1.

	H											L
0	0	0	0	0	0	0	0	0	0	0	0	0
1	1	1	1	1	1	1	1	1	1	1	1	1
2	0	1	0	1	0	1	0	1	0	1	0	1
3	1	1	0	0	0	1	1	1	0	0	0	1
4	0	1	0	0	1	1	1	1	1	0	0	1
5	0	1	1	0	1	1	1	0	1	0	0	1

$\therefore$ cost = 27 , counter : 011011101001

2、 By aggregate method, $T(n) = \sum_{i=1}^{n} \lfloor \frac{n}{i} \rfloor \leq n \cdot \int_1^n \frac{1}{x} dx = n\log n$

$\therefore$ total cost = $O(n\log n)$ $\therefore$ amortized cost = $O(\log n)$