

NAME

`get_nprocs`, `get_nprocs_conf` – get number of processors

SYNOPSIS

```
#include <sys/sysinfo.h>
```

```
int get_nprocs(void);
```

```
int get_nprocs_conf(void);
```

DESCRIPTION

The function `get_nprocs_conf()` returns the number of processors configured by the operating system.

The function `get_nprocs()` returns the number of processors currently available in the system. This may be less than the number returned by `get_nprocs_conf()` because processors may be offline (e.g., on hotplug-gable systems).

RETURN VALUE

As given in DESCRIPTION.

ATTRIBUTES

For an explanation of the terms used in this section, see [attributes\(7\)](#).

Interface	Attribute	Value
<code>get_nprocs()</code> , <code>get_nprocs_conf()</code>	Thread safety	MT-Safe

CONFORMING TO

These functions are GNU extensions.

NOTES

The current implementation of these functions is rather expensive, since they open and parse files in the `/sys` filesystem each time they are called.

The following [sysconf\(3\)](#) calls make use of the functions documented on this page to return the same information.

```
np = sysconf(_SC_NPROCESSORS_CONF);      /* processors configured */
np = sysconf(_SC_NPROCESSORS_ONLN);     /* processors available */
```

EXAMPLE

The following example shows how `get_nprocs()` and `get_nprocs_conf()` can be used.

```
#include <stdlib.h>
#include <stdio.h>
#include <sys/sysinfo.h>

int
main(int argc, char *argv[])
{
    printf("This system has %d processors configured and "
           "%d processors available.\n",
           get_nprocs_conf(), get_nprocs());
    exit(EXIT_SUCCESS);
}
```

SEE ALSO

[nproc\(1\)](#)

COLOPHON

This page is part of release 5.02 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/>.