

StorageWorks

SW500-Series Cabinet Cable Distribution Unit Installation Guide

Order Number: EK-SW5CU-IG. B01

This document contains instructions for replacing StorageWorks SW500-series cabinet cable distribution units (CDUs) and for installing the cabinet's dual power option.

**Digital Equipment Corporation
Maynard, Massachusetts**

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NOTE: This equipment generates, uses, and may emit radio frequency energy. The equipment has been type tested and found to comply with the limits for a Class A digital device pursuant to Part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

Any changes or modifications made to this equipment may void the user's authority to operate the equipment.

Operation of this equipment in a residential area may cause interference in which case the user at his own expense will be required to take whatever measures may be required to correct the interference.

The equipment described in this manual is listed by the Underwriters Laboratories Incorporated and bears the UL Listing mark. SW500-series cabinets are also certified by the Canadian Standards Association and TÜV Product Service GmbH and bear both the CSA certification and TÜV GS marks. The equipment also complies with the requirements for CE-mark Class A.

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1 Cable Distribution Unit Replacement Procedure

The following procedure describes how to install a replacement cable distribution unit (CDU).

1. Check the contents of the field replaceable unit (FRU) kit against the appropriate parts list shown in Table 1 to verify that all the parts are present.

Table 1 Cable Distribution Unit FRU Kit Parts List

Kit option numbers SW5xP-AC (120V, 60 Hz), SW5xP-AD (230V, 50 Hz)		Quantity	
Digital Part Number	Description	-AC	-AD
EK-SW5CU-IG	CDU and dual power option installation guide	1	1
90-00063-39	Screw, 10-32 Phillips, 1/2"	4	4
90-07786-03	U-nut, 10-32	4	4
30-32959-05	Cable distribution unit, 120/230V, 60/50 Hz	1	1
17-00083-57	Power cable, NEMA 5-20 twist-lock plug	1	
17-01255-01	Power cable, IEC 309 plug		1
36-38274-01	Label, caution and cable ID	2	2

2. If the CDU to be replaced is installed in a single power system, spin down all disk drives and halt all tape drives in the cabinet.
(This step may not be necessary if the cabinet is configured with the dual power option. The system can be left turned on while the defective CDU is replaced.)

WARNING

Hazardous voltage is present within the cabinet. Use extreme caution when working around components to which power is applied.

3. Open the rear cabinet door to expose the CDU to be replaced.
4. Switch the circuit breaker on the front panel of the CDU to the ○ (OFF) position.
5. Disconnect the defective CDU's primary power cable from the power source.

Note

The primary power cable need not be replaced along with the CDU if it is in serviceable condition. The existing primary power cable may be left in place and used with the replacement CDU. If it is decided to replace the primary power cable, the new cable should be installed and routed in the same manner as the original cable.

6. Disconnect the defective CDU's primary power cable from the receptacle on the CDU's front panel.

7. While supporting the defective CDU, remove and retain the screws holding it to the cabinet chassis rails.

WARNING

Cabinet rail edges may be sharp and can slice or abrade skin and cable insulation.

