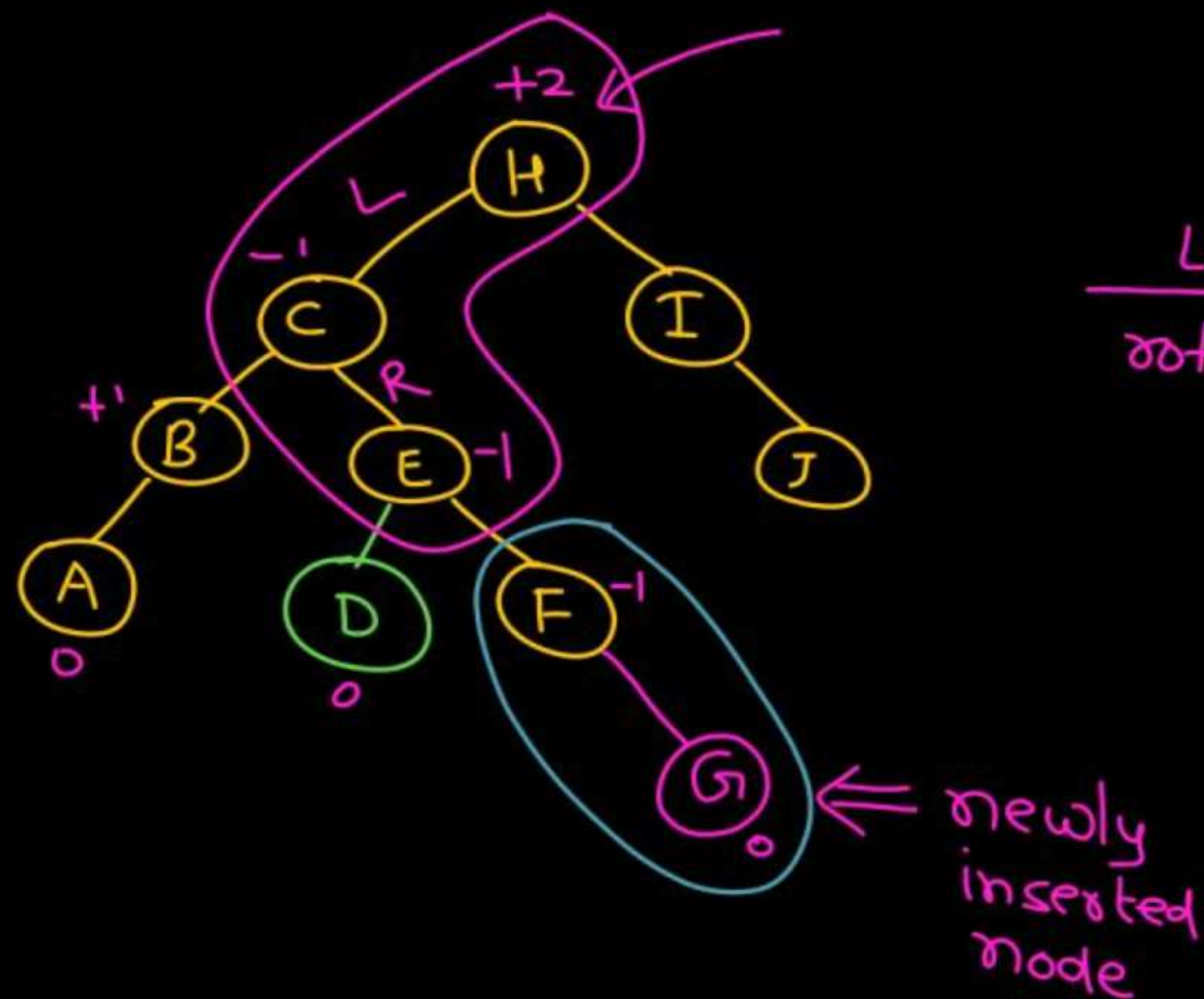
D is in the left subtree of
the right subtree of B

Q2:

