



## 7: The Brainwave Booth

**Level:** Easy

**Time limit:** 1 second

It's Thursday evening, and the barco has had another successful drinks night. Now, they are faced with maybe the most difficult task yet: getting every guest out of the Brainwave.

The members of our association may be stubborn, but they are also consistent: when a board member yells "Everybody out of the Brainwave, or help clean up!" - then exactly half of the guests leave, plus another half of a guest. The 'invitation' is called every minute, for up to half an hour, after which exactly 0 guests remain. Suppose you are standing just outside the Brainwave and you count how many times the board member calls out, calculate how many guests had been at the drinks at the beginning.

### Input

The first line contains the number of Thursdays you measure, and each subsequent line has a measurement consisting of an integer  $y$  ( $1 \leq y \leq 30$ ): the number of yells you count at each of the drinks.

### Output

For each measured Thursday, output a single line with the initial number of guests at the drinks night.

#### Sample input 1

2  
3  
4

#### Sample output 1

7  
15