# Problem: I <br> Binary Multiplication 

All of us know simple multiplication rule. Can we make a program to multiply two binary numbers? Well we can try.


## Input specification:

Each case will define two binary strings (x \& y). You can assume that length of each string will not exceed 30 . The program will terminate with a 00 .

## Out put specification:

Out put must be formatted like the following examples. You have to show the step by step procedure for the multiplication. Each result will be separated by an empty line.

| Sample Input: | Output for Sample Input: |
| :--- | :--- |
| 1111 | 11 |
| 11110 | 11 |
| $10 \quad 111$ | -- |
| 00 | 11 |
|  | 11 |
|  | ---- |
|  | 1001 |
|  | 111 |
|  | 10 |
|  | --- |
|  | 000 |
|  | 111 |
|  | --- |
|  | 1110 |
|  | 10 |
|  | 111 |
|  | --- |
|  | 10 |
|  | 10 |
|  |  |
|  |  |
|  |  |
|  |  |

