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Subject: Re: Random Sampling Without Replacement  
Posted by [Michael Galloy](#) on Wed, 13 Oct 2010 16:01:26 GMT  
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On 10/13/10 9:46 AM, David Fanning wrote:

> Has anyone coded up an IDL algorithm to do random  
> sampling without replacement?  
>  
> For example, suppose I want to sample values in  
> my 2D image. I want, say, 100 values that represent  
> individual pixel locations in the image. How can  
> I make sure I get 100 unique, but random, locations?

To randomly sample m elements from n elements, I have used this albeit inefficient technique:

```
m = 3
n = 100
im = findgen(n) ; input array
arr = randomu(seed, n)
ind = sort(arr)
print, im[ind[0:m-1]] ; m random elements from im
```

Mike

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