

NAME

openLTO – Bash scripts to manage LTO cartridges with LTFS

SYNOPSIS

copylto **-D** *desk* [**-I** *identifier*] [**-N** *name*] **-d** *desk* [**-i** *identifier*] [**-n** *name*]

copylto [**-D** *desk*] **-I** *identifier* [**-N** *name*] [**-d** *desk*] **-i** *identifier* [**-n** *name*]

copylto **-h**

Copy the content of one LTO cartridge onto another LTO cartridge.

-D source LTO *desk*

-I source cartridge's *identifier*

-N source cartridge's *name*

-d destination LTO *desk*

-i destination cartridge's *identifier*

-n destination cartridge's *name*

-h display a help message

Either the LTO *desk* or the cartridge's *identifier* is necessary for both source and destination.

The **copylto** function uses the **readlto** and **writelto** functions, but does not store temporarily the files onto the computer. It copies the full content of a cartridge.

When you need to modify the content of the source LTO cartridge before copying onto the destination LTO cartridge, use the **migratelto** function instead of **copylto**.

ejectlto **-d** *desk* | [**-d** *desk*] **-i** *identifier* | **-h**

Eject an LTO cartridge from a desk.

-d *desk*'s *identifier*

-i cartridge's *identifier*

-h display a help message

formatlto **-i** *identifier* [**-n** *name*] [**-c**] [**-f**] [**-d** *desk*] | **-h**

Format an LTO cartridge with LTFS.

-i The *identifier* of the cartridge is mandatory. It must be exactly 6 capital letters and/or numbers. Of course, it is good practice to use an unique identifier for each cartridge in the digital archive.

The *identifier* might possibly be followed by 'L5', 'L6', 'L7' or 'L8' specifying the drive generation or by 'M8' specifying the density code (i.e. it's a LTO-7 cartridge formatted as an LTO-8 cartridge), but all this is **not standard** and we do advise to avoid this.

-n The *name* of the cartridge is optional, but if no *name* is given, then the *identifier* is used as *name* as well.

-c If this optional flag is set, then lossless compression is used. It's good practice to not use compression in digital archives, especially not when the files are already lossless compressed.

-f If this optional flag is set, then formatting is forced. This is useful only when a cartridge needs to be re-formatted. An already formatted cartridge cannot be re-formatted without this flag.

Caveat: Any data on the cartridge will be destroyed.

-d The optional *desk* identification may be used for checking purposes.

-h display a help message

indexlto [**-d** *desk*] **-i** *identifier* [**-n** *name*] | **-h**

Establish the full index with a manifest of checksums of an LTO cartridge.

- d** The optional LTO *desk* may be used for checking purposes.
- i** The cartridge *identifier* to index is mandatory.
- n** The optional cartridge *name* may be used for checking purposes.
- h** display a help message

We do advise to record the full index on the LTO cartridge itself as well.

listlto -l | -h

List the available LTO desks.

- l** list the available LTO desks
- h** display a help message

loadlto -d desk [-i identifier] [-n name] | -h

Load an LTO cartridge into a desk.

- d** select the LTO *desk* to load the cartridge into
- i** The optional cartridge *identifier* may be used for checking purposes.
- n** The optional cartridge *name* may be used for checking purposes.
- h** display a help message

migratelto {-D desk [-I identifier] [-N name]} [-x path] -d desk [-i identifier]

migratelto -h

Migrate from one LTO generation to another LTO generation.

- D** one or more source *desk*'s identifiers
- I** one or more source cartridge's *identifier*
- N** one or more source cartridge's *name*
- x** *path* to script to execute

The data are read from the source desk, piped to the script, piped to writing onto the destination desk:

read | script | write

- d** destination *desk*'s identifier
- i** destination cartridge's *identifier*
- n** destination cartridge's *name*
- h** display a help message

This function may also be used to copy files from one LTO cartridge to another, when data transformation is needed, even between the same LTO generation.

mountlto [-d desk] -i identifier | -h

Mount an LTO cartridge which is loaded in a desk.

- d** The optional *desk*'s identifier may be used for checking purposes.
- i** cartridge's *identifier*
- h** display a help message

openlto -h | -v

About the **openLTO** package.

- h** display a help message
- v** display the running version

Calling **openlto** without parameters, doesn't gives an error message, but displays this man.

readlto [-D *desk*] [-I *identifier*] [-N *name*] [-P *path*] [-p *path*] [-h]

Read data from a mounted LTO cartridge to the computer.

- D The optional *desk*'s identifier may be used for checking purposes.
- I cartridge's *identifier*
- N The optional cartridge's *name* may be used for checking purposes.
- P *path* to source
- p *path* to destination
- h display a help message

recoverlto -h

Recover content by using back-up from an LTO cartridge.

- h display a help message

repairlto -d *desk* | -h

[Try to] repair a damaged LTO cartridge.

- d select the LTO *desk* to use
- h display a help message

searchlto [-d *desk*] [-i *identifier*] (-s *string*|-r *regex*)

searchlto -d *desk* (-s *string*|-r *regex*)

searchlto -h

Search a string or a regex over the full content of an LTO.

- d select the LTO *desk* to use
- i cartridge's *identifier*
- s *string* to search for
- r *regex* to search for
- h display a help message

It can be searched either by a string or a regular expression (regex). The syntax for regex in Bash is mandatory. Please note that searches over a full LTO cartridge take a **very long time**, especially when a regex is used.

selectlto -d *desk* | -h

Select an LTO desk to use.

- d select the LTO *desk* to use
- h display a help message

unmountlto -d *desk* [-i *identifier*] | -i *identifier* | -h

Unmount the LTO cartridge from a desk.

- d select the LTO *desk* to unmount from
- i *identifier* of the cartridge to unmount
If also the *desk* is passed, then the optional cartridge *identifier* may be used for checking purposes.
- h display a help message

verifylto -h

Verify the integrity of an LTO cartridge.

- h display a help message

writelto -P *path* [-d *desk*] [-i *identifier*] [-n *name*] | -h

Write data from the computer onto a mounted LTO cartridge.

- P** *path* from where to copy from
- d** The optional *desk*'s identifier may be used for checking purposes.
- i** cartridge's *identifier*
- n** The optional cartridge's *name* may be used for checking purposes.
- h** display a help message

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