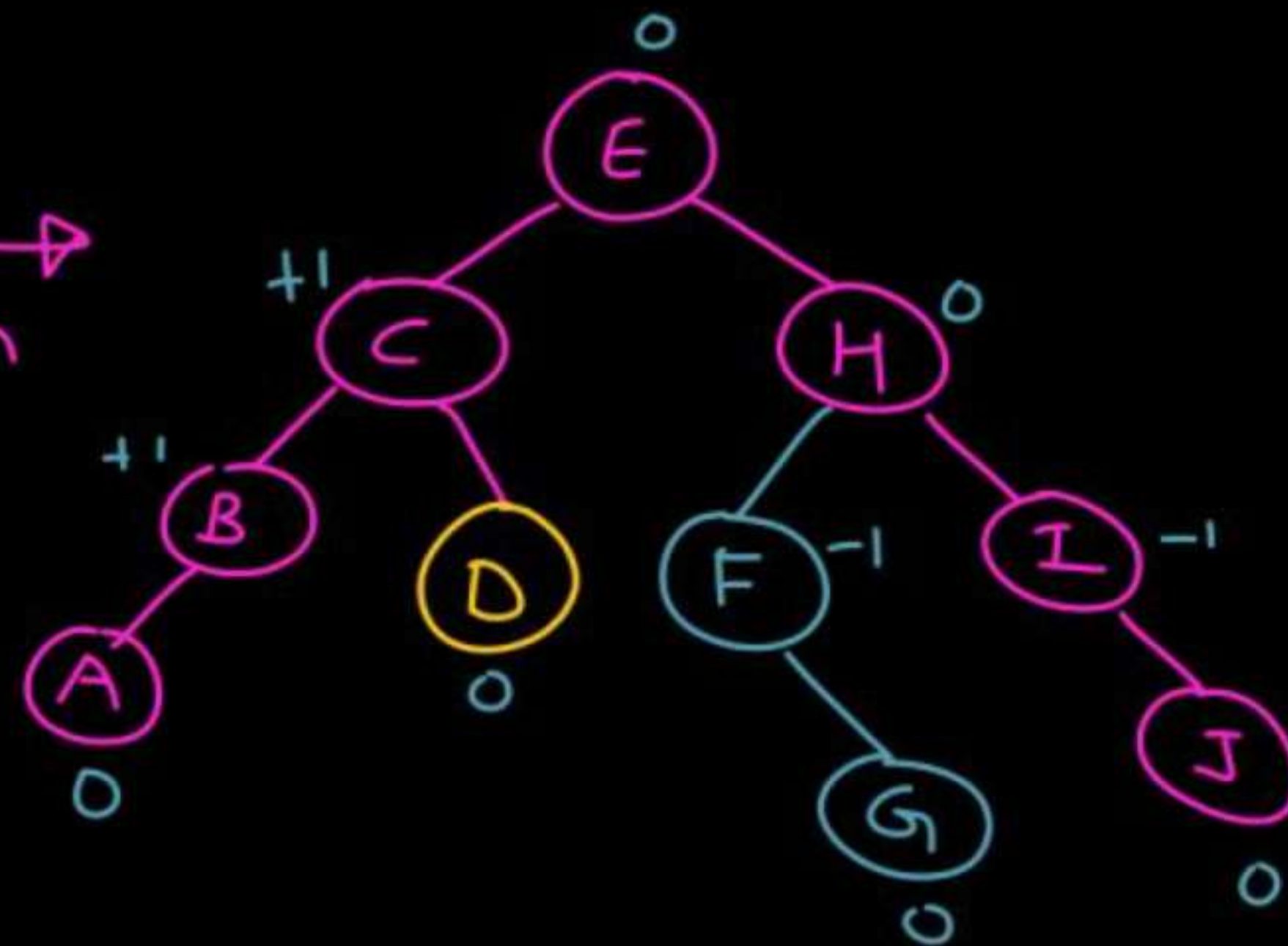
H, I, J, B, A, E, C, F, D, G, K, L

C, E, H

B, C, E



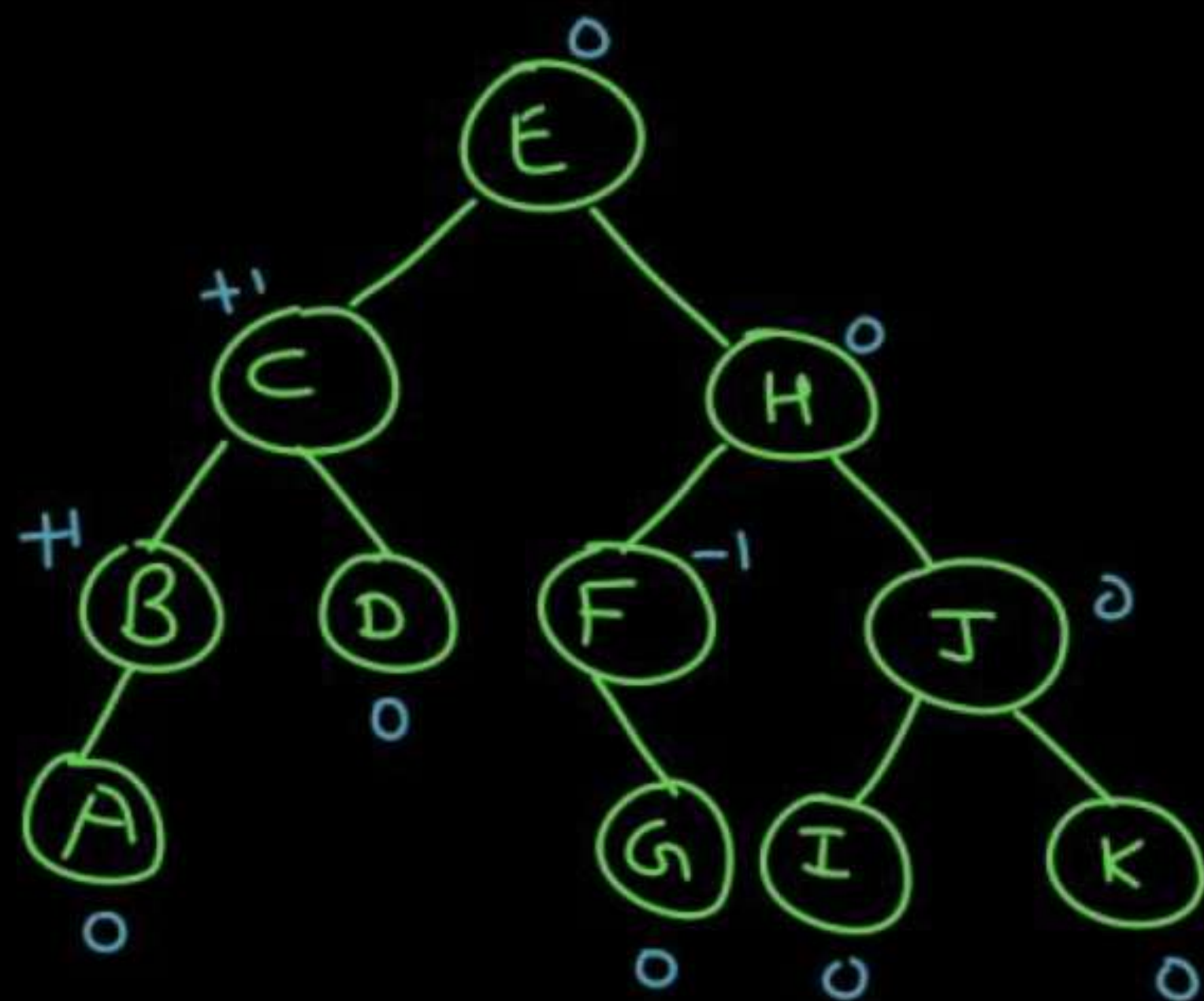
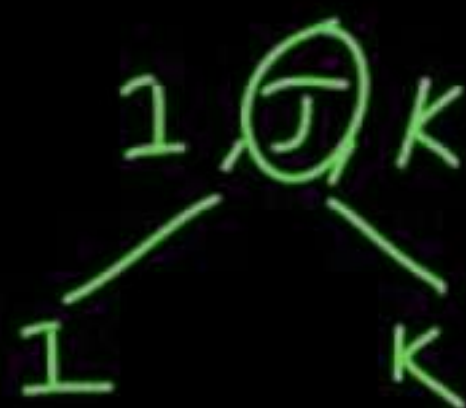
LR
rotation



