

x a pointer to some object

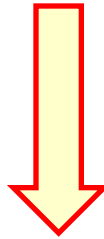
operations that access and/or modify the fields of

DISK - WRITE(x)

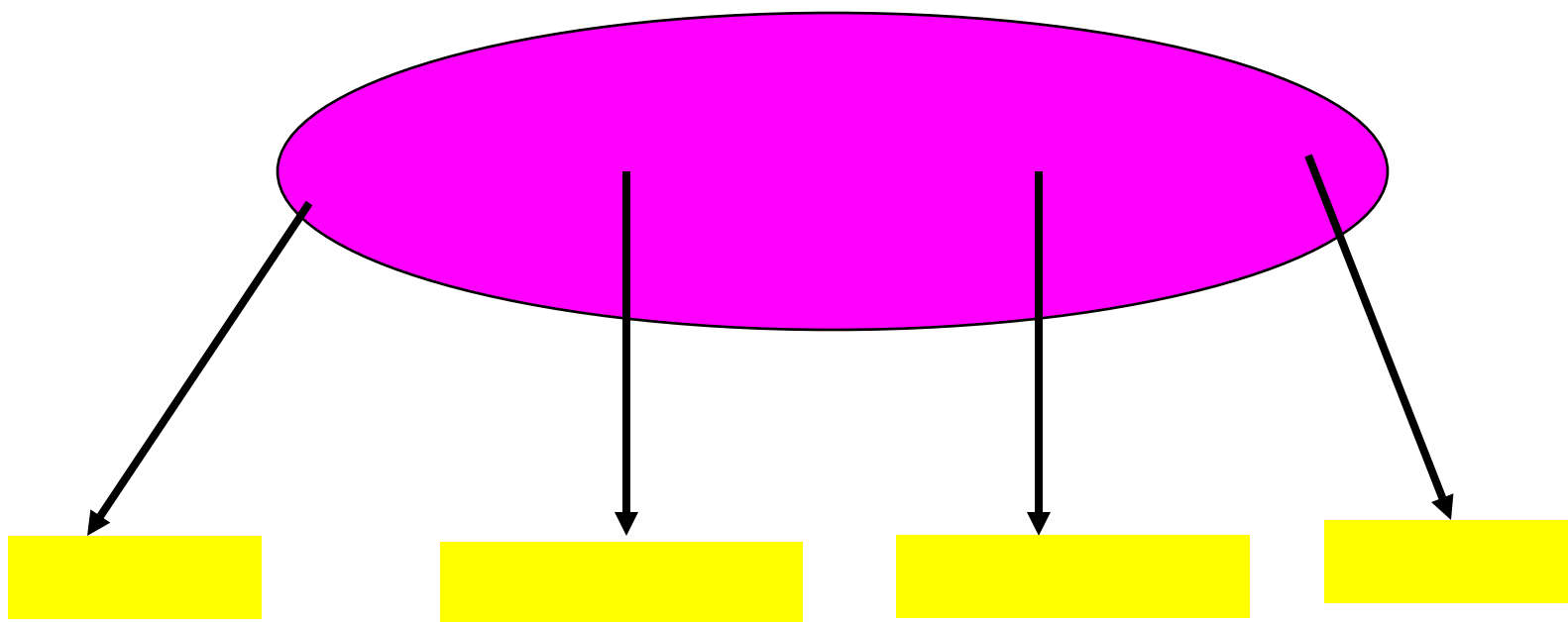
others operations that access but do not modify the fields of x

