

Модули метода random

betavariate, sample, Random,
normalvariate, gammavariate

Beta distribution.

Conditions on the parameters are $\alpha > 0$ and $\beta > 0$.

Returned values range between 0 and 1.

BETAVARIATE

leaving the original population unchanged. The resulting lists are in selection order so that all sub-slices will also be valid random samples. This allows raffle winners (the sample) to be partitioned into grand prize and second place winners (the subslices).

Members of the population need not be hashable or unique. If the population contains repeats, then each occurrence is a possible selection in the sample.

To choose a sample in a range of integers, use `range` as an argument. This is especially fast and space efficient for sampling from a large population: `sample(range(10000000), 60)`

SAMPLE

Random number generator base class used by bound module functions.

Used to instantiate instances of Random to get generators that don't share state.

Class Random can also be subclassed if you want to use a different basic

generator of your own devising: in that case, override the following methods: `random()`, `seed()`, `getstate()`, and `setstate()`.

Optionally, implement a `getrandbits()` method so that `randrange()` can cover arbitrarily large ranges.

RANDOM

Normal distribution.

μ is the mean, and σ is the standard deviation.

NORMALVARIATE

Gamma distribution. Not the gamma function!

Conditions on the parameters are $\alpha > 0$ and $\beta > 0$.

The probability distribution function is:

$$\text{pdf}(x) = \frac{x^{(\alpha - 1)} * \text{math.exp}(-x / \beta)}{\text{math.gamma}(\alpha) * \beta^{**} \alpha}$$

GAMMAVARIATE