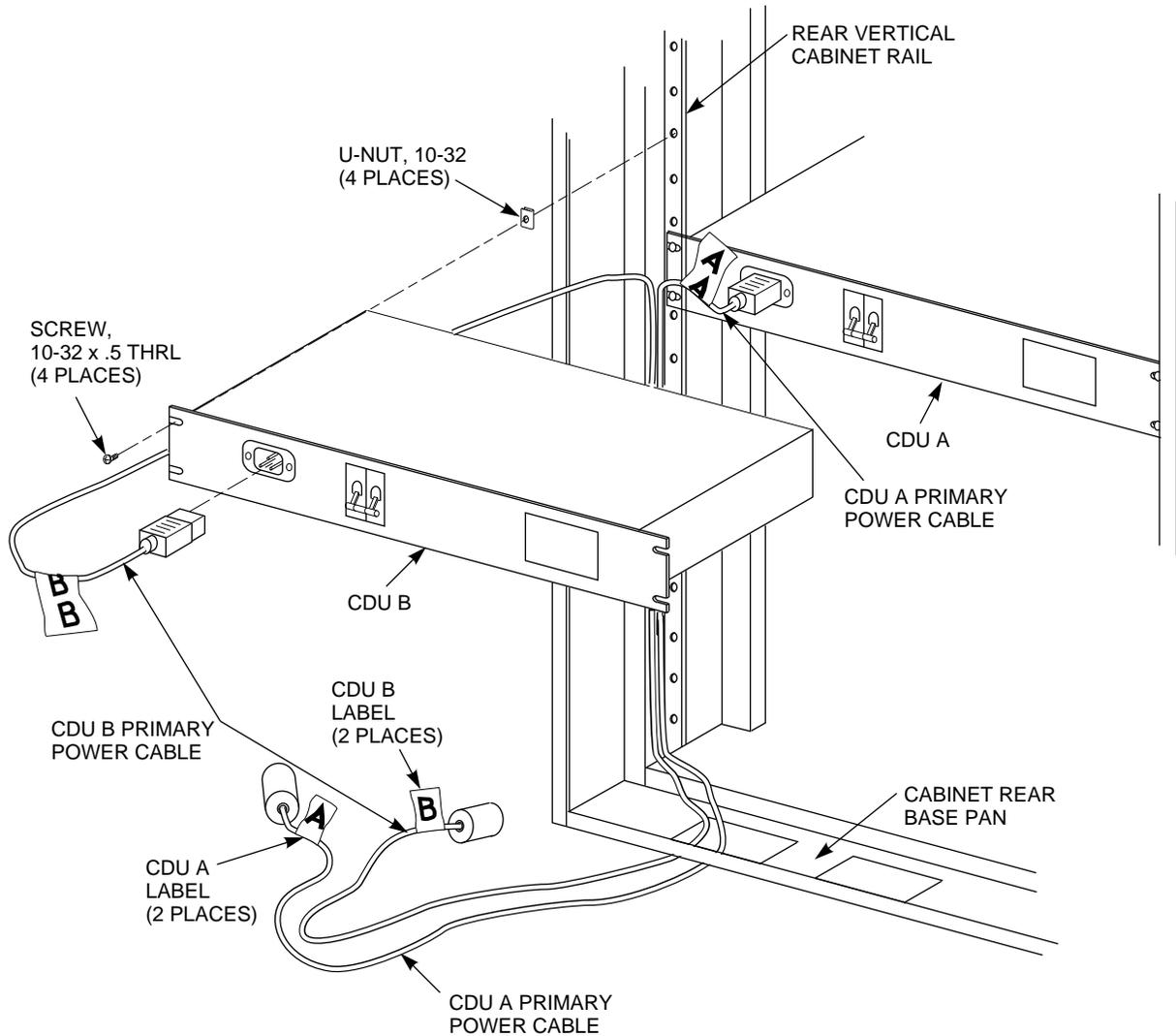
8. Gently pull the CDU from the cabinet while carefully guiding the cords attached to its rear panel through the cabinet opening.
9. Support the CDU while disconnecting the ac power cords from its rear panel. The cords need not be labeled for reconnection in the same place.
10. Remove the CDU completely from the cabinet.
11. Position the replacement CDU near the previously disconnected power cords.
12. While supporting the CDU, connect the power cords to the connectors on the CDU's rear panel. The cords may be connected in any order.
13. Slide the CDU into its mounting position while guiding the power cords into the cabinet.
14. Mount the CDU using the screws retained in step 7.
15. Connect the CDU's primary power cable to the receptacle on the CDU's front panel.
16. Connect the other end of the CDU's power cable to the appropriate power source.
17. Switch the front-panel circuit breaker on the CDU to the | (ON) position.
18. Close and secure the cabinet door.
19. Restart all disk and tape drives and check them for proper function.

2 Cabinet Dual Power Option Installation Procedure

The following procedure describes how to install the dual power option kit.