an AVL node

Useless content



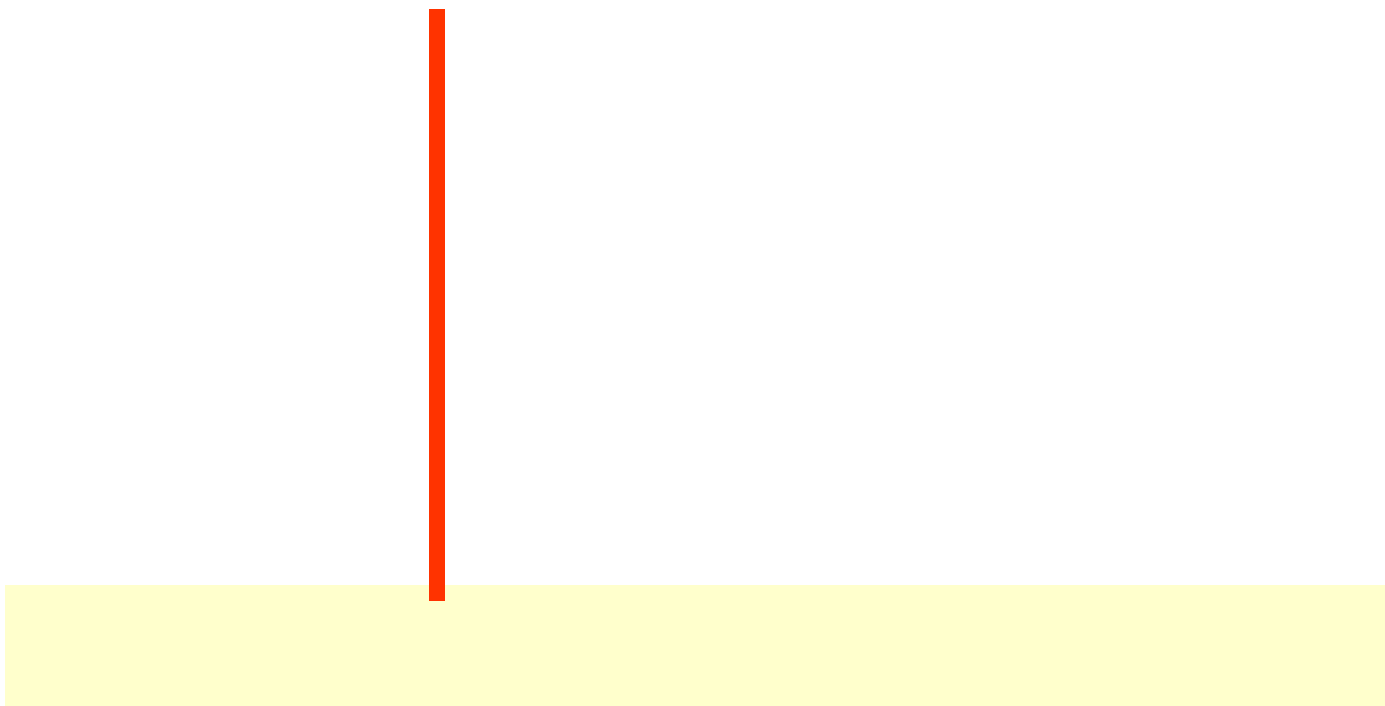
A Search Tree Node



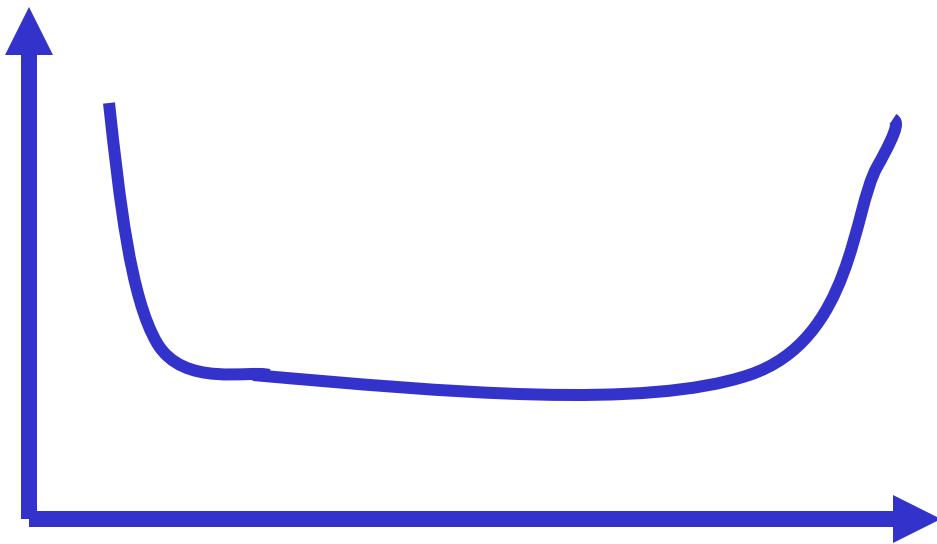
		2	200
	3		$\times 10^{-1}$
	—	31	$3.2 \times 10^{11} - 1$











•
•



•
•



$\leftarrow 0$

while $x < C[i]$ and $x > C[i+1]$

do $i \leftarrow i + 1$

$x < C[i]$ and $x = C[i+1]$

then return($i, i + 1$)

if $x < C[1]$ then return NULL

else DISK-READ($C[i]$)

return B-Tree-Search($C[i]$, x)

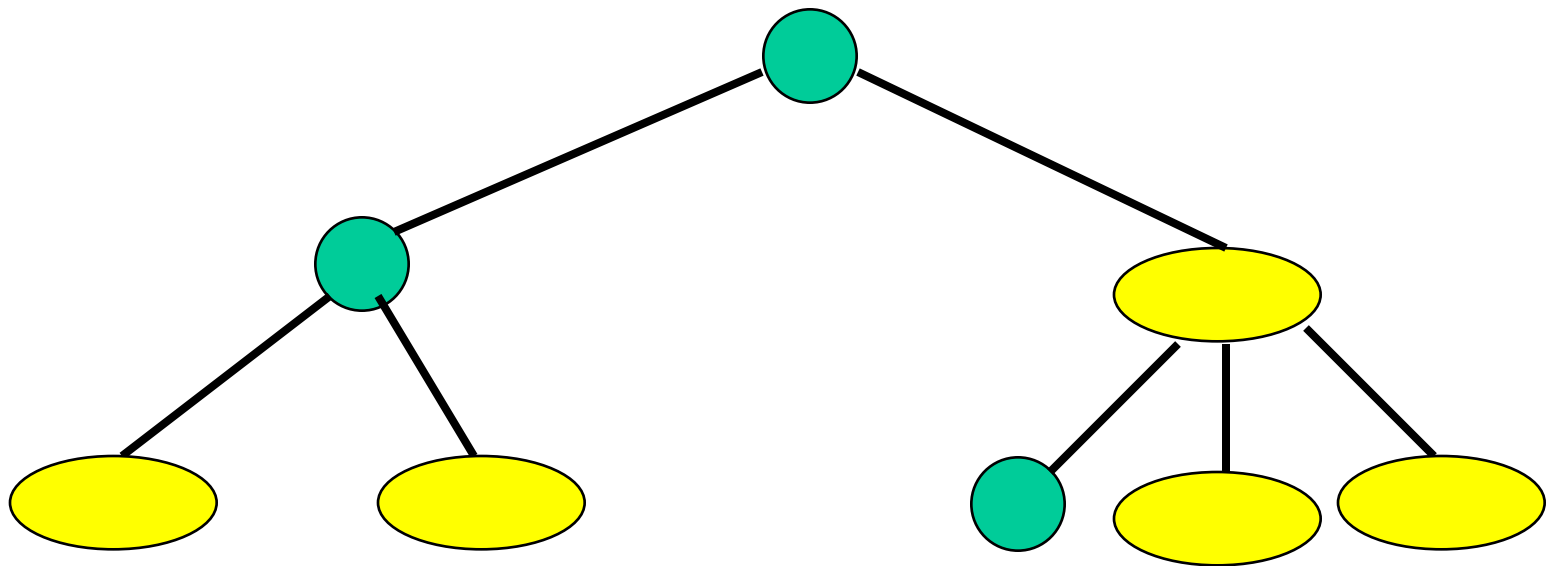
:

■ :

B-Tree-Create(T)

```
{  
   $x \leftarrow \text{Allocate - Node}()$   
   $\text{Leaf}[x] \leftarrow \text{TRUE}$   
   $n[x] \leftarrow 0$   
  DISK - WRITE(x)  
   $\text{root}[T] \leftarrow x$   
}
```

■ : ()

