# Problem 1 – Raindrops

The Raindear Forecast Agency (RFA) is an organization founded by an old and kind grandma which wanted quality forecasts. The Agency has hired you to write a software which finds the Rain Coefficient, by calculating simple input data.

You will receive N, an integer – the amount of regions. Then you will receive the density – a floating-point number.

For each region, you will receive an input line in the following format:

“{raindropsCount} {squareMeters}”

The raindropsCount and the squareMeters will be integers. Your task is to calculate the regional coefficient by the following formula: raindropsCount / squareMeters

NOTE: The regional coefficient should be a floating-point number.

Your task is to sum all regional coefficients, and then divide it by the density, and print the result.

If a division is not possible, just print the sum of all regional coefficients.

## Input

* On the first input line you will receive N – the amount of regions.
* On the second input line you will receive the density.
* On the next N input lines you will receive information about the regions.

## Output

* As output you must print the sum of all regional coefficients divided by the density.
* If a division is not possible you must print the sum of all regional coefficients.
* The output should be rounded and printed to 3 places after the decimal point.

## Constraints

* The amount of regions – N will be an integer in range [0, 100].
* The density will be a floating-point number in range [0, 9].
* The raindropsCount will be an integer in range [-231, 231].
* The squareMeters will be an integer in range [1, 10000].
* Allowed working time / memory: 100ms / 16MB.

## Examples

|  |  |  |
| --- | --- | --- |
| Input | Output | Comment |
| 4  4  2000 10  1000 5  5000 2000  3000 30 | 125.625 | 2000 / 10 = 200  1000 / 5 = 200  5000 / 2000 = 2.5  3000 / 30 = 100  200 + 200 + 2.5 + 100 = 502.5  502.5 / 4 = 125.625 |
| 2  2  100000 50  200000 25 | 5000.000 | 100000 / 50 = 2000  200000 / 25 = 8000  2000 + 8000 = 10000  10000 / 2 = 5000  (rounded till 3rd symbol) = 5000.000 |