

NAME

ls – list directory contents

SYNOPSIS

ls [*OPTION*]... [*FILE*]...

DESCRIPTION

List information about the FILES (the current directory by default). Sort entries alphabetically if none of **-cftuvSUX** nor **--sort** is specified.

Mandatory arguments to long options are mandatory for short options too.

-a, --all

do not ignore entries starting with .

-A, --almost-all

do not list implied . and ..

--author

with **-l**, print the author of each file

-b, --escape

print C-style escapes for nongraphic characters

--block-size=SIZE

with **-l**, scale sizes by SIZE when printing them; e.g., **'--block-size=M'**; see SIZE format below

-B, --ignore-backups

do not list implied entries ending with ~

-c

with **-lt**: sort by, and show, ctime (time of last change of file status information); with **-l**: show ctime and sort by name; otherwise: sort by ctime, newest first

-C

list entries by columns

--color[=WHEN]

color the output WHEN; more info below

-d, --directory

list directories themselves, not their contents

-D, --dired

generate output designed for Emacs' dired mode

-f

list all entries in directory order

-F, --classify[=WHEN]

append indicator (one of */=>@|) to entries WHEN

--file-type

likewise, except do not append '*'

--format=WORD

across **-x**, commas **-m**, horizontal **-x**, long **-l**, single-column **-l**, verbose **-l**, vertical **-C**

--full-time

like **-l --time-style=full-iso**

-g

like **-l**, but do not list owner

--group-directories-first

group directories before files; can be augmented with a **--sort** option, but any use of **--sort=none** (**-U**) disables grouping

-G, --no-group

in a long listing, don't print group names

- h, --human-readable**
with **-l** and **-s**, print sizes like 1K 234M 2G etc.
- si** likewise, but use powers of 1000 not 1024
- H, --dereference-command-line**
follow symbolic links listed on the command line
- dereference-command-line-symlink-to-dir**
follow each command line symbolic link that points to a directory
- hide=PATTERN**
do not list implied entries matching shell PATTERN (overridden by **-a** or **-A**)
- hyperlink[=WHEN]**
hyperlink file names WHEN
- indicator-style=WORD**
append indicator with style WORD to entry names: none (default), slash (**-p**), file-type (**--file-type**), classify (**-F**)
- i, --inode**
print the index number of each file
- I, --ignore=PATTERN**
do not list implied entries matching shell PATTERN
- k, --kibibytes**
default to 1024-byte blocks for file system usage; used only with **-s** and per directory totals
- l** use a long listing format
- L, --dereference**
when showing file information for a symbolic link, show information for the file the link references rather than for the link itself
- m** fill width with a comma separated list of entries
- n, --numeric-uid-gid**
like **-l**, but list numeric user and group IDs
- N, --literal**
print entry names without quoting
- o** like **-l**, but do not list group information
- p, --indicator-style=slash**
append / indicator to directories
- q, --hide-control-chars**
print ? instead of nongraphic characters
- show-control-chars**
show nongraphic characters as-is (the default, unless program is 'ls' and output is a terminal)
- Q, --quote-name**
enclose entry names in double quotes
- quoting-style=WORD**
use quoting style WORD for entry names: literal, locale, shell, shell-always, shell-escape, shell-escape-always, c, escape (overrides QUOTING_STYLE environment variable)
- r, --reverse**
reverse order while sorting
- R, --recursive**
list subdirectories recursively

-s, --size
print the allocated size of each file, in blocks

-S
sort by file size, largest first

--sort=WORD
sort by WORD instead of name: none (**-U**), size (**-S**), time (**-t**), version (**-v**), extension (**-X**), width

--time=WORD
select which timestamp used to display or sort; access time (**-u**): atime, access, use; metadata change time (**-c**): ctime, status; modified time (default): mtime, modification; birth time: birth, creation;
with **-l**, WORD determines which time to show; with **--sort=time**, sort by WORD (newest first)

--time-style=TIME_STYLE
time/date format with **-l**; see TIME_STYLE below

-t
sort by time, newest first; see **--time**

-T, --tabsize=COLS
assume tab stops at each COLS instead of 8

-u
with **-lt**: sort by, and show, access time; with **-l**: show access time and sort by name; otherwise: sort by access time, newest first

-U
do not sort; list entries in directory order

-v
natural sort of (version) numbers within text

-w, --width=COLS
set output width to COLS. 0 means no limit

-x
list entries by lines instead of by columns

-X
sort alphabetically by entry extension

-Z, --context
print any security context of each file

--zero
end each output line with NUL, not newline

-1
list one file per line

--help
display this help and exit

--version
output version information and exit

The SIZE argument is an integer and optional unit (example: 10K is 10*1024). Units are K,M,G,T,P,E,Z,Y,R,Q (powers of 1024) or KB,MB,... (powers of 1000). Binary prefixes can be used, too: KiB=K, MiB=M, and so on.

The TIME_STYLE argument can be full-iso, long-iso, iso, locale, or +FORMAT. FORMAT is interpreted like in **date(1)**. If FORMAT is FORMAT1<newline>FORMAT2, then FORMAT1 applies to non-recent files and FORMAT2 to recent files. TIME_STYLE prefixed with 'posix-' takes effect only outside the POSIX locale. Also the TIME_STYLE environment variable sets the default style to use.

The WHEN argument defaults to 'always' and can also be 'auto' or 'never'.

Using color to distinguish file types is disabled both by default and with **--color=never**. With **--color=auto**, ls emits color codes only when standard output is connected to a terminal. The LS_COLORS environment variable can change the settings. Use the **dircolors(1)** command to set it.

Exit status:

- 0 if OK,
- 1 if minor problems (e.g., cannot access subdirectory),
- 2 if serious trouble (e.g., cannot access command-line argument).

AUTHOR

Written by Richard M. Stallman and David MacKenzie.

REPORTING BUGS

GNU coreutils online help: <<https://www.gnu.org/software/coreutils/>>

Report any translation bugs to <<https://translationproject.org/team/>>

COPYRIGHT

Copyright © 2023 Free Software Foundation, Inc. License GPLv3+: GNU GPL version 3 or later <<https://gnu.org/licenses/gpl.html>>.

This is free software: you are free to change and redistribute it. There is NO WARRANTY, to the extent permitted by law.

SEE ALSO

dircolors(1)

Full documentation <<https://www.gnu.org/software/coreutils/ls>>
or available locally via: info '(coreutils) ls invocation'