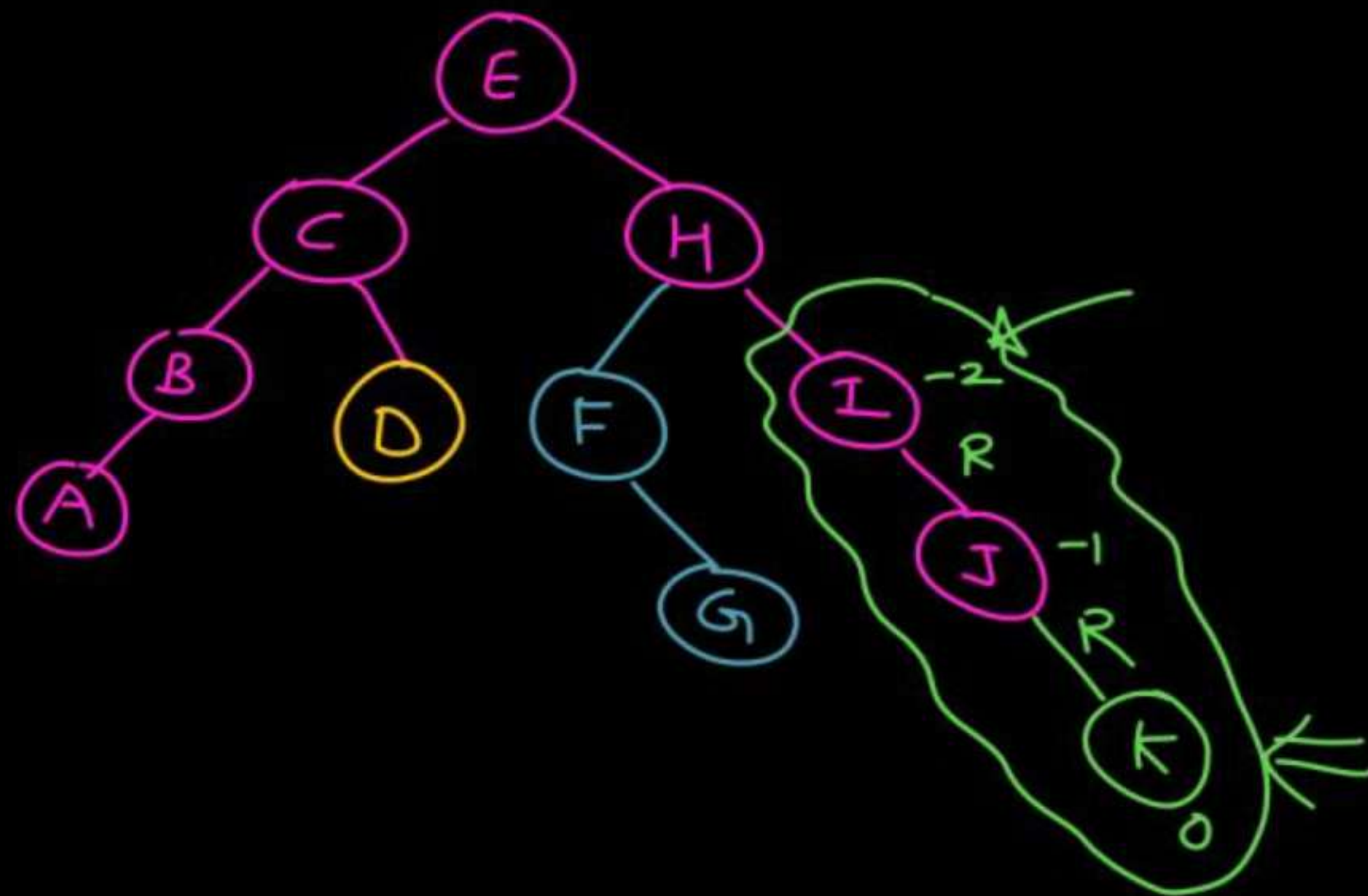
Q2:

