B. Fixed Points

time limit per test
2 seconds
memory limit per test
256 megabytes
input
standard input
output
standard output

A permutation of length n is an integer sequence such that each integer from 0 to (n-1) appears exactly once in it. For example, sequence [0, 2, 1] is a permutation of length 3 while both [0, 2, 2] and [1, 2, 3] are not.

A fixed point of a function is a point that is mapped to itself by the function. A permutation can be regarded as a bijective function. We'll get a definition of a fixed point in a permutation. An integer i is a fixed point of permutation $a_0, a_1, ..., a_{n-1}$ if and only if $a_i = i$. For example, permutation [0, 2, 1] has 1 fixed point and permutation [0, 1, 2] has 3 fixed points. You are given permutation a. You are allowed to swap two elements of the permutation at most once. Your task is to maximize the number of fixed points in the resulting permutation. Note that you are allowed to make at most one swap operation.

Input

The first line contains a single integer n ($1 \le n \le 105$). The second line contains n integers a0, a1, ..., an-1 — the given permutation.

Output

Print a single integer — the maximum possible number of fixed points in the permutation after at most one swap operation.

Examples

input

Copy

0 1 3 4 2

output

Copy

3