

### Introduction



This instruction contains information how to terminate Hybrid Micro cable to Termination Box HNCD 520 232. The Termination Box is a part of Hexatronic Powered Fiber Network and shall only be powered by that system. It is designed to be mounted in a weather protected area on wall or in suitable cabinet.

**To be installed by a person whose qualifications meet the requirements of the national electrical regulations for 120 Vdc.**

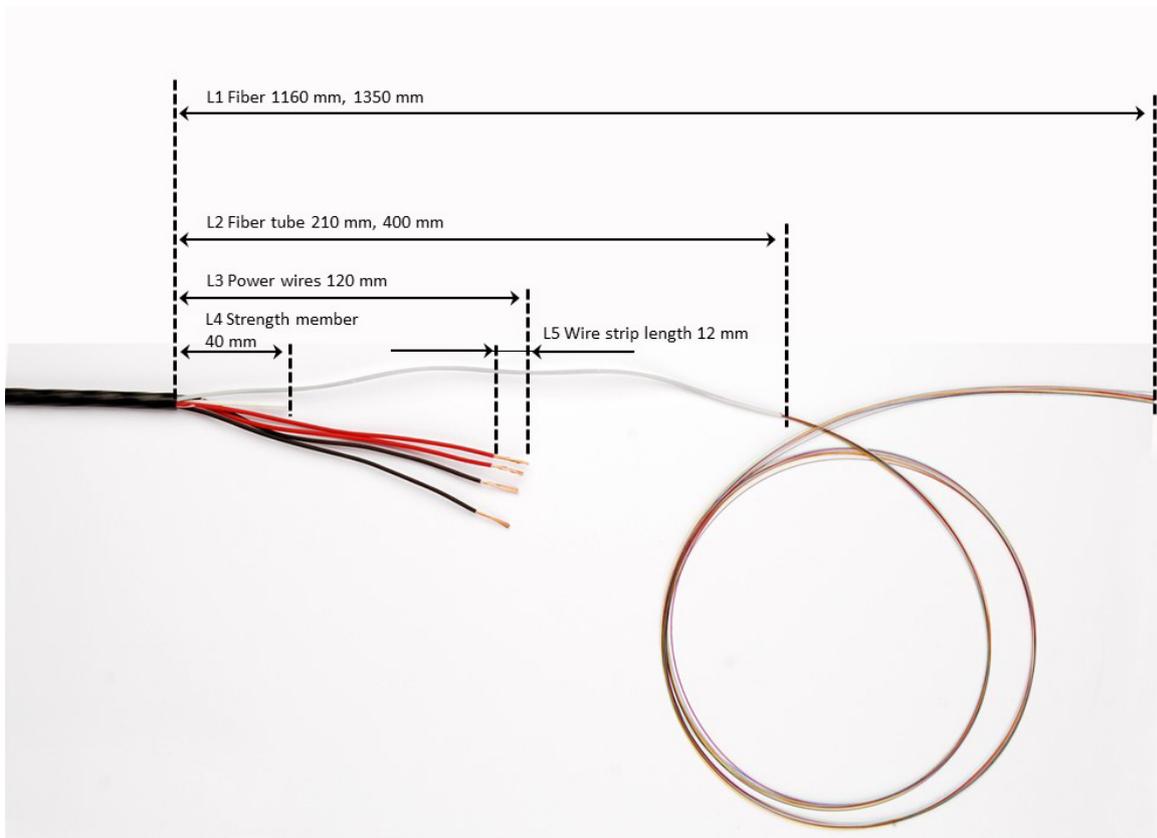
#### Included parts

- Termination box
- Tie straps
- Plastic tube



### Prepare the Hybrid Micro cable

Open and prepare the Hybrid Micro Cable according to instruction 1531-TOL40790+  
The incoming hybrid cable cut length have another routing in box then outgoing so there are two different cutting lengths for L1, L2 in figure below:  
Incoming Hybrid cable L1 = 1160 mm, L2 = 210 mm, L3 = 120 mm, L4 = 40 mm, L5 = 12 mm  
Outgoing Hybrid cable L1 = 1350 mm, L2 = 400 mm, L3 = 120 mm, L4 = 40 mm, L5 = 12 mm



# Installation Instructions

## Hybrid Termination Box HNCD 520 232

### Open the termination box

The termination box is opened by one screw close to cable entrance



### Mounting of media converter

The service area in terminal box has several options for mounting of media switches.  
(Note detail installation instructions are enclosed each media converter/switch.)