H, I, J, B, A, E, C, F, D, G, K, L

C, E, H



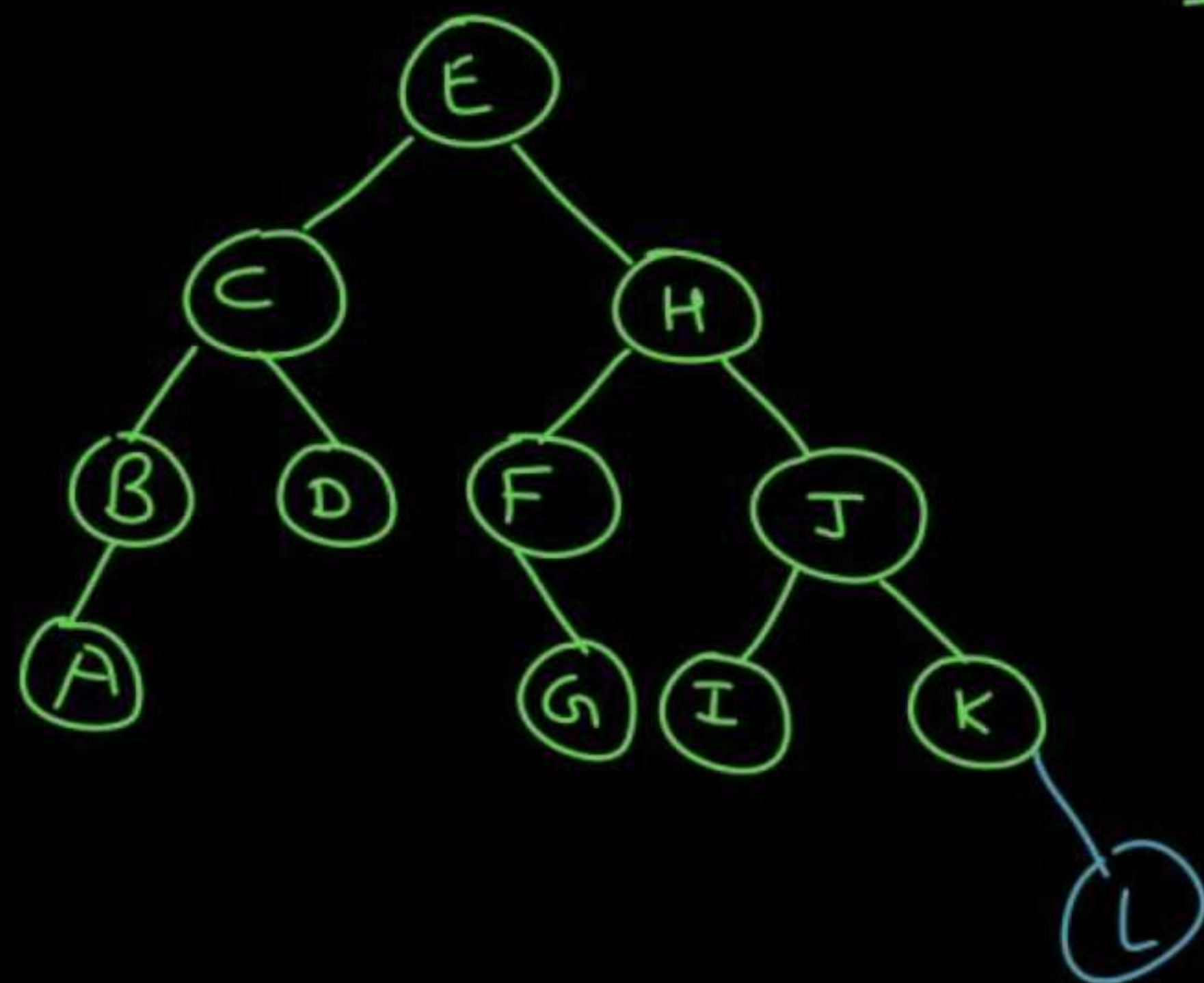
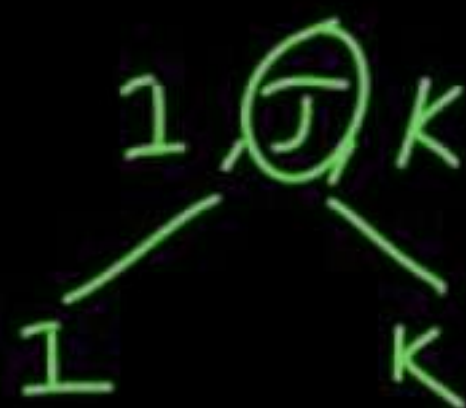
RR
rotation



Q2:

H, I, J, B, A, E, C, F, D, G, K, L

C, E, H

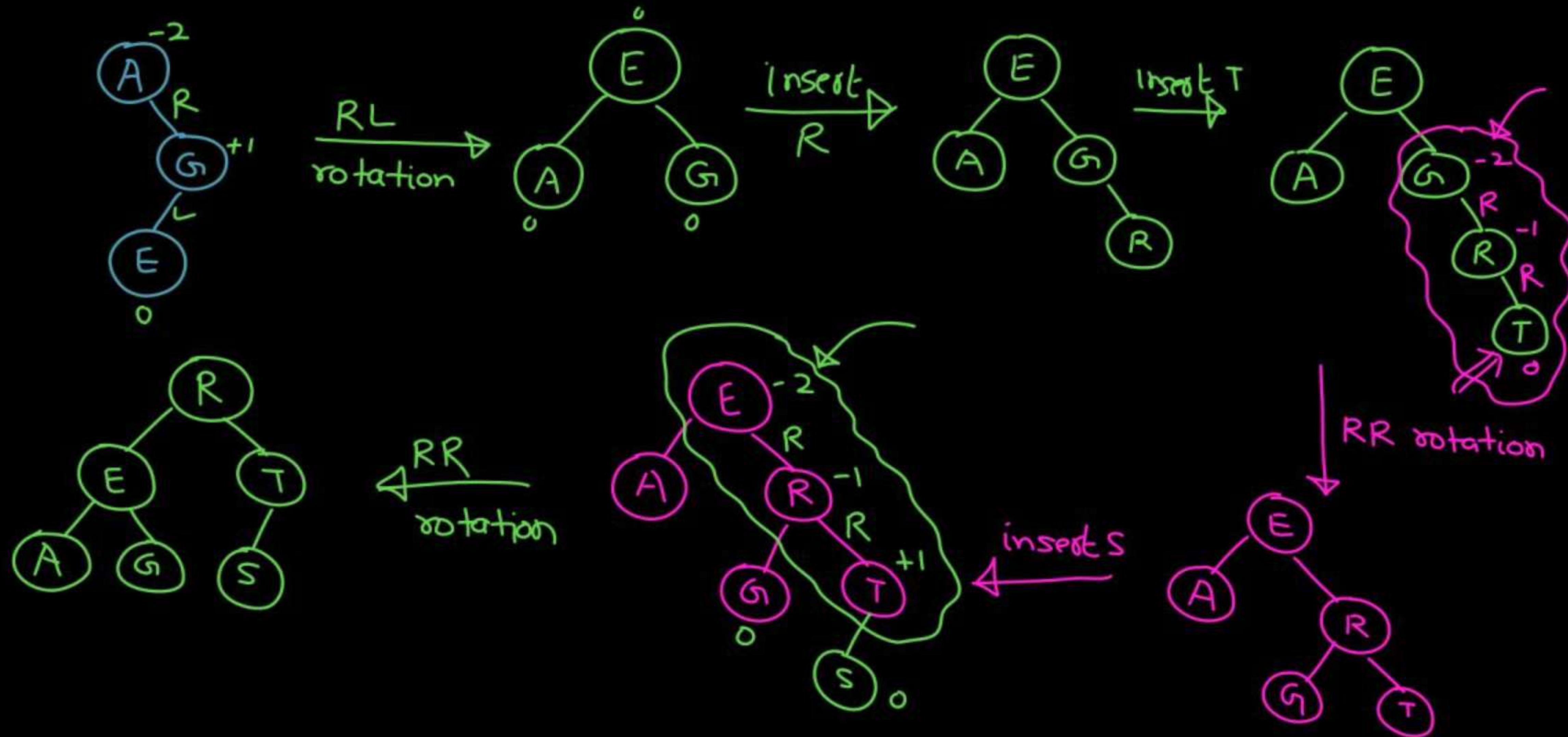


Q3

A G E R T S [✓] P [✓] Q W C M D X

A, E, G

G, (R) T

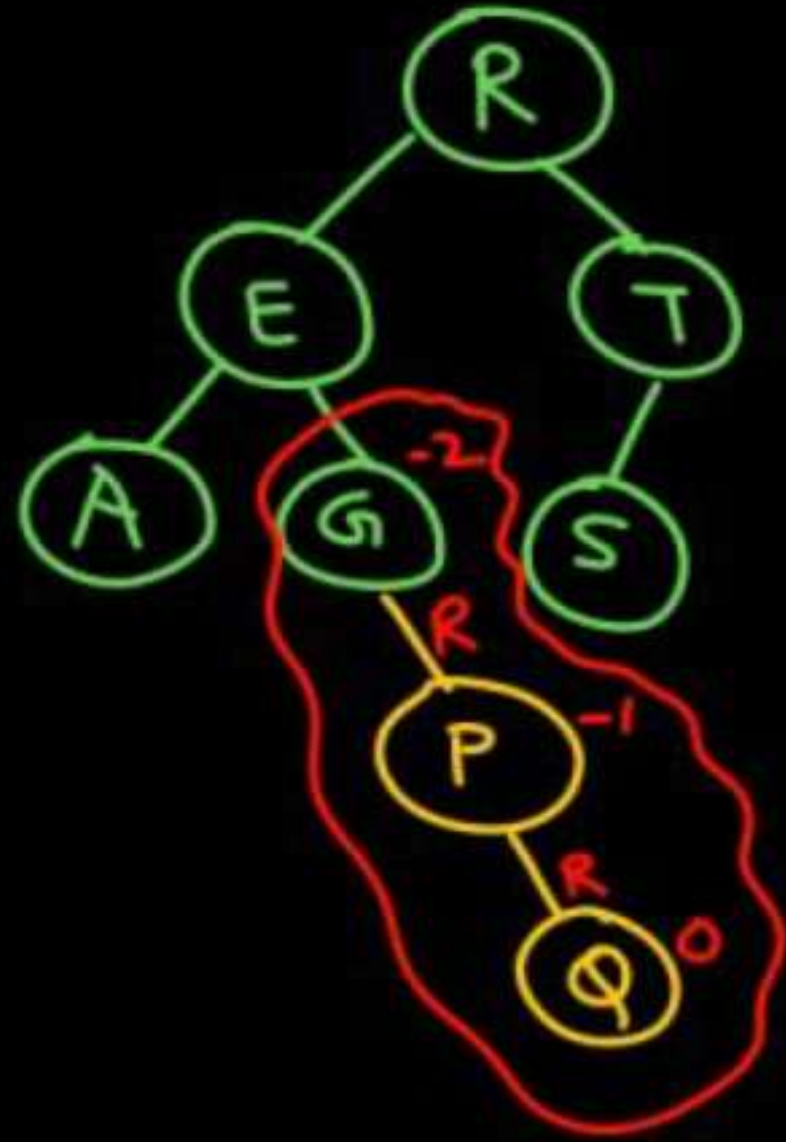


Q3

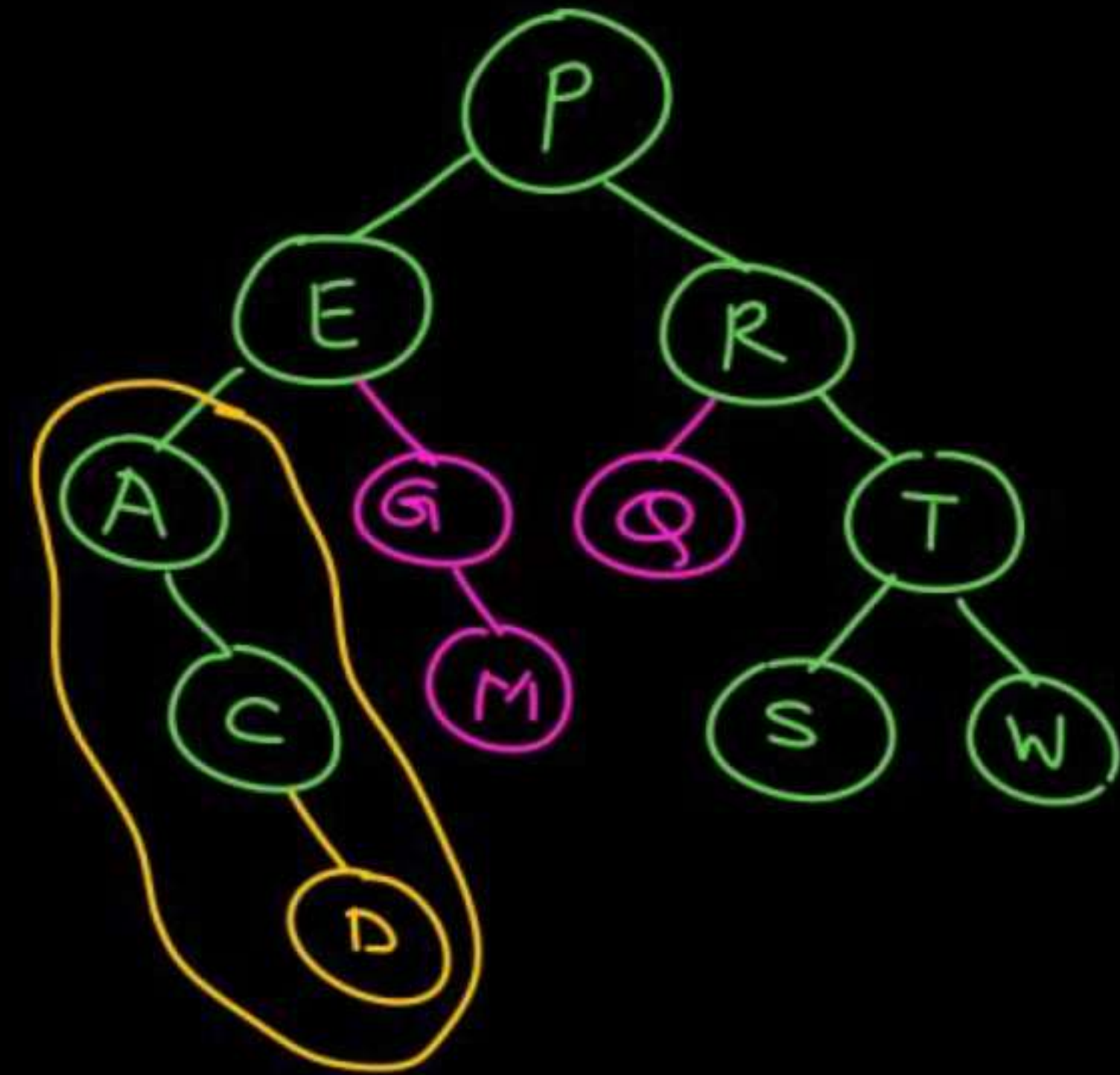
