

Installation Instructions

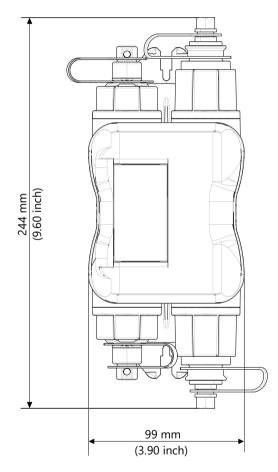
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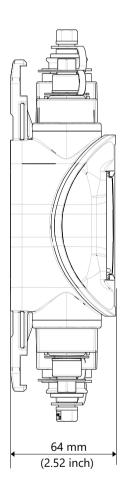
NOVUX™ Fiber Optic System SxT

1 About this manual

This publication provides user information for the installation of the NOVUX[™] SxT. The topics covered include a basic product description, installation and mounting guidelines and procedures for use and maintenance of hardened connectors and adapters. Also warnings and cautions are indicated, which should be observed before starting the product installation. Images in this manual are for reference only and are subject to change.

2 Dimensions





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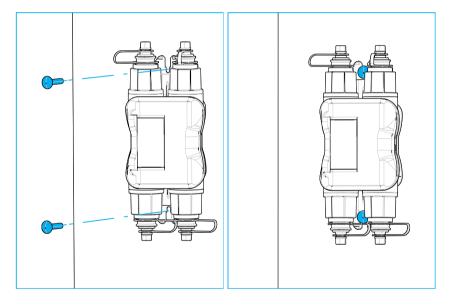


- Follow the installation instruction steps to ensure the performance of the closure. It is necessary to take precautions and keep the working space clean to protect the closure sealing materials and splices.
- Exposure to laser radiation can seriously damage the retina of the eye. Do not look into the ends of any optical fiber. Do not assume the laser power is turned off or that the fiber is disconnected at the other end. Looking into the ends of any optical fiber is entirely at your own risk. A protective cap or hood MUST be immediately placed over any radiating adapter or optical fiber connector to avoid the potential of dangerous amounts of radiation exposure. This practice also prevents dirt particles from entering the connector and adapter.
- Fiber optic cables may be damaged if bent or curved to a radius that is less than the recommended minimum bend radius. Always observe the recommended bend radius limit when installing fiber optic cables, subunits and patch cords.

4 Mounting the SxT

4.1 Flat surface mounting

4.1.1 Flat surface mounting with screws

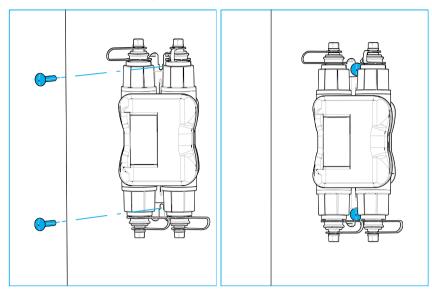


Note: Flat surface mount hardware (screws) not included.

Note: Wall mounting is not allowed in the USA due to lack of UL listing.

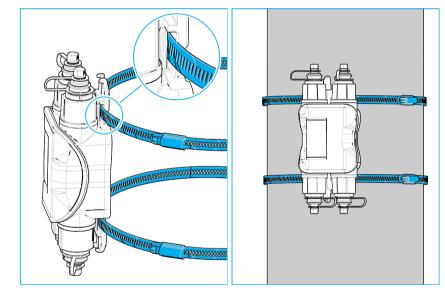
4.2 Pole mounting

4.2.1 Pole mounting with screws



Note: Pole mount hardware (screws) not included.

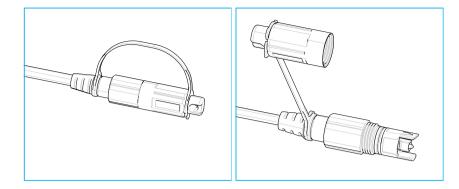
4.2.2 Pole mounting with straps



Note: Pole mount hardware (straps) not included.

5 Full Size connector installation

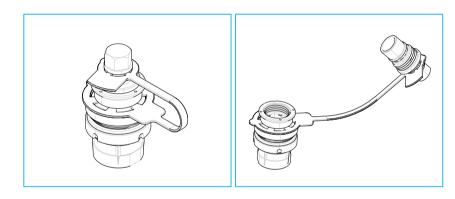
5.1 Connector components



The full size hardened connectors and adapters provide sealed environmental protection. The basic components of the drop cable connector are shown in the figure above. The dust cap threads onto the connector coupling nut. The O-ring on the connector body provides a tight seal when the dust cap is in place. A pulling eye is provided in the end of the dust cap for pulling the drop cable through conduit.