- DIN Rail could be fastened at side wall according to picture below (not included).



- **Mounting media converter on baseplate**

The mounting plate at bottom have several options for fastening media converter/switches and is removable for easier handling.



- **Connection field on baseplate**



# Installation Instructions

## Hybrid Termination Box HNCD 520 232

### Mounting of hybrid micro cable

Twist the two red stripped wires together and the two black stripped wires together.

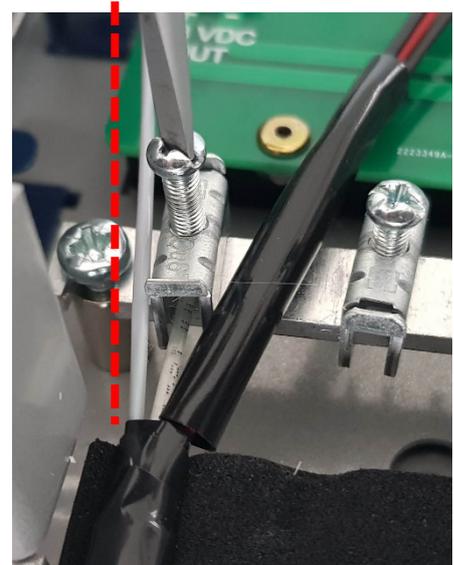


Put a piece (40mm) of the enclosed black plastic tube above the wires (*Electrical protection*)

Mount the cable strength member to the strain relief. Tighten carefully the strain relief with a slotted screwdriver. (*Overdoing tighten will crush the strength member*).

Route the fiber tube according to the dotted line and make sure the cable jacket is within the cable gasket.

Use a slotted screwdriver to fasten the strain relief.

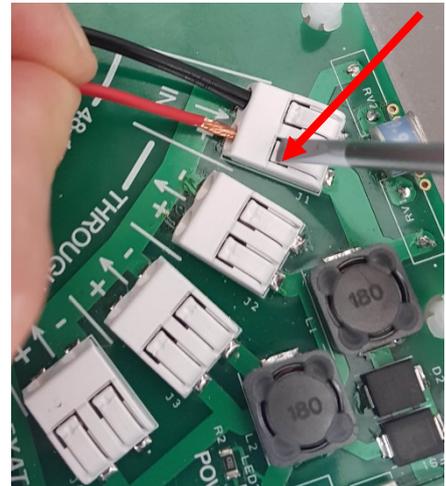


### Connect power wires

Connect the power wires to one of the connecting blocks marked with 110 Vdc.

**Red wires to + and black wires to -**

Ensure there are no wires that could cause electrical shortage  
The power terminal blocks are opened for terminating the wires by a **gentle press** on the area marked with arrow in picture. Use a slotted screw driver with a tip about 2mm wide.