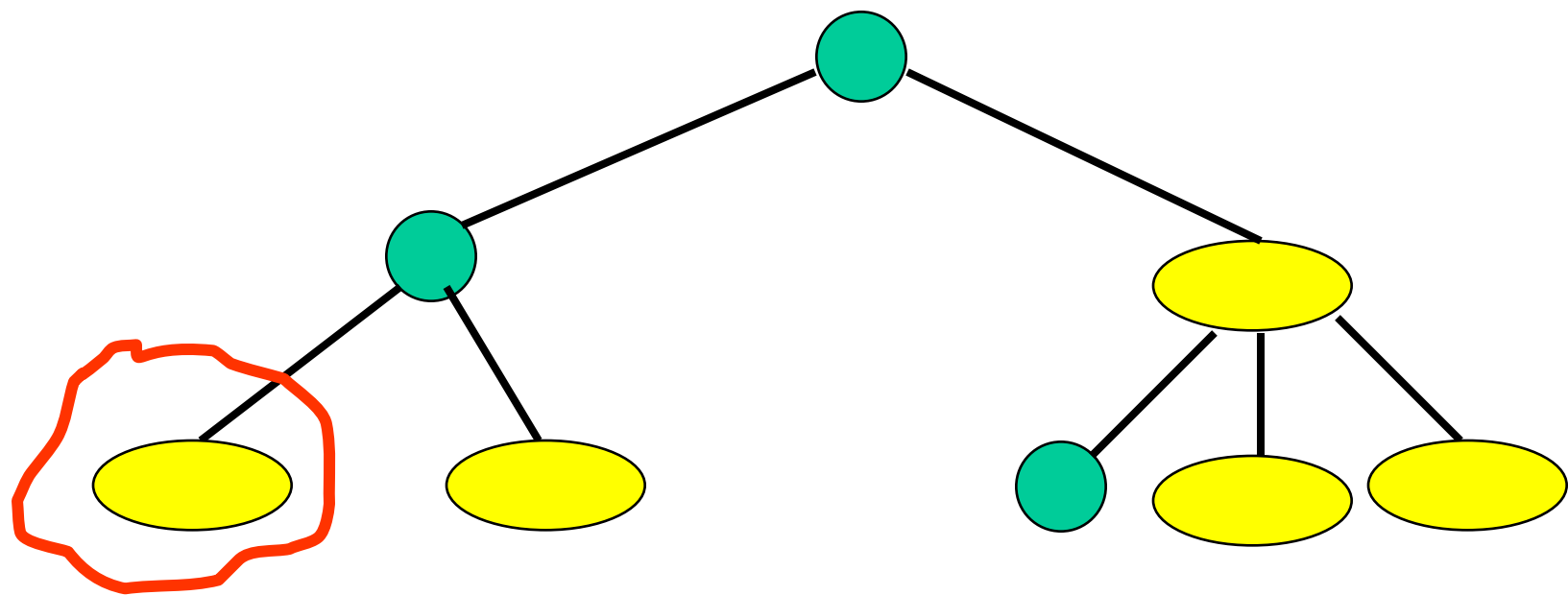


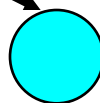
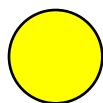
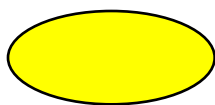
splitting