1. Check the contents of the dual power option kit against the parts list shown in Table 1 to verify that all the parts are present.
2. See Figure 1 to familiarize yourself with the location and identification of each of the CDUs to be configured for the dual power option.

Figure 1 CDU Installation



CXO-3904A-MC

3. Spin down all disk drives and halt all tape drives in the cabinet.
4. Open the rear cabinet door to expose CDU A.
5. Switch the circuit breaker on the front panel of CDU A to the ○ (OFF) position.
6. Disconnect CDU A's primary power cable from the power source.

Note

In some cases, it may be desirable to allow the host computer system to operate while the dual power option kit is being installed. In this instance, the cabinet may be isolated from power by disconnecting the host computer interface cables. Refer to the documentation for the host computer configuration for the steps necessary to disconnect the cables.

7. Isolate the cabinet electrically by powering down the host computer.
8. To install CDU B, you must have free access to the interior area of the cabinet. If necessary, gain access to the cabinet interior by separating the cabinet from adjacent ones and removing its side panels. Refer to the *StorageWorks SW500-Series Cabinet Installation and User's Guide* for details on exterior cabinet panels.

WARNING

Cabinet rail edges may be sharp and can slice or abrade skin and cable insulation.

9. Remove CDU B from its packing material.
10. Locate the 10 pre-installed gray power cords coiled in the interior of the cabinet. Bring the free end of each of the cords to the opening above CDU A.
11. Position CDU B at the opening above CDU A, as shown in Figure 1.
12. Plug the CDU plug of each gray cord into the rear panel of CDU B. The cords may be plugged in in any order.
13. Slide CDU B into position against the vertical cabinet rails.
14. Using the hardware provided in the kit, mount CDU B to the cabinet chassis rails, as shown in Figure 1.

WARNING

To prevent injury from electric shock, it is important that safety labels be properly applied. Confusion can result from the fact that the cabinet uses two primary power sources with the dual power option. Install the cable and cabinet labeling carefully in accordance with the instructions in steps 16 through 21.

15. Remove one of the yellow "A" labels in the kit from its backing paper and wrap it around the primary power cable for CDU A as close to the CDU end as possible, as shown in Figure 1.
16. Remove another of the yellow "A" labels in the kit from its backing paper and wrap it around the other (male) end of the primary power cable of CDU A, as shown in Figure 1.
17. Locate the primary power cable for CDU B in the kit.
18. Remove one of the yellow "B" labels in the kit from its backing paper and wrap it around the primary power cable for CDU B as close to the CDU (female) end as possible, as shown in Figure 1.

19. Remove another of the yellow "B" labels in the kit from its backing paper and wrap it around the other end of the primary power cable of CDU B, as shown in Figure 1.
20. Install the primary power cable for CDU B into the cabinet, as shown in Figure 1. Follow the same routing and use the same cable ties or clamps as the existing primary power cable.
21. Plug the CDU B primary power cable into the receptacle on the front panel of CDU B, as shown in Figure 1.
22. Remove one of the two yellow "CAUTION" labels from its backing paper and place it on the cabinet's top panel just above the rear door.
23. Remove the second yellow "CAUTION" label from its backing paper and place it inside the cabinet in the vertical channel just to the left of the two CDUs.
24. Make sure that the redundant dc power supply required for the dual power option is installed in each shelf. (The redundant dc power supply is the right-hand one.)
25. Plug the gray power cord preinstalled next to each shelf position into the redundant dc power supply in each shelf.
26. If the cabinet's host computer interface cables were disconnected in step 7, reconnect the cables.
27. Replace the cabinet side panels and reposition the cabinet next to adjacent ones as appropriate.
28. Reconnect the primary power cable from CDU A to its source.
29. Connect the primary power cable from CDU B to the auxiliary power source.
30. Switch the circuit breakers on both CDUs to the | (ON) position.
31. Close and secure the cabinet doors.
32. Restart all disk and tape drives and check them for proper function.

