

NAME

mklinks — create, merge or update related directory hierarchies.

SYNOPSIS

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mklinks [ -flags ] source-dir dest-dir
mklinks command [ -flags ] source-dir dest-dir
```

DESCRIPTION

mklinks provides a number of functions for manipulating hierarchies of similar files. The original purpose was to maintain similar trees of source code, but it can also be used for binary files. In all cases, it leaves *source-dir* unchanged and (possibly) modifies *dest-dir*.

By default, **mklinks** creates links between the source and destination directories. In the case of symbolic links, the link is from the destination directory to the source directory. The following flags change the functions that **mklinks** performs:

- r** Remove files from *dest-dir* which exist in *src-dir*.
- R** Remove files from *dest-dir* which exist in *src-dir*. Additionally, if any directory becomes empty, remove that directory.

The following flags modify the way **mklinks** performs these functions:

- c** Don't compare files with different timestamps before prompting.
- d** Do a diff | less to screen before prompting for replacement. See also the **-w** flag.
- D** Don't create directories if they're not present.
- k** Keep files with different contents.
- n** Prompt to replace files with newer versions.
- N** Replace files with newer versions unconditionally.
- q** Prompt before linking files with same timestamps.
- s** Create symlinks (bitmapped flag). The bits have the following meanings:
 - 1** Create a symlink if the source file was a symlink.
 - 2** Create a symlink if source file was a regular file.
 - 4** Create a symlink if source file was a directory.
 - 8** Link to the original source file, not a source symlink.
 When deleting, this flag has no effect.
- u** Don't replace identical files (with same content and date).
- v** [*num*]
 - Specify verbosity.
 - 0** Don't produce any output except for error messages and any information requested with the **-d**, **-n**, **-q** **-and** **-w** flags. This is the default value.
 - 1** Print information about files not copied or linked, and about directories created. This is the default value if *num* is omitted.
 - 2** Additionally to 1, print information about each file examined. Each line starts with a series of characters for easy recognition.
 - 3** Additionally to 2, print information about whether files have same contents or not.
- w** Do a diff -w | less to screen before prompting for replacement.

- x** Don't create a link if the destination file does not exist.
- z** Display the actions, but don't perform them. This should be used in combination with the **-v** flag.

The following commands set combinations of the above flags to perform typical functions. Each may be modified by any of the preceding flags. Note that the flags must be placed after the command in order to have any effect.

- clone** Create a copy of *source-dir* in *dest-dir*. Unless other flags follow, all directories in *dest-dir* will be distinct from the directories in *source-dir*, but the files will be linked to the same file if *source-dir* and *dest-dir* are on the same file system; otherwise the files in *dest-dir* will be symbolic links to the files in *source-dir*.
- merge** Merge two trees. For each file in the destination directory which is also in the source directory, remove the file from the destination directory and replace it with a link (by default a hard link where possible) to the file in the source directory.
- rm** Remove all files in *dest-dir* which have a corresponding file in *source-dir*. By default files which differ will not be deleted; use a combination of the **-c**, **-d**, **-n**, **-N** or **-p** flags to compare the files.

By default, **rm** does not remove directories which become empty. Append the **-R** flag to remove directories as well.
- update** Replace older versions of files in *dest-dir* with the versions in *source-dir*. Unless other flags follow, all directories in *dest-dir* will be distinct from the directories in *source-dir*, but the files will be linked to the same file if *source-dir* and *dest-dir* are on the same file system; otherwise the files in *dest-dir* will be symbolic links to the files in *source-dir*.

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