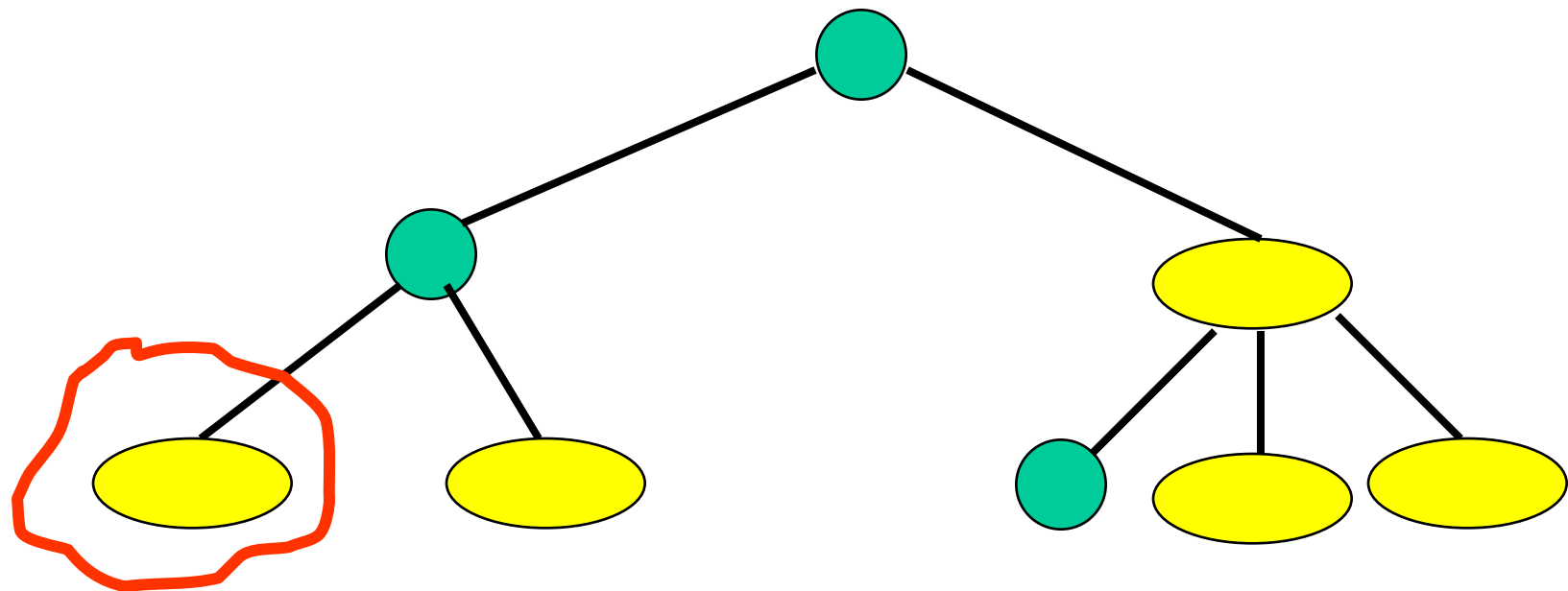
Yellow rectangular block

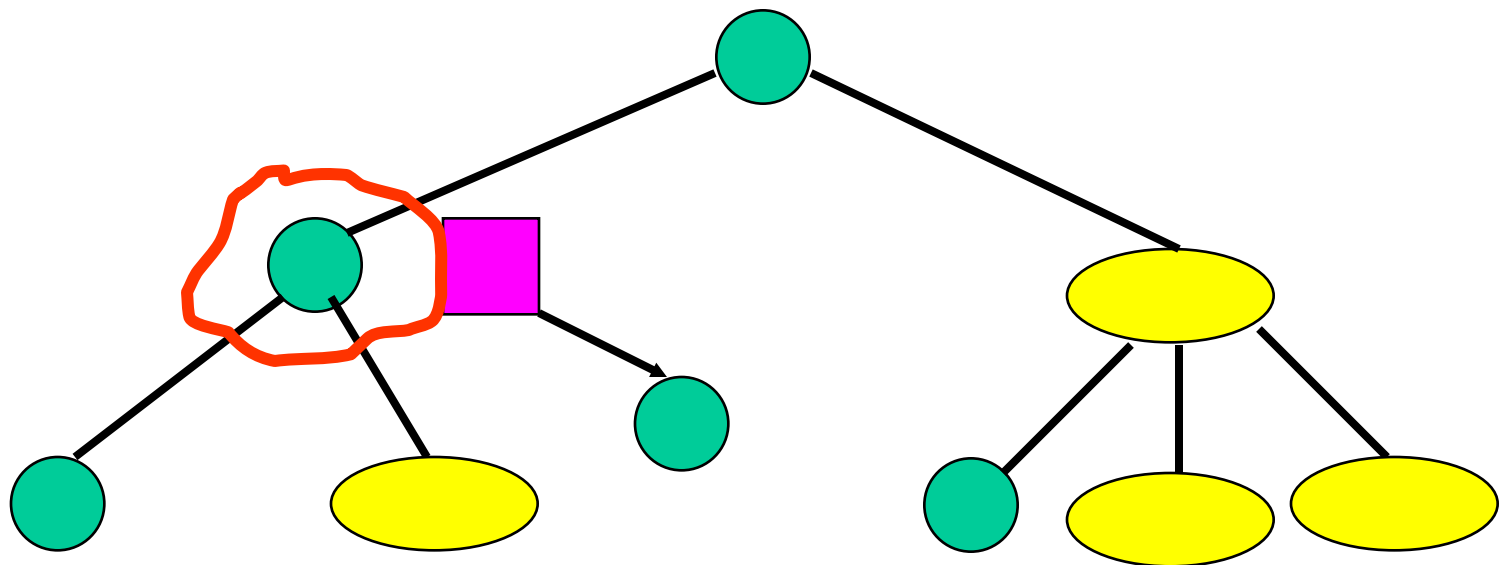
Yellow rectangular block

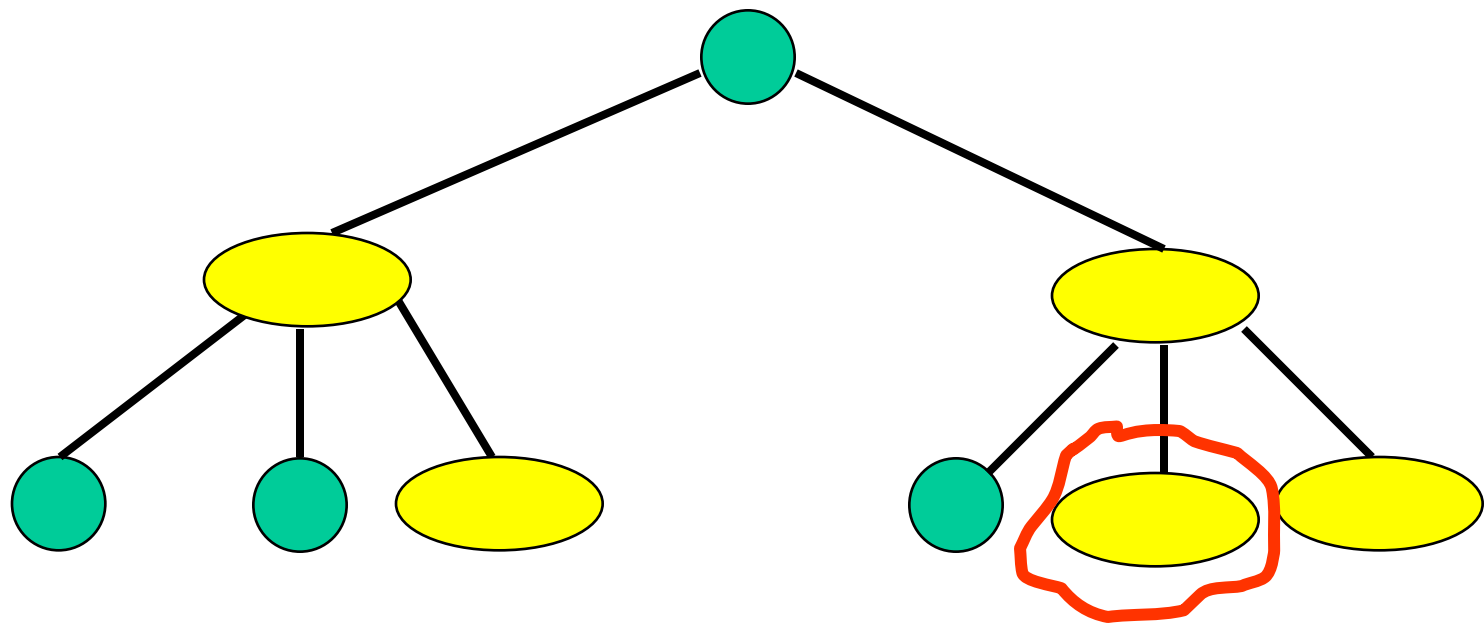
Cyan rectangular block

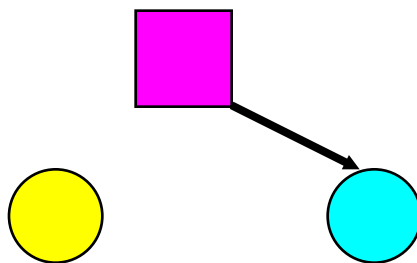
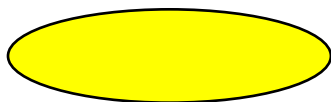


