Installing the NVR4 and NVR4X Avigilon Video Archive Connectivity Kit

The NVR4 Avigilon Video Archive Connectivity Kit provides all of the needed components to connect the Avigilon Video Archive to an NVR4(X) Standard or Premium recorder. Make sure that you use the connectivity kit that corresponds to your NVR model:

- **NVR4 PRM** and **NVR4 STD**: AVA-HED1-NVR4-CONNECT
- **NVR4X PRM 64/96/128/157TB**: AVA-HED1-NVR4X-PRM1-CONNECT
- **NVR4X PRM 192/217TB**: AVA-HED1-NVR4X-PRM2-CONNECT
- **NVR4X STD**: AVA-HED1-NVR4X-STD-CONNECT

You must install the converged network adapter (CNA) card provided in this connectivity kit in an NVR before you can connect it to an Avigilon Video Archive. The installation of the CNA card differs between the NVR4(X) Standard and Premium recorders, otherwise the installation procedure for each NVR is very similar. Differences between the recorders are noted in the steps of the installation procedure.

> ⚡ **WARNING —** If the NVR is an operating part of your surveillance system, it must be shut down to complete this procedure.

Prerequisites

Before you can deploy an Avigilon Video Archive into your security network, you must install the 2nd CPU Kit in any of the following NVRs that you are connecting to an Avigilon Video Archive. NVRs not mentioned below do not require the 2nd CPU Kit.

- **NVR4 STD**: HD-NVR4-STD-2NDCPU (ordered separately)
- **NVR4X PRM 64/96/128/157TB**: 2nd CPU Kit included with AVA-HED1-NVR4X-PRM1-CONNECT
- **NVR4X STD**: 2nd CPU Kit included with AVA-HED1-NVR4X-STD-CONNECT

Confirm Package Contents

Confirm that the kit you are installing contain the following components:
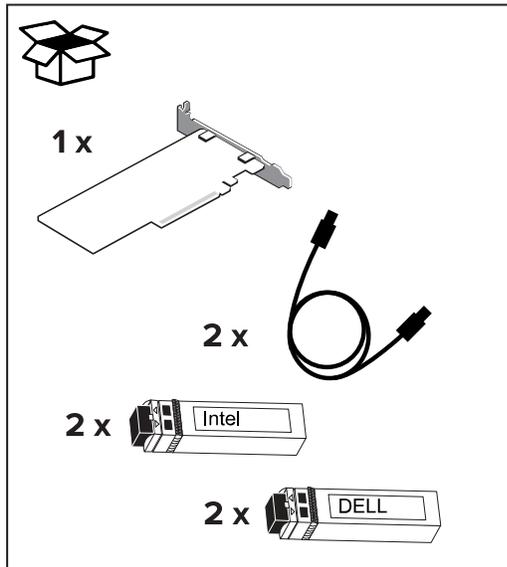
- 1 x CNA card
- 2 x optical cables (orange)
- 2 x Intel® SFP+ transceivers
- 2 x Dell SFP+ transceivers

Required Tools

The following tool is not supplied and is needed to complete the installation:

- Phillips #2 screwdriver — for removing and re-installing the NVR4 Premium hard drive tray

Important: It is recommended that you use a static mat or static strap to ground yourself against static shock.

Install the CNA Card

The half-height converged network adapter (CNA) card provides the two short-range optical transceiver receptacles needed to cable an NVR4 to an Avigilon Video Archive.

- NVR4 Standard and NVR4X Standard: Install the CNA card in PCI slot 4.
- NVR4 Premium and NVR4X Premium 64/96/128/157TB: Install the CNA card in PCI slot 4.
- NVR4X Premium 192/217TB: Install the CNA in PCI slot 2.

1. Shut down the recorder.

   You can skip this step if you are installing the kit on a new recorder that is not powered up.

   a. In the Avigilon Control Center (ACC) Admin Tool, click **Shut Down**.

      Wait for the application to display this message:

      The ACC Server is Not Running

   b. Shut down Windows.

