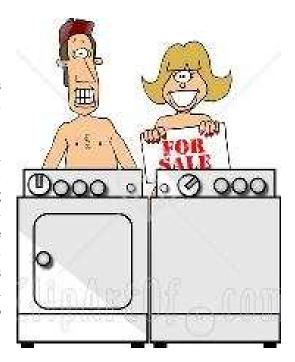
# Problem E- Doing Laundry

At home, I am lucky: I have in-suite laundry. This means I can do laundry when ever I want, but that doesn't mean I want to waste my time!

Help me devise a good schedule. Doing the wash (when the clothes get wet) always takes 30 minutes no matter what I'm washing. It's the drying that varies for each load. Some loads take 60 minutes to dry, some take only 15 minutes, and some can be anywhere in between. You can assume that moving clothes into/out of the washer or dryer is an instantaneous operation (i.e., 0 minutes), and that there are enough laundry baskets around to store any wet clothes waiting for the dryer.



#### Input Specification:

Each test case will begin with a line with the integer  $n \leq 30$ , the number of loads of laundry for the day. Following that will be n integers in the range 15 to 60, denoting the drying time required for each load.

The input ends when n = 0. This is not a test case and should not be processed.

## **Output Specification:**

For each test case, output a line with the total time required to do the laundry, assuming the best schedule. Output your answer in digital clock format, i.e., HH:MM.

## Sample Input:

1 20

2

60 15

0

#### Sample Output:

0:50

1:45