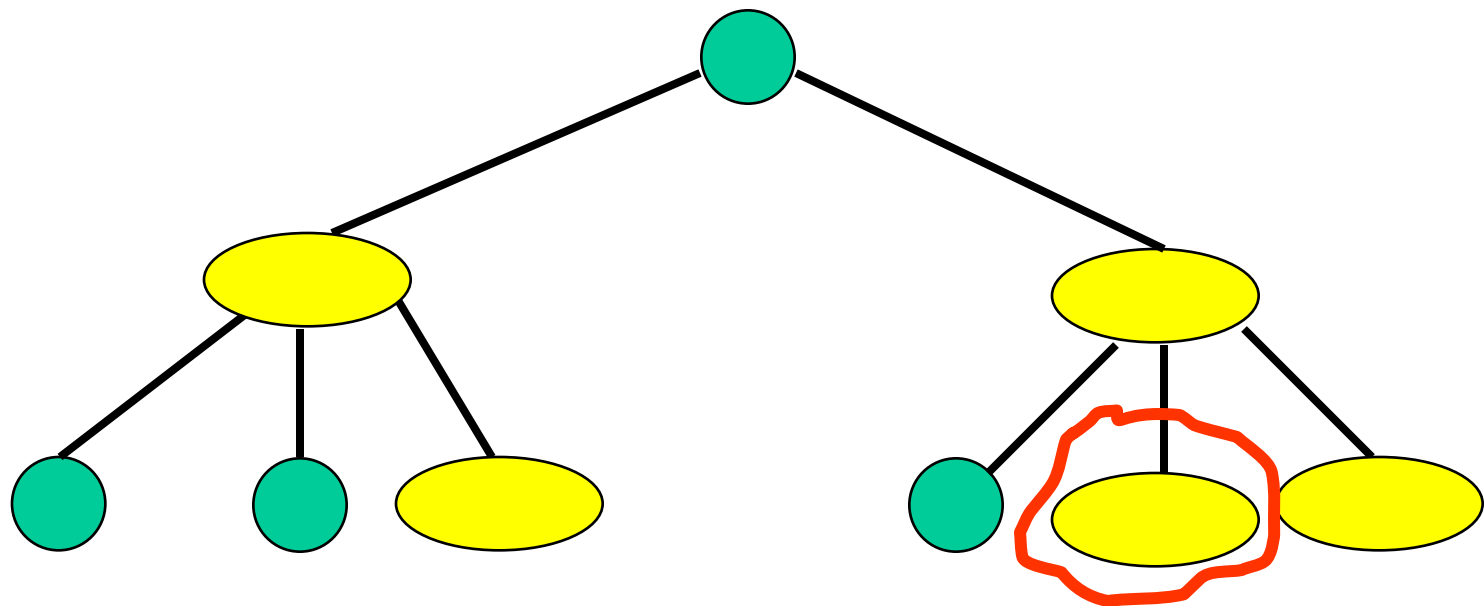


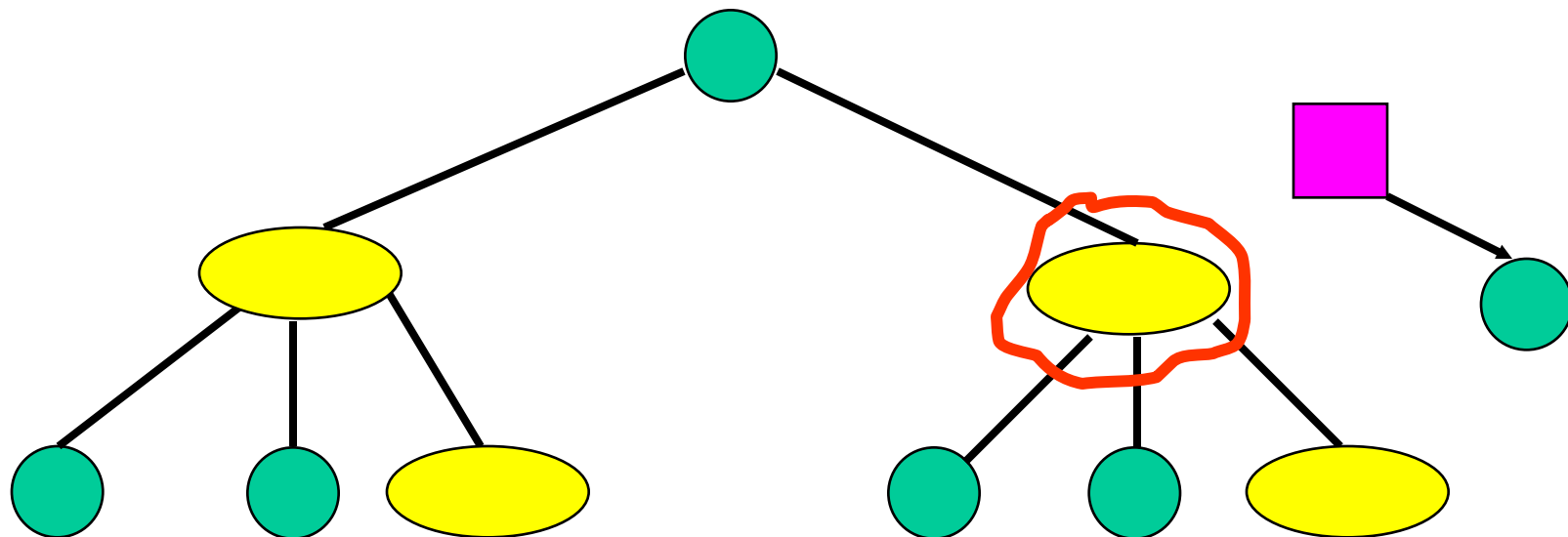


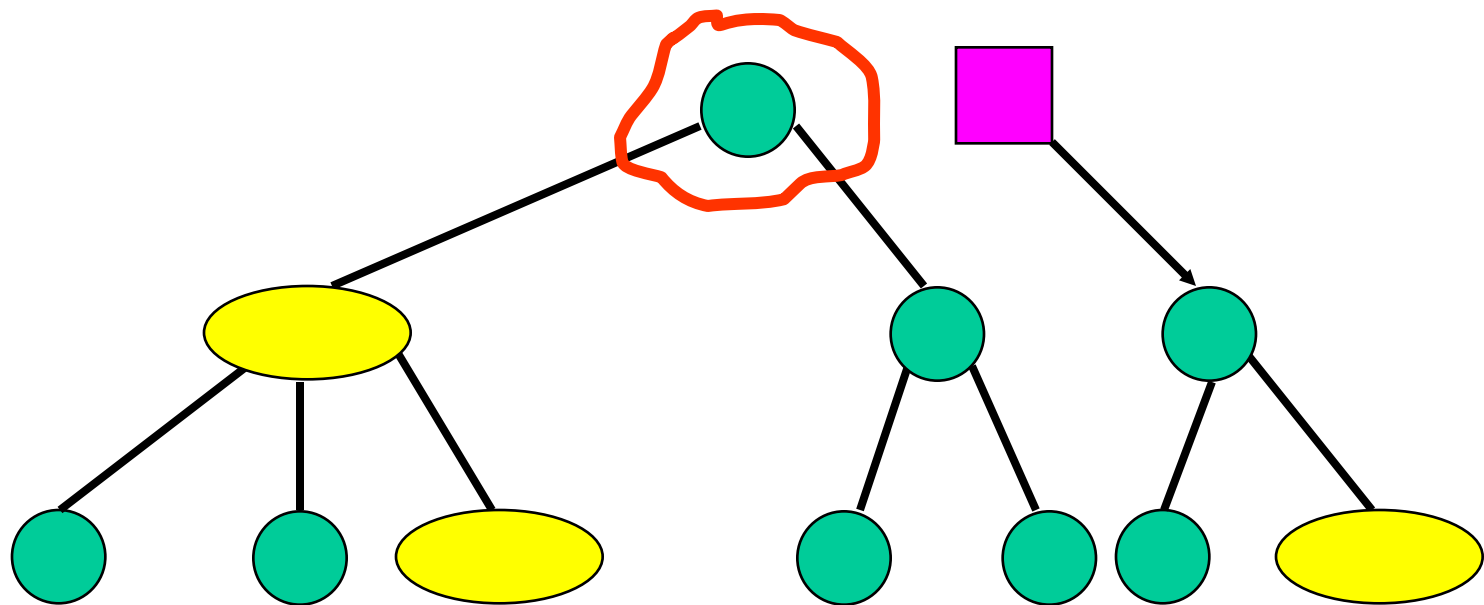


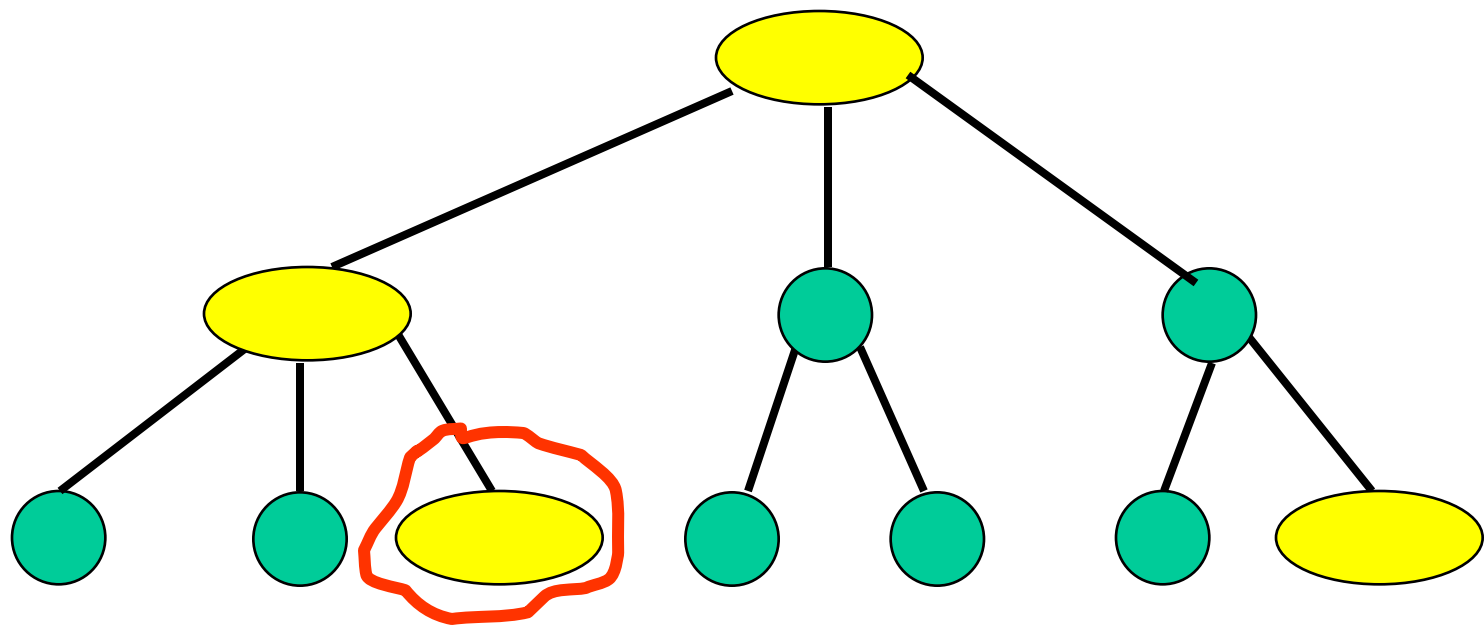


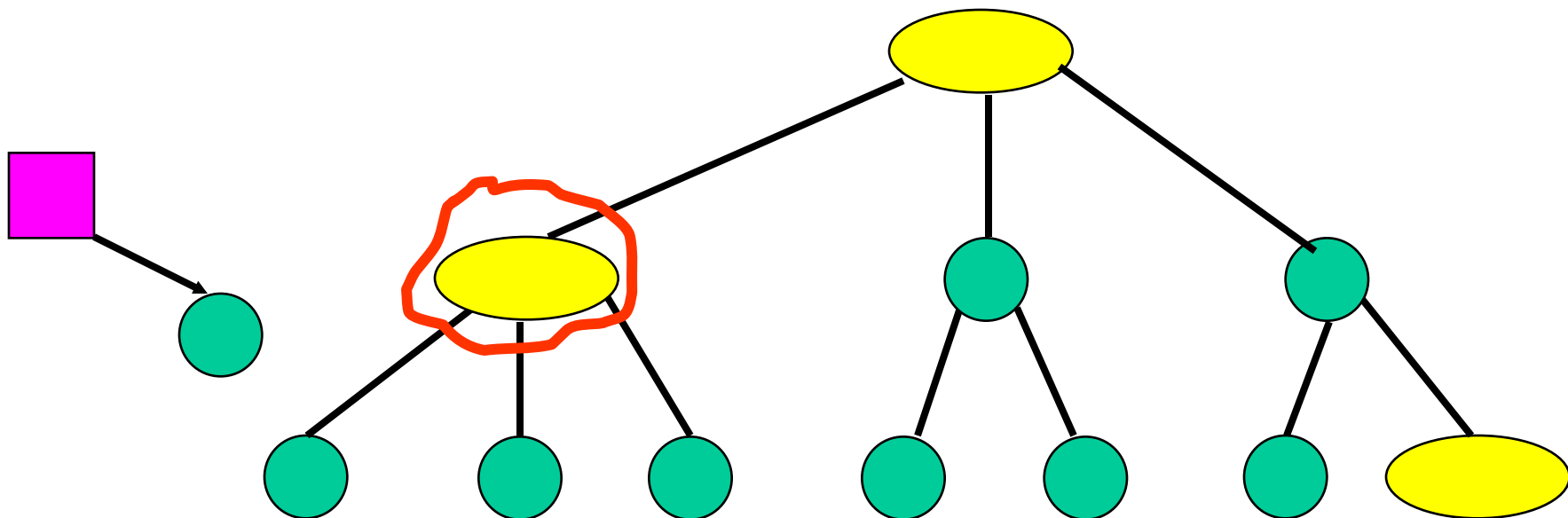


