

Red - Black Trees

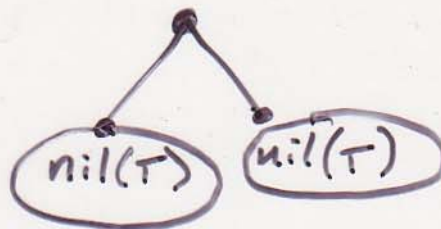
$$\text{height} \leq 2 \lg(n+1)$$

↑
of elements
in the tree

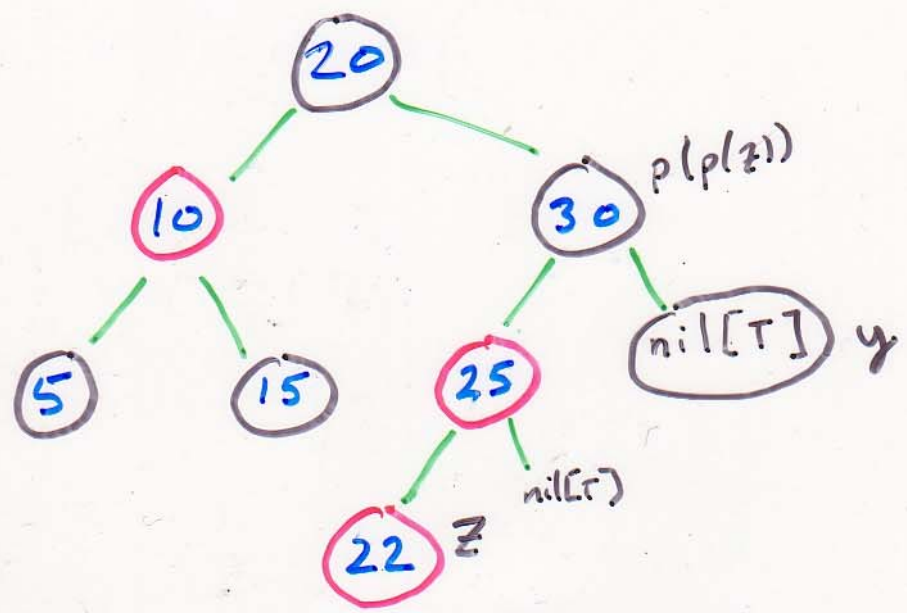
Insertion + Deletion

- new methods must be provided so that red-black properties are maintained.

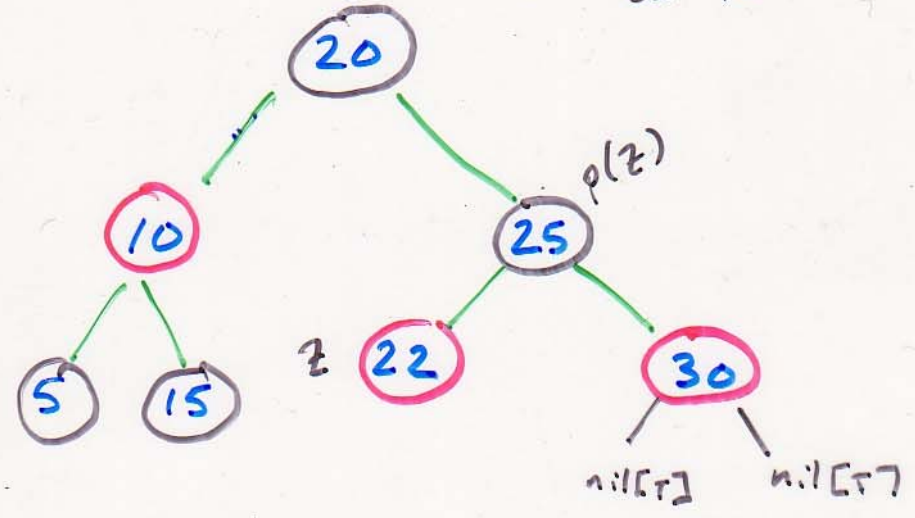
Leaf Nodes are set to a sentinel



Example : Insertion



⇓ Right-rotation on 30



Deletions

- start of with

a "normal" deletion

- then repair tree...