

NAME

cryptsetup-convert – converts the device between LUKS1 and LUKS2 format

SYNOPSIS

cryptsetup convert *convert* **--type** <format> [**<options>**] <device>

DESCRIPTION

Converts the device between LUKS1 and LUKS2 format (if possible). The conversion will not be performed if there is an additional LUKS2 feature or LUKS1 has an unsupported header size.

For conversion from LUKS2 to LUKS1, all active keyslots must use the PBKDF2 key-derivation function. The PBKDF2 and anti-forensic filter (AF) hash must be the same as the hash used in the digest. All keyslot numbers must be lower than 8 (LUKS1 maximum slot number). There must be at least one active keyslot and no unbound or reencryption keyslots.

Conversion (both directions) must be performed on an inactive device. There must not be an active dm-crypt mapping established for the LUKS header requested for conversion.

The **--type** option is mandatory with the following accepted values: *luks1* or *luks2*.

WARNING: The *convert* action can destroy the LUKS header in the case of a crash during conversion or if a media error occurs. Always create a header backup before performing this operation!

<options> can be [**--header**, **--type**, **--disable-locks**].

OPTIONS**--batch-mode, -q**

Suppresses all confirmation questions. Use with care!

If the **--verify-passphrase** option is not specified, this option also switches off the passphrase verification.

--debug or **--debug-json**

Run in debug mode with full diagnostic logs. Debug output lines are always prefixed by #.

If **--debug-json** is used, additional LUKS2 JSON data structures are printed.

--disable-locks

Disable lock protection for metadata on disk. This option is valid only for LUKS2 and is ignored for other formats.

WARNING: Do not use this option unless you run cryptsetup in a restricted environment where locking is impossible to perform (where /run directory cannot be used).

--header <device or file storing the LUKS header>

Use a detached (separated) metadata device or file where the LUKS header is stored. This option allows one to store the ciphertext and LUKS header on different devices.

For commands that change the LUKS header (e.g., *luksAddKey*), specify the device or file with the LUKS header directly as the LUKS device.

--help, -?

Show help text and default parameters.

--type type

Specifies required device type, for more info, read the *BASIC ACTIONS* section in **cryptsetup(8)**.

--usage

Show short option help.

--version, -V

Show the program version.

REPORTING BUGS

Report bugs at cryptsetup mailing list <cryptsetup@lists.linux.dev> or in Issues project section <<https://gitlab.com/cryptsetup/cryptsetup/-/issues/new>>.

Please attach the output of the failed command with **--debug** option added.

SEE ALSO

Cryptsetup FAQ <<https://gitlab.com/cryptsetup/cryptsetup/wikis/FrequentlyAskedQuestions>>

cryptsetup(8), **integritysetup(8)** and **veritysetup(8)**

CRYPTSETUP

Part of cryptsetup project <<https://gitlab.com/cryptsetup/cryptsetup/>>.