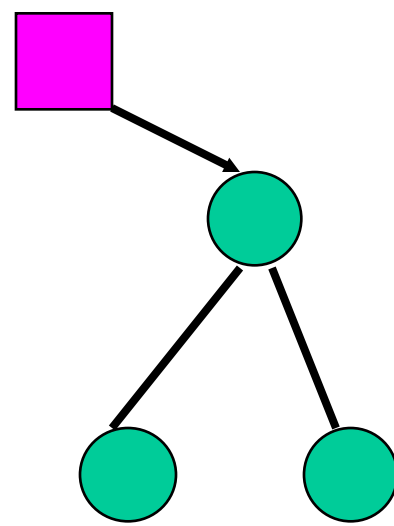
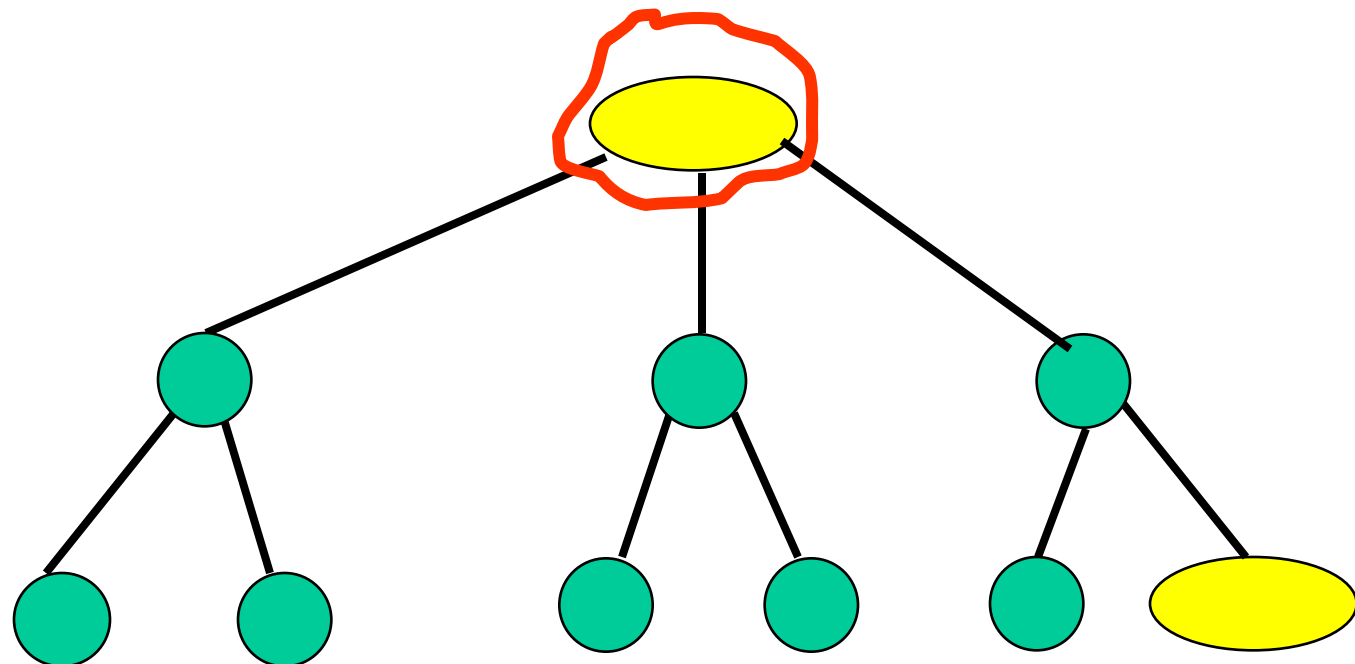


