## D - Photos Input File: PhotosIn.txt

Skyler would like to transfer the photos stored on the memory cards of her digital camera to her hard drive. Each photo consists of a rectangular grid of pixels (dots), and each pixel is stored as three binary numbers that specify the red, green, and blue color intensities (that when combined produce the color of the pixel). The minimum intensity of each color is zero, and the number of bits dedicated to each color is large enough to store the maximum intensity of the color. One problem: she has to catch the last train to Manhattan and may not have enough time to perform the transfer. Your task is to write a program that calculates the time required to transfer each memory card to her hard drive.

## Inputs

The first line of input will contain the number of memory cards to transfer to Skyler's hard drive. This will be followed by a two line data set per memory card. The first line of each card's data set will contain four integers: the number of pictures on the card, followed by the card's data transfer rate in *bytes*-per-second, followed by the number of rows and the number of columns in the rectangular grid of pixels that make up every image on the card. The second line of each card's data set will contain three integers that represent the *maximum* intensity of each of the individual colors (red, green and blue) that make up each pixel on the card. All inputs on a line will be separated by a space.

## Outputs

There will be one line of output per memory card that contains the total number of bits transferred followed by the number of seconds required to perform the transfer rounded to the nearest second. The two outputs will be separated by a space, and the number of bits transferred will always be less than 9,223, 372, 036,  $854, 775, 807 = (2^{63} - 1)$ .

## Sample inputs

3 10 20 30 40 15 15 15 200 100000 2000 1000 255 511 1023 200 100000 2000 1000 15 16 17

Sample outputs 144000 900 4341600000 54 5600000000 69