**Advanced Operating Systems**

**Lab-1 16/08/2018**

**date**

Tue Aug 21 12:38:36 IST 2018

**calendar**

August 2018

Su Mo Tu We Th Fr Sa

1 2 3 4

5 6 7 8 9 10 11

12 13 14 15 16 17 18

19 20 \_ 2\_ 1 22 23 24 25

26 27 28 29 30 31

**man**

LS(1) User Commands LS(1)

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 speci‐

fied.

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

scale sizes by SIZE before printing them; e.g., '--block-size=M'

prints sizes in units of 1,048,576 bytes; 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 modification 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]

colorize the output; WHEN can be 'always' (default if omitted),

'auto', or 'never'; more info below

-d, --directory

list directories themselves, not their contents

-D, --dired

generate output designed for Emacs' dired mode

-f do not sort, enable -aU, disable -ls --color

-F, --classify

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

--file-type

likewise, except do not append '\*'

--format=WORD

across -x, commas -m, horizontal -x, long -l, single-column -1,

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/or -s, print human readable sizes (e.g., 1K 234M 2G)

--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 can be 'always' (default if omitted),

'auto', or 'never'

--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 disk usage

-l use a long listing format

-L, --dereference

when showing file information for a symbolic link, show informa‐

tion 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

-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)

--time=WORD

with -l, show time as WORD instead of default modification time:

atime or access or use (-u); ctime or status (-c); also use

specified time as sort key if --sort=time (newest first)

--time-style=STYLE

with -l, show times using style STYLE: full-iso, long-iso, iso,

locale, or +FORMAT; FORMAT is interpreted like in 'date'; if

FORMAT is FORMAT1<newline>FORMAT2, then FORMAT1 applies to

non-recent files and FORMAT2 to recent files; if STYLE is pre‐

fixed with 'posix-', STYLE takes effect only outside the POSIX

locale

-t sort by modification time, newest first

-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

-1 list one file per line. Avoid '\n' with -q or -b

--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 (powers of 1024) or KB,MB,...

(powers of 1000).

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 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: <http://www.gnu.org/software/coreutils/>

Report ls translation bugs to <http://translationproject.org/team/>

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GPL version 3 or later <http://gnu.org/licenses/gpl.html>.

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SEE ALSO

Full documentation at: <http://www.gnu.org/software/coreutils/ls>

or available locally via: info '(coreutils) ls invocation'

GNU coreutils 8.28 January 2018 LS(1)

**echo**

Hello

**ls**

a.out

biggest.c

os.txt

Toh.c

**pwd**

/home/raghu/Desktop

**cat**

Tue Aug 21 12:38:36 IST 2018

August 2018

Su Mo Tu We Th Fr Sa

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GNU coreutils 8.28 January 2018 LS(1)

Hello

a.out

biggest.c

os.txt

Toh.c

/home/raghu/Desktop

**sort -h**

-9

-3

-0

a

h

i

r

s

v

2

4 7

9

10

123

**sort -n**

-9

-3

-0

a

h

i

r

s

v

2

4 7

9

10

123

**wc**

15 15 39 3.txt

**head**

10

2

4 7

9

-0

-9

-3

123

a

r

**tail**

-9

-3

123

a

r

i

h

v

s

**more**

10

2

4 7

9

-0

-9

-3

123

a

r

i

h

v

s

**fibo.sh**

echo "Number of terms in the series.."

read range

a=0

b=1

i=2

echo "Fibonacci series upto $range terms is"

echo "$a"

echo "$b"

while[$i- $range]

do

i=`expr $i + 1`

c=`expr $a + $b`

echo "$c"

a=$b

b=$c

done