Note: Do not exceed a pulling force of 445 N (100 lbf) and when connected, don't exceed cable pull of 111 N (25 lbf).

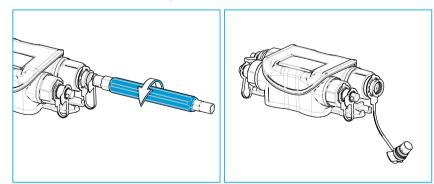
5.2 Adapter components



The dust cap threads into the adapter housing. An O-ring on the dust cap provides a tight seal when the dust cap is in place.

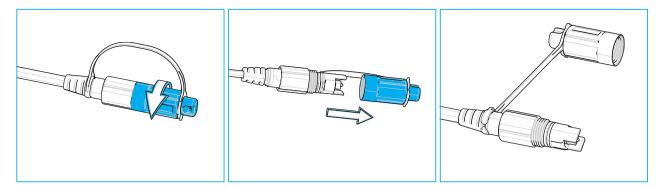
5.3 Connecting the Full Size connector

5.3.1 Remove dust caps



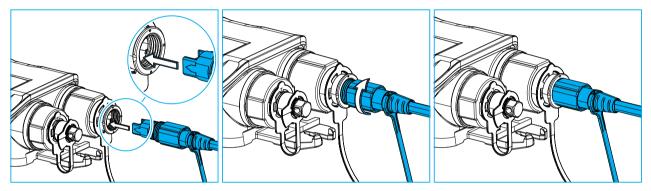
1 Use a 216B key tool to unscrew the dust cap from the SxT optical port.

Note: The 216B key tool is not included.



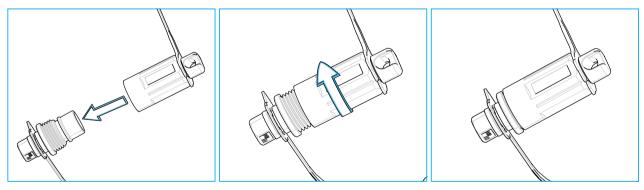
- 2 Unscrew the dust cap from the cable connector.
- 3 Pull the dust cap off.
- **Note:** Field personnel must take care when proceeding to remove dust caps on the full size hardened connector at the adapter plugs or cables, to prevent contaminant particles entering to the adapters or connector end-face.

5.3.2 Install the Full Size connector



- 1 Align the drop cable connector with the optical port. The pointer on the drop cable connector should line up with the notch on the optical port.
- 2 Insert the drop cable connector into the optical port. If the drop cable connector does not insert all the way to the bottom of the port, rotate drop cable connector slightly to either side until it slides freely into place.
- 3 Thread the drop cable connector coupling nut into the optical port and tighten coupling nut until finger tight.

5.3.3 Secure dust caps



- 1 Thread the optical port dust cap into the drop cable dust cap.
- 2 Tighten both dust caps finger tight.
- 3 This ensures that both dust caps will stay clean when not in use.

5.4 Disconnecting the Full Size connector

1 Unscrew the optical port dust cap from the drop cable dust cap.

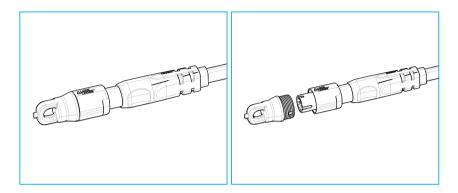
- 2 Unscrew the drop cable connector coupling nut from the optical port and pull the connector straight out of the adapter.
- 3 Thread the optical port dust cap into the optical port and tighten using a 216B key tool.
- 4 Thread the drop cable dust cap onto the drop cable connector coupling nut until finger tight.

5.5 Full Size connector cleaning

The connectors and adapters are cleaned at the factory, however inadvertent contact and/or dust can still occur during transport, storage and installation. CommScope recommends all connector interfaces be cleaned prior to every mating. To clean the connector interface, follow the procedure as described in the installation instruction "cleaning hardened connectors".

6 HMFOC connector installation

6.1 Connector components

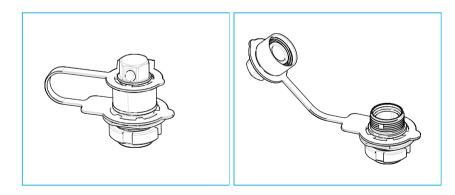


Terminals are available with an HMFOC connector at the end of the tail; the HMFOC is a hardened 12 fiber connector that can be used for many applications. The primary application is to connect indexing terminals in a cascade or to connect an indexing terminal to the Fiber Distribution Hub (FDH) or Closure, to extend the distribution network. The connector on the tail is the non-pinned female plug; the connector is protected by a dust cap. The O-ring on the connector body provides a watertight seal when the dust cap is in place. A pulling eye is provided in the end of the dust cap for pulling the drop cable.



