

# Problem B

## Gerg's Cake

**Input:** Standard Input  
**Output:** Standard Output

Gerg is having a party, and he has invited his friends. **p** of them have arrived already, but **a** are running late. To occupy his guests, he tried playing some team games with them, but he found that it was impossible to divide the **p** guests into any number of equal-sized groups of more than one person.

Luckily, he has a backup plan - a cake that he would like to share between his friends. The cake is in the shape of a square, and Gerg insists on cutting it up into equal-sized square pieces. He wants to reserve one slice for each of the **a** missing friends, and the rest of the slices have to be divided evenly between the **p** remaining guests. He does not want any cake himself. Can he do it?

### Input

The input will consist of several test cases. Each test case will be given as a non-negative integer **a** and a positive integer **p** as specified above, on a line. Both **a** and **p** will fit into a 32-bit signed integer. The last line will contain "-1 -1" and should not be processed.

### Output

For each test case, output "Yes" if the cake can be fairly divided and "No" otherwise.

### Sample Input

```
1 3
1024 17
2 101
0 1
-1 -1
```

### Output for Sample Input

```
Yes
Yes
No
Yes
```

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