2. Remove all network, power and peripheral cables from the recorder.

3. At the top of the recorder, unlock the latch release then lift and rotate the latch towards the back of the recorder.
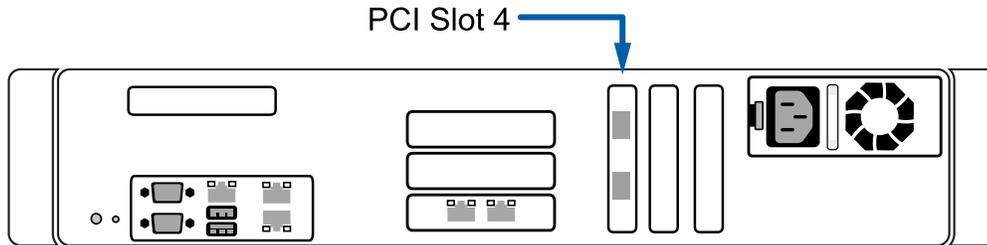
   The cover slides back and is released from the recorder body.
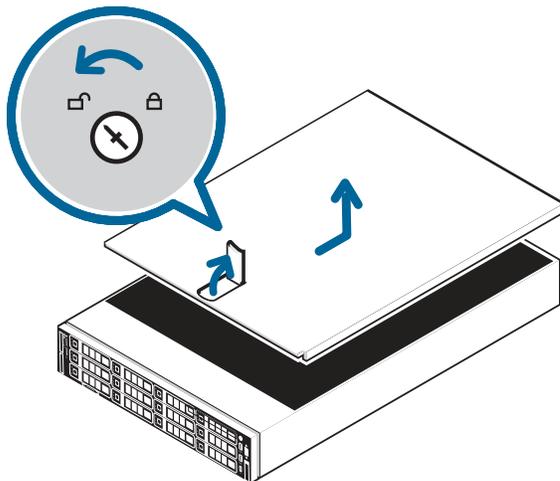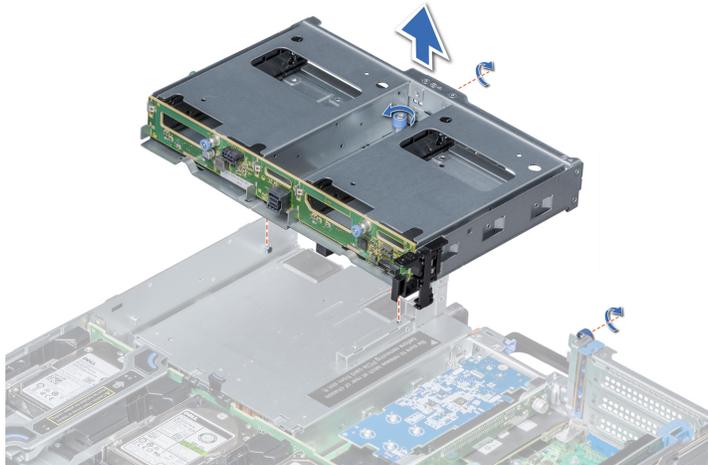
4. Install the CNA card:

NVR4 Standard, NVR4X Standard, and NVR4X Premium 64/96/128/157TB

    a. Remove the card blank from PCI slot 4.

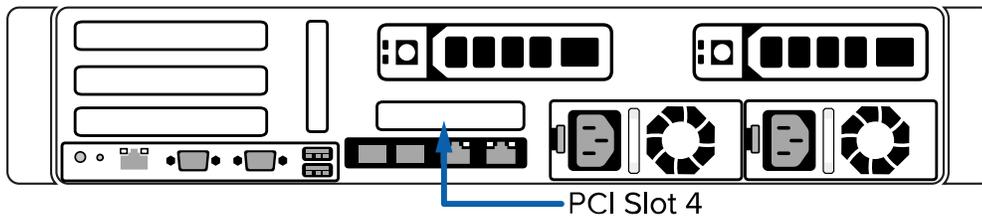   b. Insert and press the CNA card into slot 4. The card pins should be inserted all the way into the riser.