Note: Do not exceed a pulling force of 445 N (100 lbf) and when connected, don't exceed cable pull of 111 N (25 lbf). A properly rated breakaway swivel should be used between the pull rope and the pulling cap.

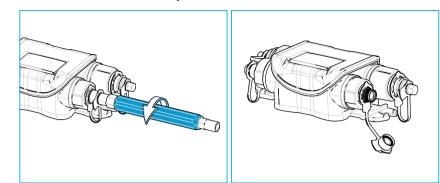
6.2 Adapter components



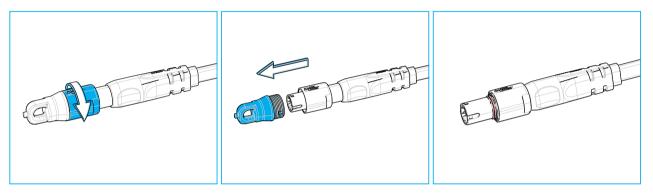
The connector inside the adapter is a pinned, male jack. It is a captured Multi-fiber Push On (MPO) connector.

6.3 Connecting the HMFOC connector

6.3.1 Remove dust caps



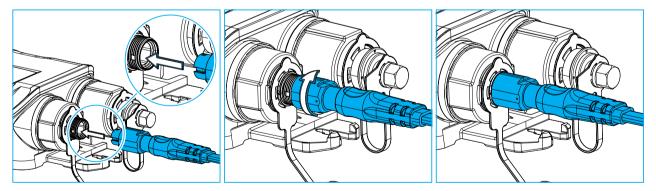
- 1 Use a 216B key tool to unscrew the dust cap.
 - **Note:** The 216B key tool is not included.



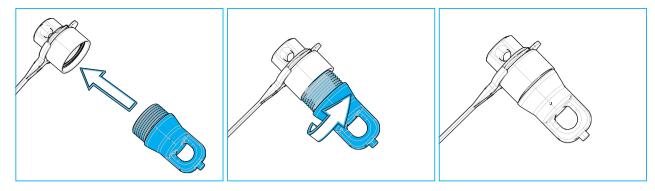
- 2 Unscrew the coupling nut from the cable connector dust cap.
- 3 Pull the dust cap off.

Note: Field personnel must take care when proceeding to remove dust caps on the full size hardened connector at the adapter plugs or cables, to prevent contaminant particles entering to the adapters or connector end-face.

6.3.2 Install the HMFOC connector



- 1 Find the alignment keys on the adapter port (square notch in the thread area) and on the connector (groove). And push the plug connector in the jack of the adapter port until it seats.
- 2 Thread the cable connector's coupling nut onto the thread of the adapter port until it is finger tight.



- 1 Thread the drop cable dust cap into the optical port dust cap.
- 2 Tighten both dust caps finger tight.
- 3 This ensures that both dust caps will stay clean when not in use.

6.4 Disconnecting the HMFOC connector

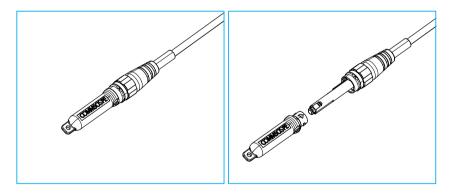
- 1 Unscrew the drop cable connector coupling nut until the thread of the adapter port is completely free.
- 2 Grasp the connector and pull it straight out of the adapter. The pull-out force to remove the connector should be minimum once the coupling nut is fully disengaged.
- 3 Uncouple the two dust caps.
- 4 Thread the optical port dust cap into the optical port until finger tight.
- 5 Thread the drop cable connector coupling nut into the drop cable dust cap until finger tight.

6.5 HMFOC connector cleaning

The connectors and adapters are cleaned at the factory, however inadvertent contact and/or dust can still occur during transport, storage and installation. CommScope recommends all connector interfaces be cleaned prior to every mating. To clean the connector interface, follow the procedure as described in the installation instruction "cleaning hardened connectors".

7 Prodigy connector installation

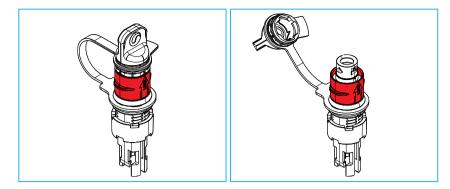
7.1 Connector components



The basic components of the drop cable connector are shown in the figure above. The dust cap threads onto the connector. Prodigy connects easily with a 45-degree twist to lock the connector core in the adapter, and provides a self-locking mechanism with an audible click. A pulling eye is provided in the end of the dust cap for pulling the drop cable through conduit.