### Extended Network

To extend the network, repeat the procedure for additional hybrid cables



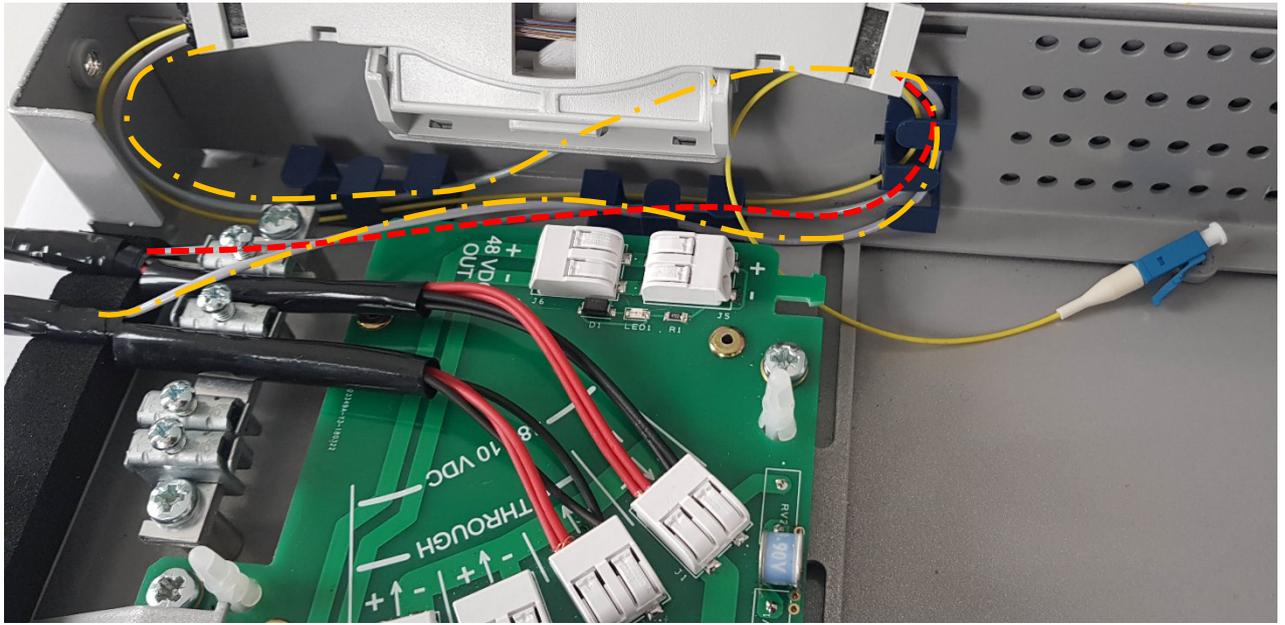
# Installation Instructions

## Hybrid Termination Box HNCD 520 232

### Routing fiber tubes

Route the fiber tubes and Pigtail to splice tray according to picture below. Route the incoming hybrid cable to the rightmost entrance of splice tray (dotted line in picture below).

Route fiber tubes from extending cables and Pigtail for media converter to the leftmost entrance according to the dash dotted line in picture below.

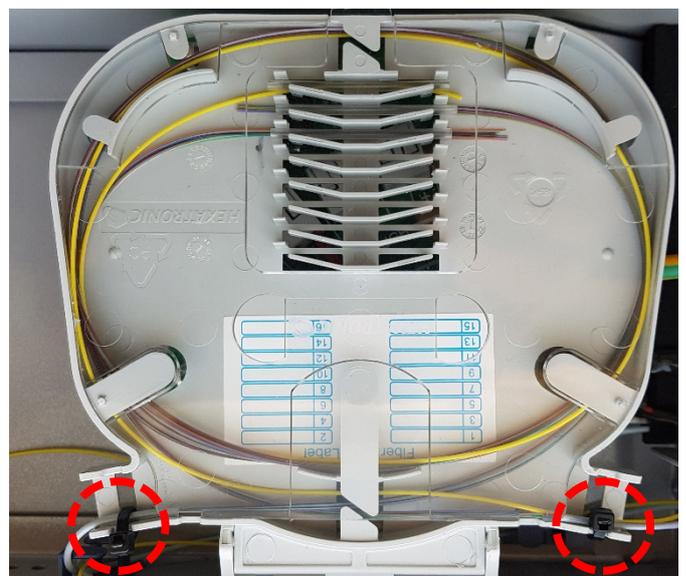
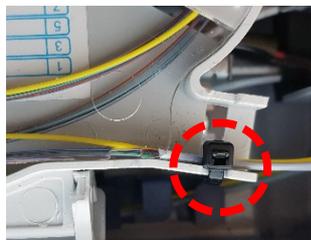


### Splicing fiber

Fastened the fiber tubes to splice tray entrance with the included plastic tie straps.

Splice the fibers of hybrid micro cable to suitable number of fiber pigtails and extended network hybrid fiber cables.

Place the splice in splice holder and wind overlengths of fiber according to picture.

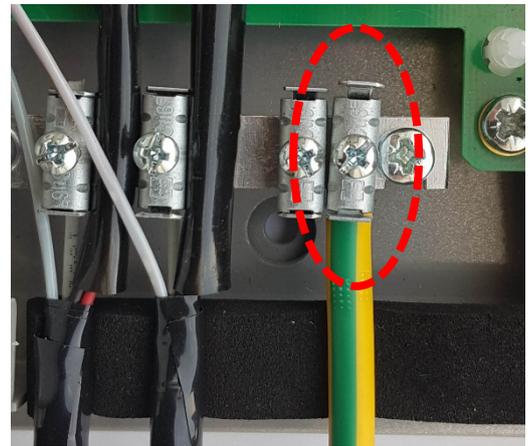


# Installation Instructions

## Hybrid Termination Box HNCD 520 232

### Grounding of termination box

For installation with risk for induced currents from power wires and overvoltage in areas with high risk of lightning. Grounding of the box is enabled by connecting a grounding wire to one of the strain relief connected to box chassis and grounding of printed circuit board.



