NAME

chmod − change mode of file

SYNOPSIS

int chmod (name, mode)
char *name;
int mode;

DESCRIPTION

The file whose name is given as the null-terminated string pointed to by *name* has its mode changed to *mode*. Modes are constructed by ORing together some combination of the following:

04000 set user ID on execution
02000 set group ID on execution
01000 save text image after execution
00400 read by owner
00200 write by owner
00100 execute (search on directory) by owner
00070 read, write, execute (search) by group
00007 read, write, execute (search) by others

If an executable file is set up for sharing (**−n** or **−i** option of *ld*(1)) then mode 1000 prevents the system from abandoning the swap-space image of the program-text portion of the file when its last user terminates. Thus when the next user of the file executes it, the text need not be read from the file system but can simply be swapped in, saving time. Ability to set this bit is restricted to the super-user since swap space is consumed by the images; it is only worth while for heavily used commands.

Only the owner of a file (or the super-user) may change the mode. Only the super-user can set the 01000 mode.

SEE ALSO

chmod(1), umask(2)

DIAGNOSTIC

Zero is returned if the mode is changed; −1 is returned if *name* cannot be found or if the current user is neither the owner of the file nor the super-user.

ASSEMBLER

(chmod = 15.)
sys chmod; name; mode