NAME

drand48_r, erand48_r, lrand48_r, nrand48_r, mrand48_r, jrand48_r, srand48_r, seed48_r, lcong48_r − generate uniformly distributed pseudo-random numbers reentrantly

SYNOPSIS

```
#include <stdlib.h>

int drand48_r(struct drand48_data *buffer, double *result);

int erand48_r(unsigned short xsubi[3],
        struct drand48_data *buffer, double *result);

int lrand48_r(struct drand48_data *buffer, long int *result);

int nrand48_r(unsigned short int xsubi[3],
        struct drand48_data *buffer, long int *result);

int mrand48_r(struct drand48_data *buffer,long int *result);

int jrand48_r(unsigned short int xsubi[3],
        struct drand48_data *buffer, long int *result);

int srand48_r(long int seedval, struct drand48_data *buffer);

int seed48_r(unsigned short int seed16v[3],
       struct drand48_data *buffer);

int lcong48_r(unsigned short int param[7],
        struct drand48_data *buffer);
```

Feature Test Macro Requirements for glibc (see **feature_test_macros**(7)):

All functions shown above:
  /* Glibc since 2.19: */ _DEFAULT_SOURCE
    || /* Glibc versions <= 2.19: */ _SVID_SOURCE || _BSD_SOURCE

DESCRIPTION

These functions are the reentrant analogs of the functions described in **drand48**(3). Instead of modifying the global random generator state, they use the supplied data *buffer*.

Before the first use, this struct must be initialized, for example, by filling it with zeros, or by calling one of the functions **srand48_r**(), **seed48_r**(), or **lcong48_r**().

RETURN VALUE

The return value is 0.

ATTRIBUTES

For an explanation of the terms used in this section, see **attributes**(7).

Interface	Attribute	Value
drand48_r(), **erand48_r**(), **lrand48_r**(), **nrand48_r**(), **mrand48_r**(), **jrand48_r**(), **srand48_r**(), **seed48_r**(), **lcong48_r**()	Thread safety	MT-Safe race:buffer

CONFORMING TO

These functions are GNU extensions and are not portable.

SEE ALSO

drand48(3), **rand**(3), **random**(3)

COLOPHON

This page is part of release 5.05 of the Linux *man-pages* project. A description of the project, information about reporting bugs, and the latest version of this page, can be found at https://www.kernel.org/doc/man−pages/.