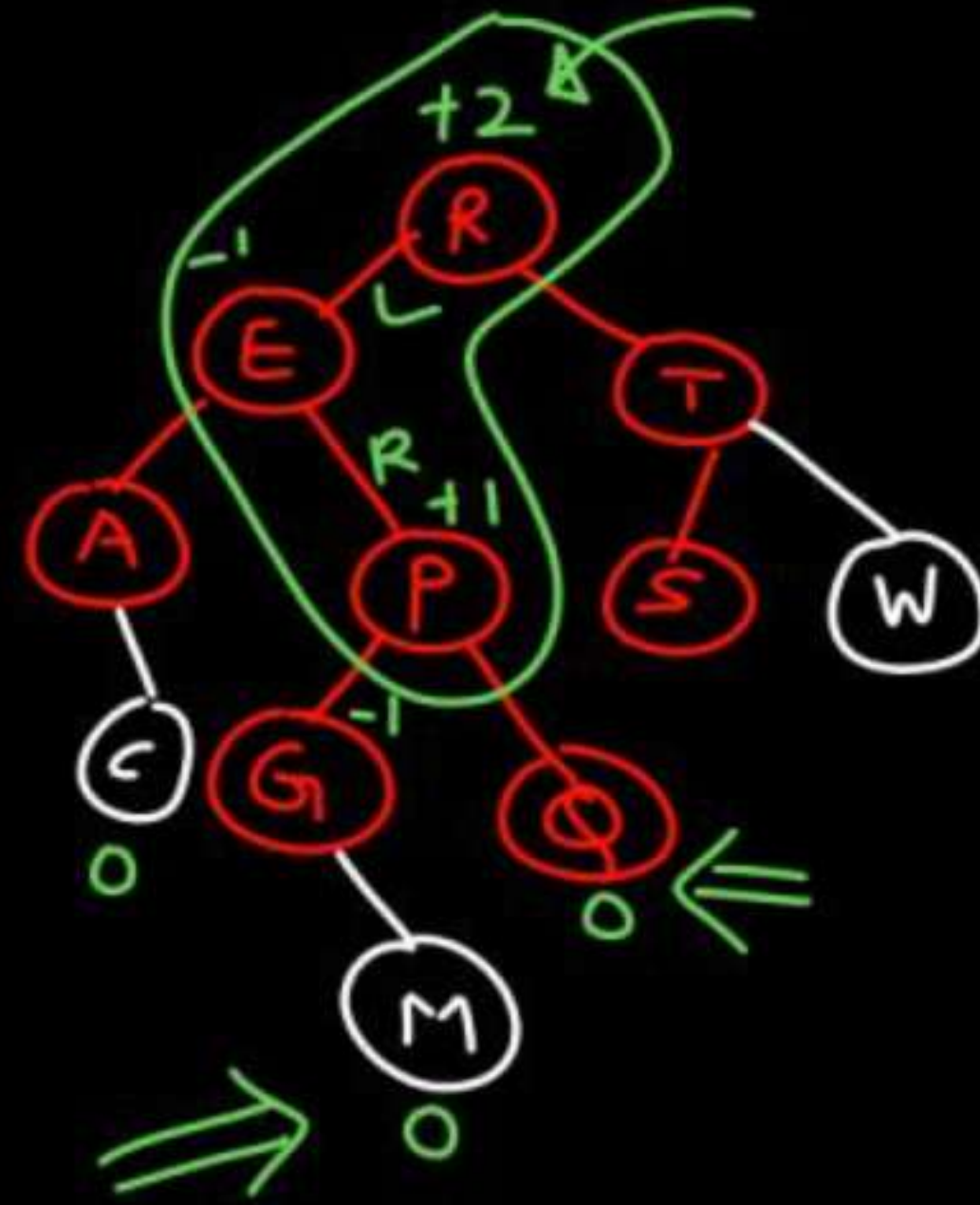
A G E R T S [✓] P [✓] Q [✓] W [✓] C [✓] M [✓] D X

A, E, G

E, P, R



RR
rotation

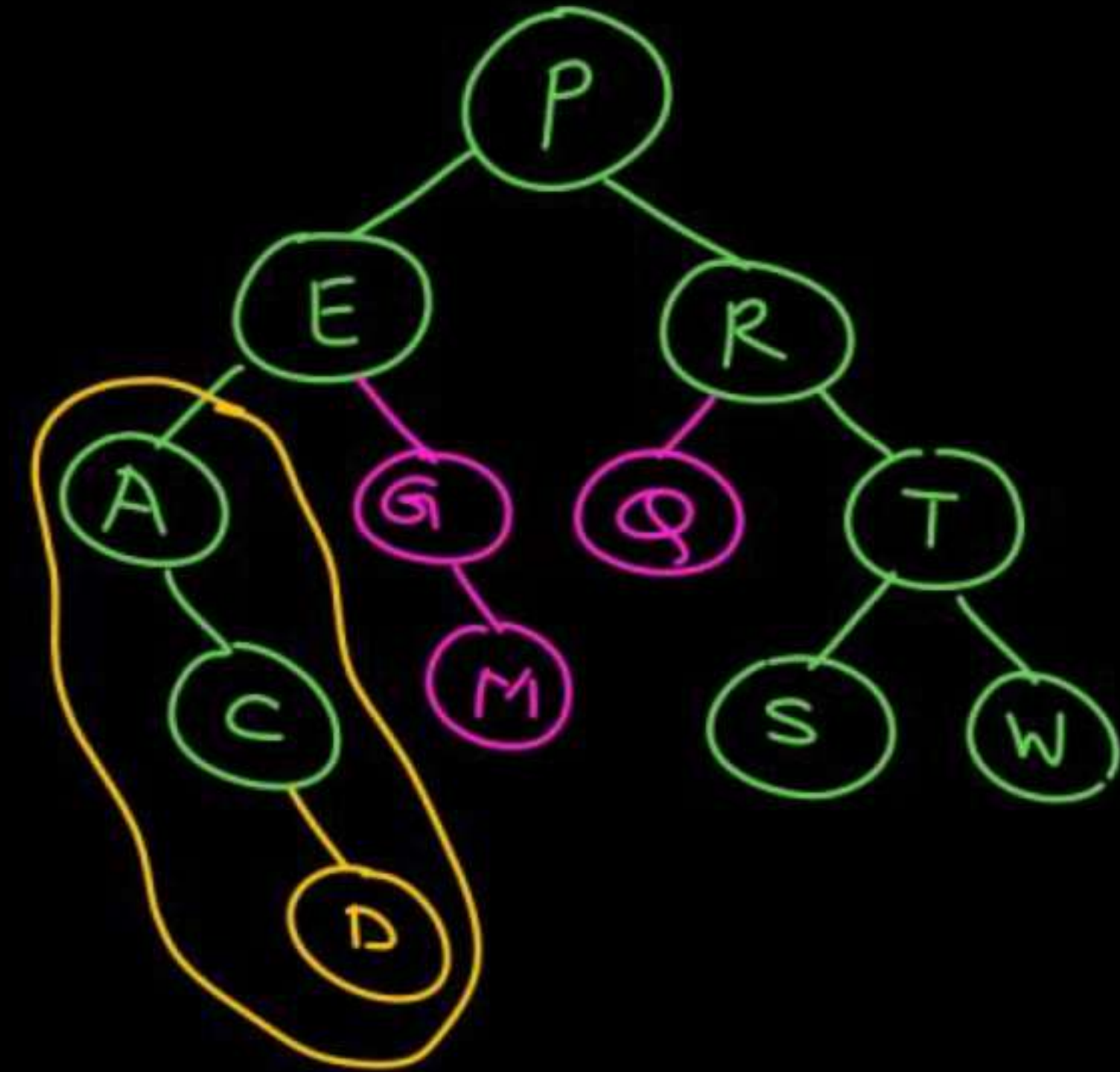
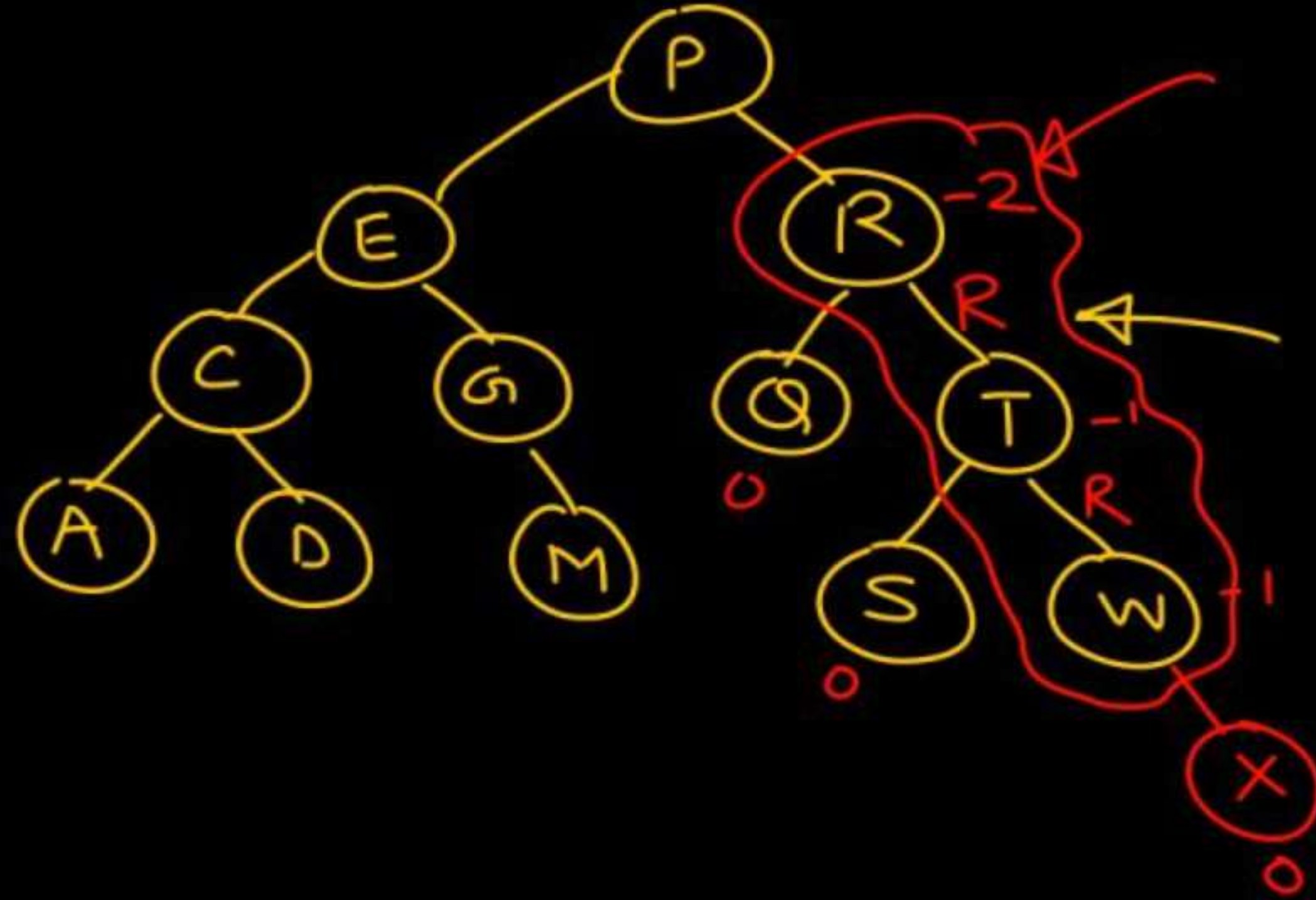


Q3

A G E R T S [✓] P [✓] Q [✓] W [✓] C [✓] M [✓] D X

A, E, G

E, P, R



100% \rightarrow 99.99% \rightarrow 1000%
 E, P, R

A, E, G

Q3: A G E R T S P Q W C M D X

