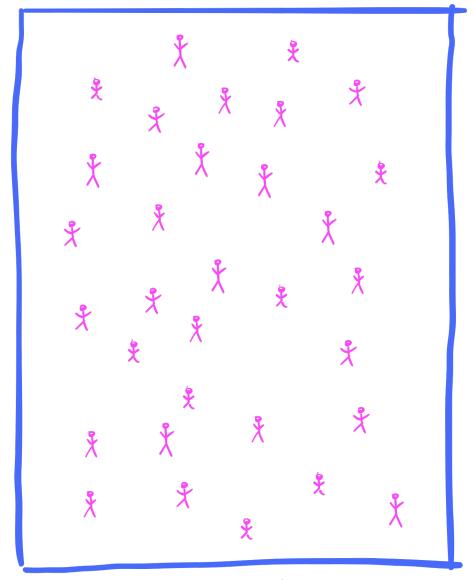
# 4.1. Random variables

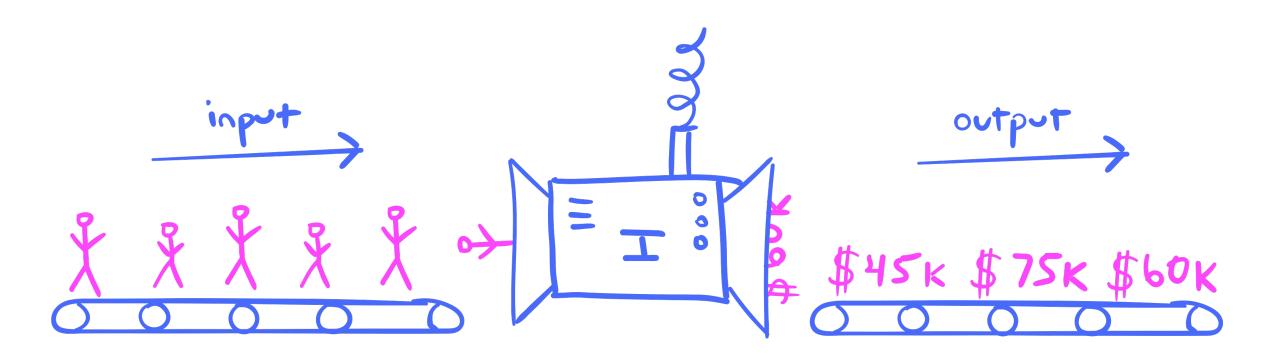
"Random variables are neither random, nor are they variables."

- Someone

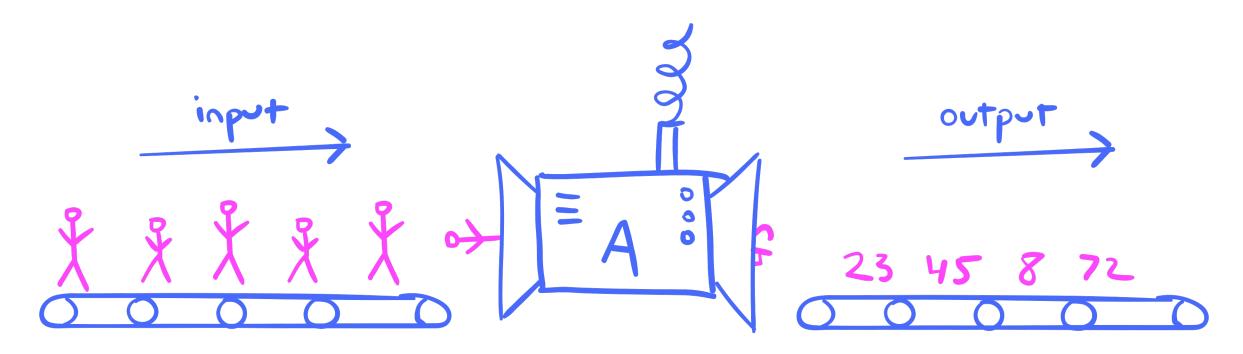


population

### annual income machine



## age machine



$$I(X) = $70k$$

$$A(X) = 3Z$$



#### **Definition 4.1**

Let S be a probability space. A *random variable* on S is a function  $X:S o \mathbb{R}$ .



#### Problem Prompt

Let's get some practice with random variables! Do problems 1-4 on the worksheet.