

$2^N \rightarrow$

| | |
|-------------------|----|
| $2^5 \rightarrow$ | 32 |
| $2^4 \rightarrow$ | 16 |
| $2^3 \rightarrow$ | 8 |

$x \geq 2$ $N=6$
3 times, $x^4 = 12$

4 times

N

$\log_2 N$

$\log_2(N) \rightarrow \# \text{ of times you divide } N \text{ by } 2 \text{ to get } 0 \text{ (or } -1)$

$$\begin{aligned} 3n + 7n &\rightarrow 6n \\ g(n) = n & \quad O(n) \\ c = 6 \\ n_0 = 0 \end{aligned}$$