

Upgrade Hot Swap to Direct Connect

This document describes how to upgrade a tape drive Hot-swap board to a Direct-connect board in either a NEO 2000 or NEO 4000 libraries from Overland Storage.

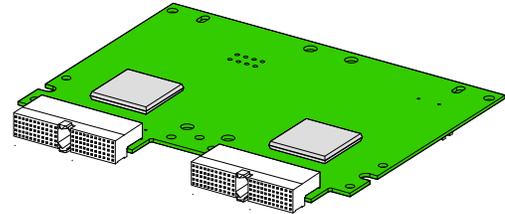
IMPORTANT: If using older SCSI LTO-4 tape drive assemblies, it is necessary to upgrade them to direct-connect assemblies. Contact Technical Support for additional information.

WARNING: To reduce the risk of electric shock or damage to equipment, always remove any power cords while working with the unit.

AVERTISSEMENT: Pour réduire le risque de choc électrique ou endommagement de l'équipement, retirez toujours les cordons électriques en travaillant avec l'appareil.

WARNING: It is recommended that a mechanical lifter (or at least two people) be used to raise and align the unit to prevent injury during installation.

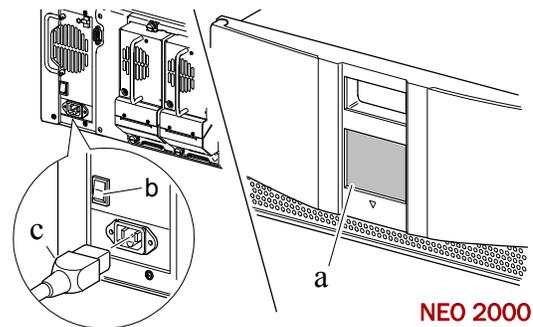
AVERTISSEMENT: Afin d'éviter des blessures pendant l'installation, il est recommandé d'utiliser un monte-charge (ou au moins deux personnes) pour élever ou aligner l'appareil.



CAUTION: While working with the unit, observe standard Electrostatic Discharge (ESD) precautions to prevent damage to micro-circuitry or static-sensitive devices.

Prepare the Unit

1. If the library is **operational**:
 - Remove any **cartridges** in the drives using the Touch Screen (a) or your application software.
 - If necessary, exit the **application software** and halt the operating system.
2. Power off the **library**:
 - a. Use the Touch Screen (a) to power down the **library**.
 - b. Turn all **power switches** (b) at the rear of the library to OFF (O).
 - c. Remove all **power cords** (c).

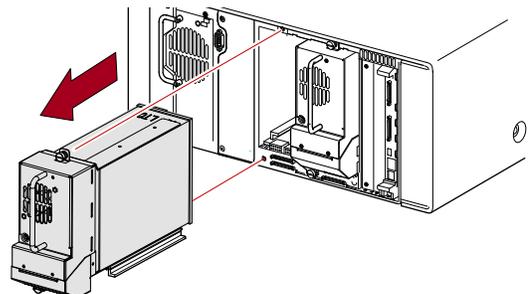


NEO 2000

3. Remove all **SCSI cables and terminators**.
4. Remove all **drive assemblies** from the drive bay being upgraded.

NOTE: It is recommended to upgrade BOTH drive bays of a NEO 4000 library

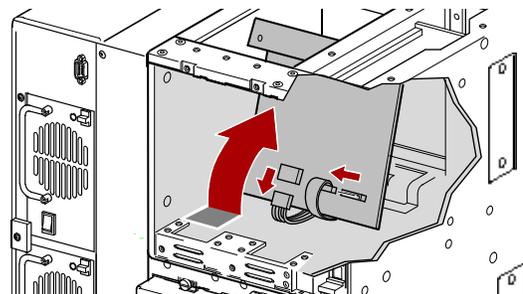
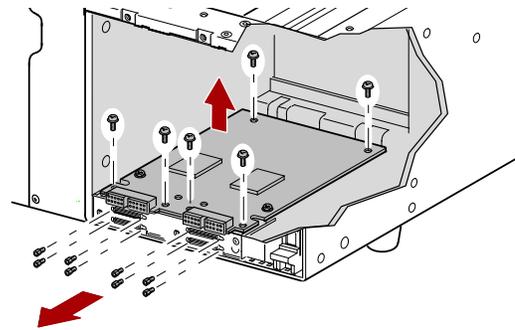
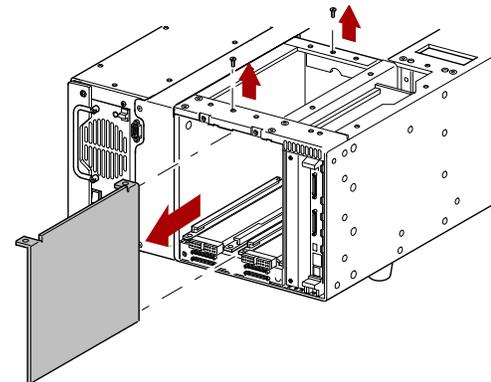
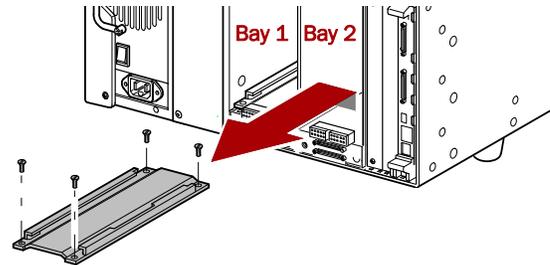
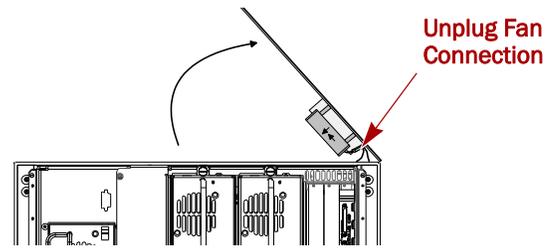
5. Using a mechanical lifter (or two people), remove the **unit** from the rack and place it on a secure ESD surface.



