

NAME

setsid – creates a session and sets the process group ID

SYNOPSIS

```
#include <unistd.h>
```

```
pid_t setsid(void);
```

DESCRIPTION

setsid() creates a new session if the calling process is not a process group leader. The calling process is the leader of the new session, the process group leader of the new process group, and has no controlling tty. The process group ID and session ID of the calling process are set to the PID of the calling process. The calling process will be the only process in this new process group and in this new session.

RETURN VALUE

On success, the (new) session ID of the calling process is returned. On error, *(pid_t) -1* is returned, and *errno* is set to indicate the error.

ERRORS**EPERM.**

The process group ID of any process equals the PID of the calling process. Thus, in particular, **setsid()** fails if the calling process is already a process group leader.

CONFORMING TO

SVr4, POSIX.1-2001.

NOTES

A child created via **fork(2)** inherits its parent's session ID. The session ID is preserved across an **execve(2)**.

A process group leader is a process with process group ID equal to its PID. In order to be sure that **setsid()** will succeed, **fork(2)** and **_exit(2)**, and have the child do **setsid()**.

SEE ALSO

getsid(2), **setpgid(2)**, **setpgrp(2)**, **tcgetsid(3)**, **credentials(7)**

COLOPHON

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