Note: Do not exceed a pulling force of 445 N (100 lbf) and when connected, don't exceed cable pull of 111 N (25lbf).

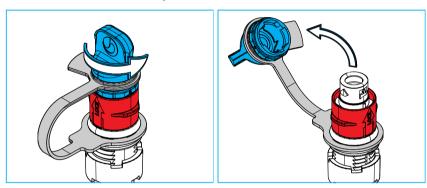
7.2



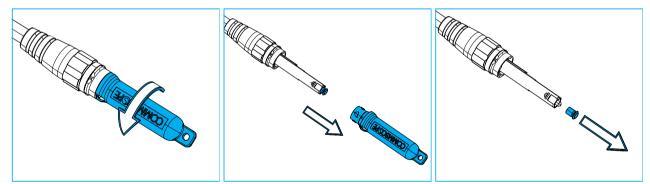
The basic components of the adapter are shown in the figure above. The dust cap threads onto the adapter housing.

7.3 Connecting the Prodigy connector

7.3.1 Remove dust cap

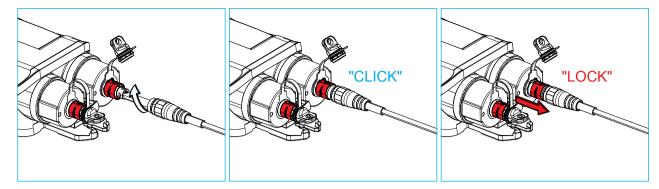


- 1 Unscrew the dust cap from the adapter housing.
- 2 Pull the dust cap off.



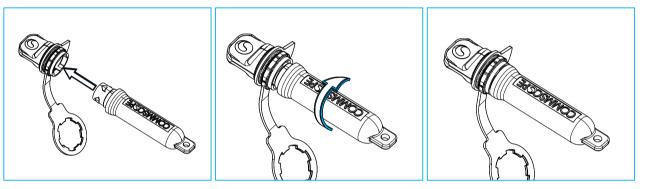
- 3 Unscrew the dust cap from the connector.
- 4 Pull the dust cap off.
- 5 Pull the "small" dust cap off.

7.3.2 Install the Prodigy connector



- 1 The Prodigy connects with a 45-degree twist to lock the connector core in the adapter.
- 2 The connector provides a self-locking mechanism with audible "click".
- 3 Pull the locking ring up as shown in the figure.

7.3.3 Secure dust caps



- 1 Thread the drop cable dust cap into the adapter dust cap.
- 2 Tighten both dust caps until finger tight.
- 3 This ensures that both dust caps will stay clean when not in use.

7.4 Disconnecting the Prodigy connector

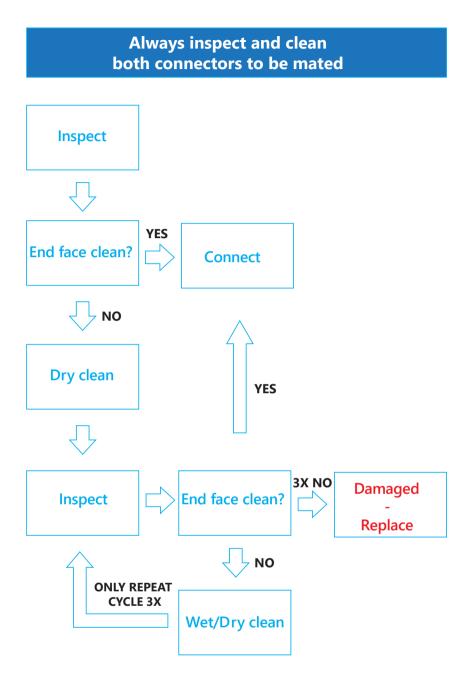
- 1 Unscrew the drop cable dust cap from the adapter dust cap.
- 2 Pull the locking ring down to "unlock" the connector.
- 3 Grasp the connector and pull it out with a "45-degree twist to unlock" out of the adapter.
- 4 Thread the adapter dust cap into the optical port until finger tight.
- 5 Thread the drop cable connector into the drop cable dust cap until finger tight.

7.5 Prodigy connector cleaning

The connectors and adapters are cleaned at the factory, however inadvertent contact and/or dust can still occur during transport, storage and installation. CommScope recommends all connector interfaces be cleaned prior to every mating. To clean the connector interface, follow the procedure as described in the installation instruction "cleaning hardened connectors". To clean the connector interface, follow the procedure as described in the installation instruction "cleaning hardened hardened connectors".

8 Maintenance

Follow specific cleaning instructions outlined for each specific connection type using the below Inspect/Clean Cycle.



Note: CommScope[®] is not responsible for damage caused by cleaning.

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