NVR4 Premium

    a. Using a Phillips #2 screwdriver, loosen the screws that secure the drive cage to the system. Hold the drive cage by its sides and lift it away from the system.
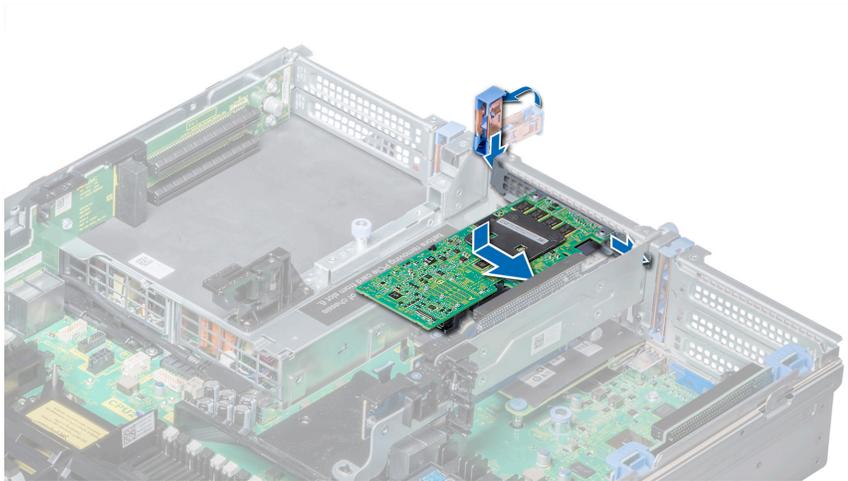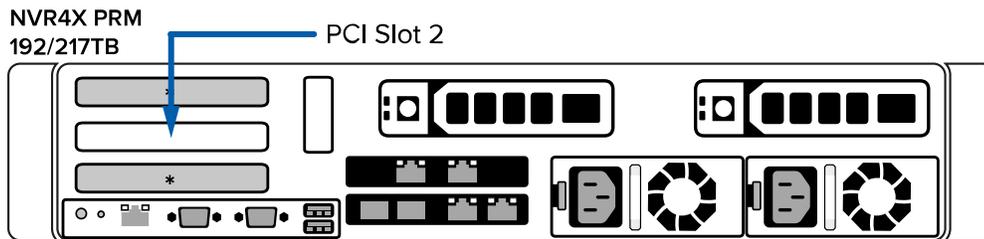

    b. Remove the card blank from PCI slot 4.

c. Insert and press the CNA card into slot 4. The card pins should be inserted all the way into the riser.

d. Use a Phillips #2 screwdriver to reinstall the drive cage to the system.

NVR4X Premium 192/217TB

a. Remove the card that is installed in PCI slot 1 so that you can access PCI slot 2.

b. Remove the card blank from PCI slot 2.

c. Insert and press the CNA card into slot 2. The card pins should be inserted all the way into the riser.

d. Re-install the card into PCI slot 1 that was removed in step a. The card pins should be inserted all the way into the riser.

5. Secure the CNA card in the chassis.

6. Close and lock the recorder cover.
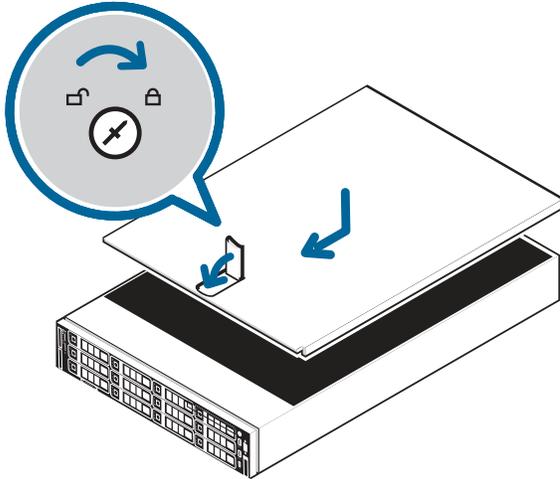
7. Reconnect all the cables to the recorder.
8. Power the recorder and log in to confirm the system is running properly.