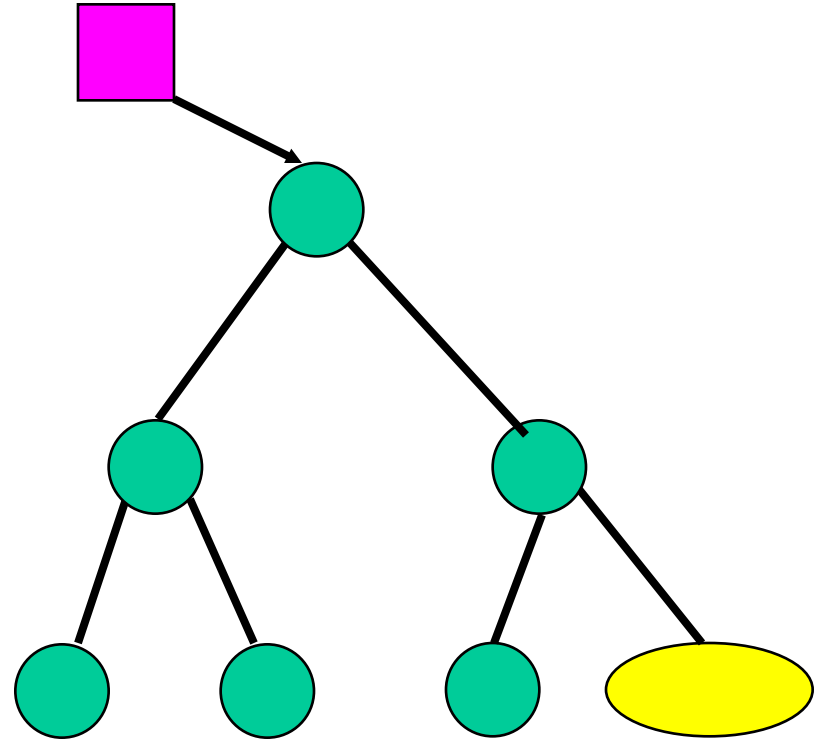
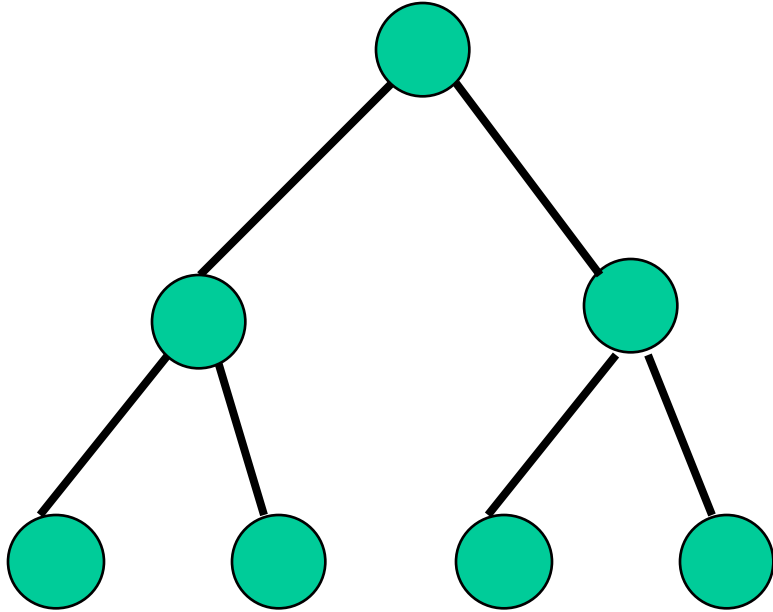


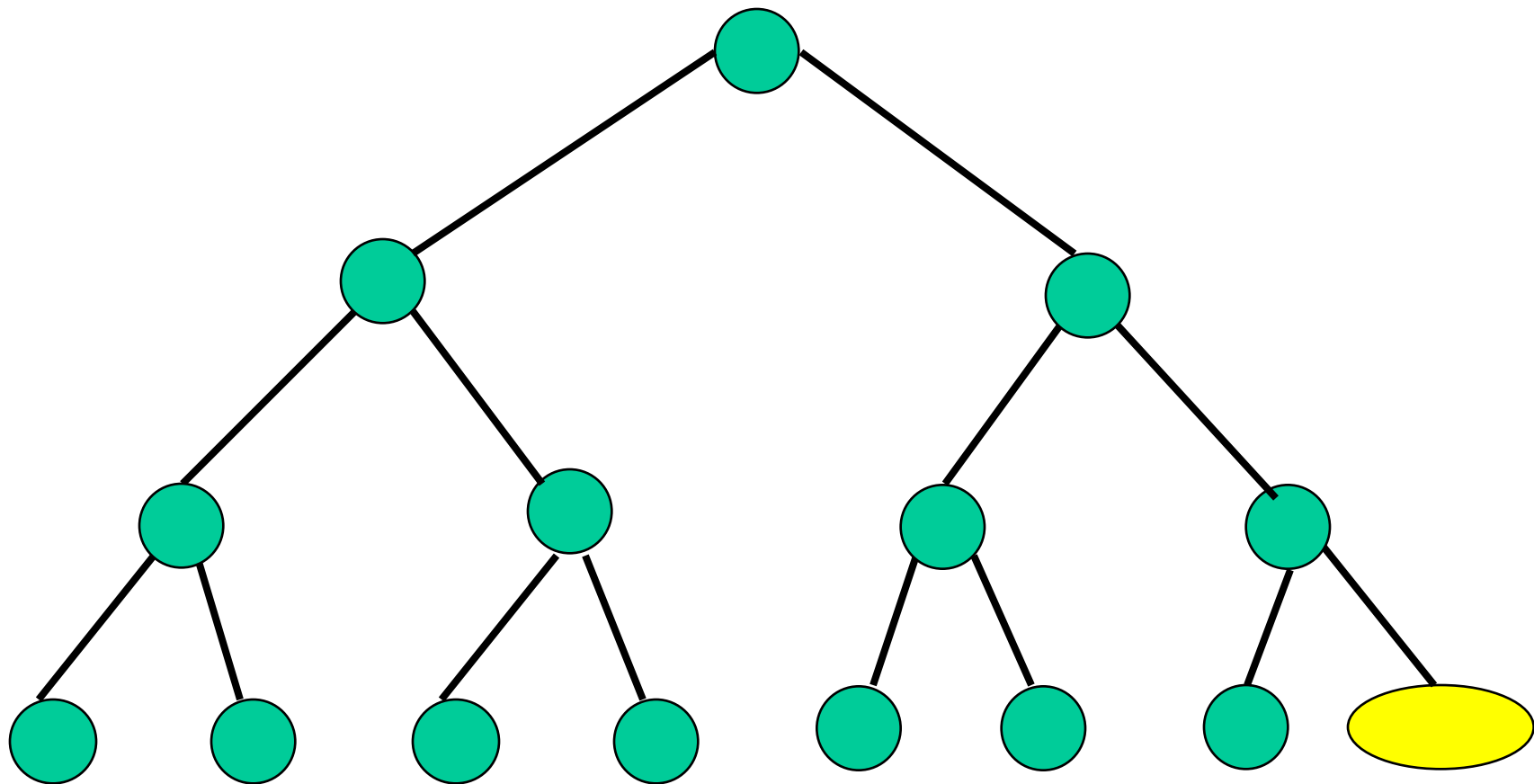












- **Exercises: P609-3**