Remove the Hot-swap Board

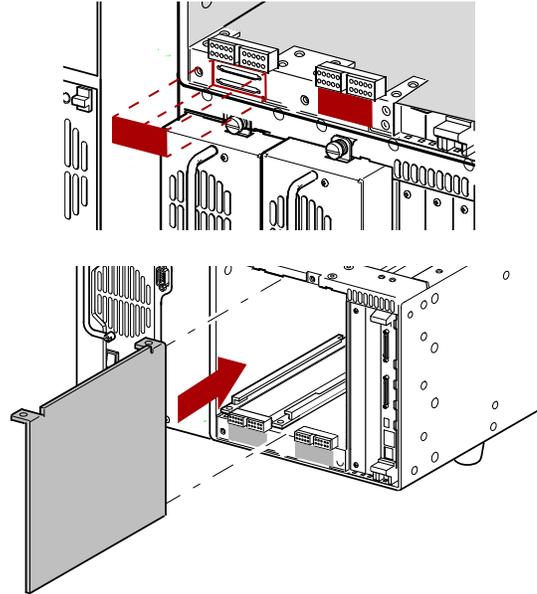
Use these instructions to remove the old Hot-swap board from either a NEO 2000 or NEO 4000 library:

1. Remove and retain the **11 screws** that secure the Fan Cover assembly to the top of the library chassis.
2. Carefully lift the cover's edge along the center of the library and disconnect the **cooling fan**.
Be careful not to put a strain on the cable.
3. Lift the **cover** up and away from the library and set it aside.
4. Remove two flat-head **screws** from the top of the Tape Drive Shield between Drive Bays 1 and 2.
5. Lean the Tape Drive Shield into Drive Bay 2 and remove the **four screws** holding the Drive 1 Guide, and then remove the guide.
6. Tilt the **Tape Drive Shield** to clear the library frame and remove it.
7. Remove the **Hot-swap board**:
 - a. Remove **eight jackscrews** from the VHDCI connectors.
 - b. Remove **six screws** that secure the Hot-swap board to the chassis.
 - c. Slide the Hot-swap board toward the **library front** until you can pivot the rear of it upwards and toward the front to access the bottom of the PCB.
 - d. Remove the **cables at J1 and J5**, and remove the board from the library.
8. If necessary, for a NEO 4000, repeat [Steps 4–7](#) for the other two **drive bays**.



Install the Direct-connect Board

1. Using the two supplied pieces of **tape**, cover the I/O slots previously used by the old board.
2. Install the **new Direct-connect board** into the library:
 - a. Vertically positioning the new board in the drive bay, attach the **J1 and J5 cables**.
 - b. Rotate the **board** down into its position.
 - c. Using six new M3x6 panhead **screws** and nylon **washers**, secure the board to the chassis.
3. Using four new stainless steel M3x10 screws, reattach the **Drive 2 guide**.
4. Tilting the **Tape Drive Shield** to clear the frame, reinsert it in the drive bay.
5. Using four new stainless steel M3x10 screws, reattach the **Drive 1 guide**.
6. Using two new M3x6 flathead screws, reattach the top of the **Tape Drive Shield** between Drive Bays 1 and 2.
7. If necessary, for a **NEO 4000**, repeat **Steps 1–6** for the other two drive bays.



Restore Library to Service



CAUTION: The Library must be running firmware version **6.02** or higher to use LTO-4 tape drives in it.

1. Reattach the **Fan Cover assembly** to chassis:
 - a. Position the assembly at an angle with the **outside edge** against the chassis.
 - b. Reattach the cooling fan **cable**.
 - c. Lower the **cover** and, using the 11 retained **screws**, secure the cover to the library chassis.
2. Using a mechanical lifter (or two people), reinstall the unit into the **rack**.
3. Reinstall all **drive assemblies** back into the drive bays.
4. Reattach all **SCSI cables and terminators** directly to the drive assemblies.
5. Reattach the **power cables**.
6. Turn the **switches** at the rear to ON (I) and power on the library.
Wait while POST completes.