Insert the SFP+ Transceivers in the Optical Transceiver Slots

To connect an NVR4 recorder to the cables in the NVR Avigilon Video Archive Connectivity Kit, Intel SFP+ transceivers must be installed in each of the two short-range optical transceiver receptacles:

- On the NVR4 Standard, NVR4X Standard, and NVR4X Premium 64/96/128/157TB recorders, plug the Intel SFP+ transceivers into the receptacles in the CNA card installed in PCI slot 4.
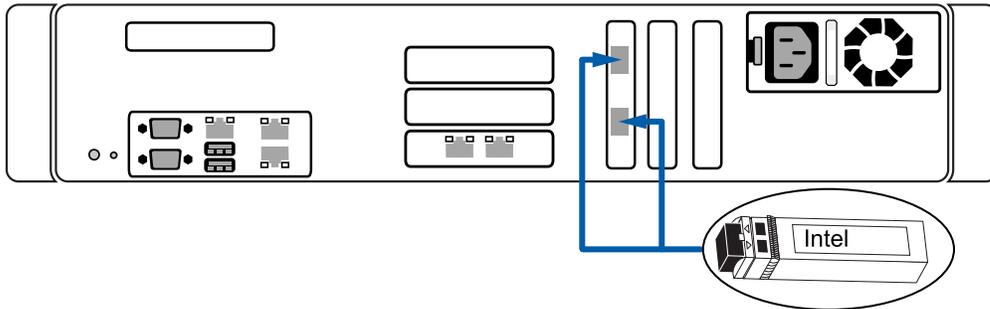
- On the NVR4 Premium recorder, plug the Intel SFP+ transceivers into the receptacles in the CNA card installed in PCI slot 4.
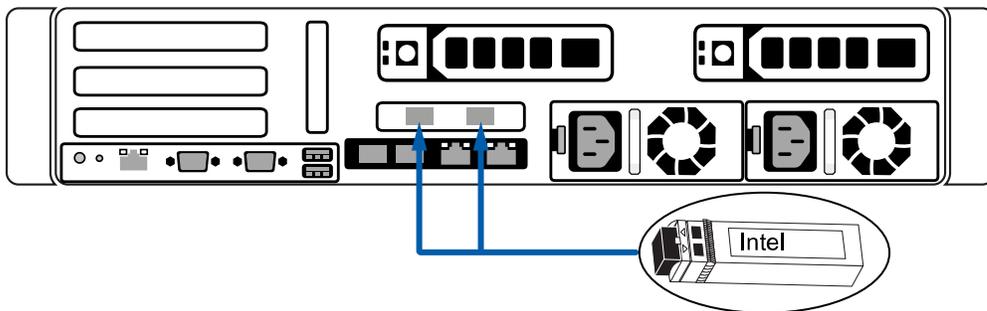
- On the NVR4X Premium 192/217TB recorder, plug the Intel SFP+ transceivers into the receptacles in the CNA card installed in PCI slot 2.
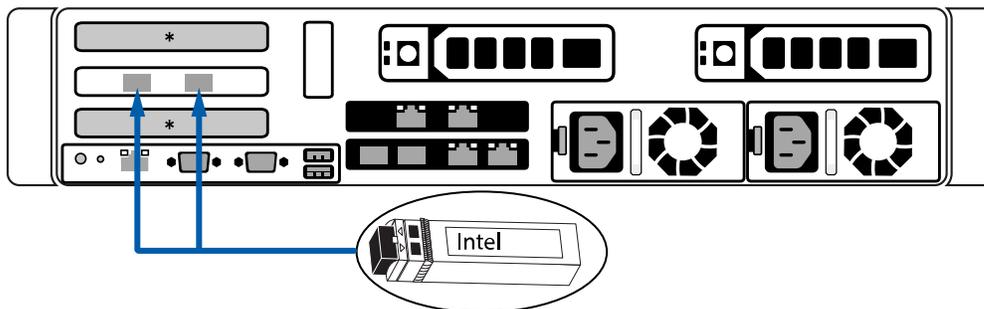
The NVR4 is now ready to be connected to the Avigilon Video Archive controller unit with the orange optical cables provided in the NVR4 Avigilon Video Archive Connectivity Kit.

Refer to the *Avigilon Video Archive Installation and Setup* guide available at **avigilon.com/support/infrastructure/ava** for instructions to connect the NVR4 to the Avigilon Video Archive controller unit.