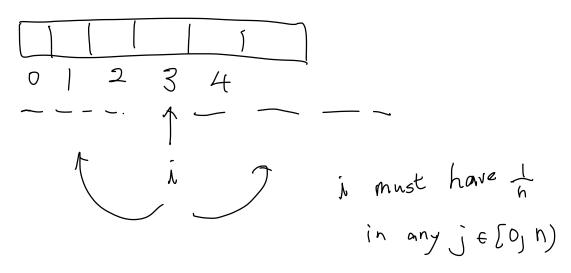
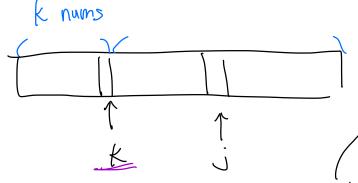
Fisher - Yates shuffle prost



Assume: je[0,n), we want to compute the probability of i be placed at j



for k in [0, N-2]: J = a num in [k, n-1] smap(arr(K), am(j))

If k is the index in our loop,

(if i is selected to the left, it can be atj)

that means it is not selected to the left of

k, and when the k=j

j is selected

$$\Rightarrow \left(\frac{n-1}{n} \times \frac{n-2}{h-1} \times \cdots \cdot \frac{j}{j+1}\right) \times \frac{j}{j} = \frac{1}{n}$$

the probability of i be placed at j if a is chosen here, we are

a a a screwed

The first step if a, is chosen here,

a, can hever be at 2 $\frac{3}{3}$ must be chosen $\frac{3}{3}$ $\frac{3}{3}$ K=2 overall: