Every year, the University of Zagreb organizes a student team competition in informatics. Each team consists of **three** students.

Traditionally, the best competitors from the university are girls, and they outnumber boys significantly. This year, boys have raised their voice and a rule was made that each team must consist of **exactly** one boy and two girls.

To make competitors' lives a little more difficult, the dean of the university has decided to send **K** of the competitors on an internship in a distant country. Those competitors will not be able to compete.

Given the number of female competitors **M**, the number of male competitors **N**, and the number of competitors which have to be sent on an internship **K**, the dean has to create the maximum number of teams which will be able to attend the competition.

For example, if **M** is 6, **N** is 3 and **K** is 2, the dean can send one girl and one boy on an internship, which leaves him with 5 girls and 2 boys. He can then create two teams from them (one girl is left without a team).

INPUT

The first and only line of input contains three integers separated by single spaces: **M** ($0 \leq \mathbf{M} \leq 100$), the number of girls, **N** ($0 \leq \mathbf{N} \leq 100$), the number of boys, and **K** ($0 \leq \mathbf{K} \leq \mathbf{M+N}$), the number of competitors which have to be sent on an internship.

OUTPUT

The first and only line of output must contain only one number: the maximum number of teams which can be formed.

SAMPLE TESTS

input	**input**	**input**
6 3 2	2 1 1	6 10 3
output	**output**	**output**
2	0	3