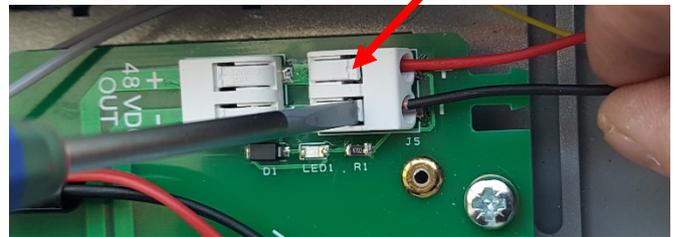
### Connect 48 Vdc power wires

Connect the power wires to one of the connecting blocks marked with 48 Vdc.

#### **Red wires to + and black wires to -**

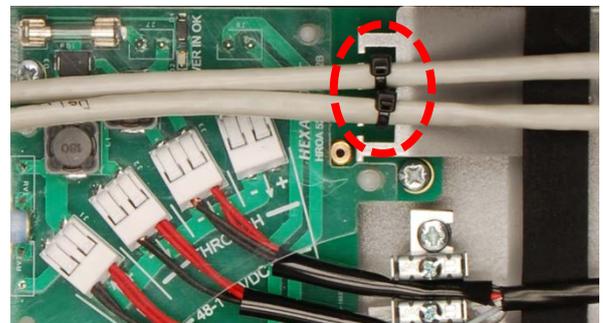
Ensure there are no wires that could cause electrical shortage

*The power terminal blocks are opened for terminating the wires by a gentle press on the area marked with arrow in picture. Use a slotted screw driver with a tip about 2mm wide.*



### Service cables from media converter

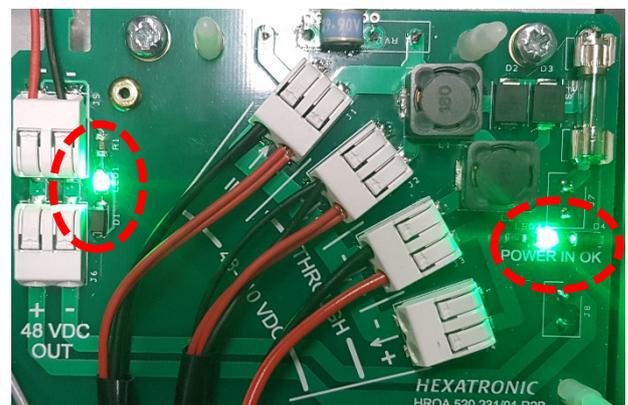
Strain relief for data cables (e.g. UTP CAT6) from Media converter could be strapped with included tie wraps



### Powering up

There are two LED indications for proper powering.

- Power in for 110 Vdc input power
- Power out at termination blocks 48 Vdc



# Installation Instructions

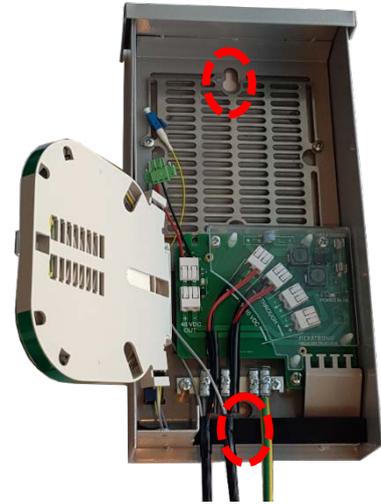
## Hybrid Termination Box HNCD 520 232

### Mounting of hybrid box

The box is equipped with two holes for fastening on wall. Mount the top screw on wall without tighten. Hang the box and slide it down according to pictures below.



Then mount the lower screw and tighten top screw



### Close the termination box

The termination box is closed by one screw close to cable entrance



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