

Problem

Chef is very hungry. So, Chef goes to a shop selling burgers. The shop has 2 types of burgers:

- Normal burgers, which cost X rupees each
- Premium burgers, which cost Y rupees each (where $Y > X$)

Chef has R rupees. Chef wants to buy **exactly** N burgers. He also wants to maximize the number of premium burgers he buys. Determine the number of burgers of both types Chef must buy.

Output -1 if it is not possible for Chef to buy N burgers.

Input Format

- The first line contains a single integer T — the number of test cases. Then the test cases follow.
- The first and only line of each test case contains four space-separated integers X, Y, N and R — the cost of a normal burger, the cost of a premium burger, the number of burgers Chef wants to buy and the amount of money Chef has.

Output Format

For each test case, output on a new line two integers: the number of normal burgers and the number of premium burgers Chef must buy satisfying the given conditions.

Output -1 if he cannot buy N burgers.

Constraints

- $1 \leq T \leq 10^4$
- $1 \leq X < Y \leq 1000$
- $1 \leq N \leq 10^6$
- $1 \leq R \leq 10^9$

Sample 1:

Input	Output
4	4 0
2 10 4 12	8 2
4 8 10 50	-1
99 100 5 10	0 10
9 10 10 200	

Explanation:

Test case 1: Chef has to buy 4 normal burgers only. Even if he buys 1 premium burger, he would not be able to buy 4 burgers.

Test case 2: Chef can buy 8 normal burgers and 2 premium burgers.

Test case 3: It is not possible for Chef to buy 5 burgers.