

Mechanical

1. Uncrate the display sections and check the integrity of the cabinet. Check for any obvious deformation or flaws from transport. Refer to the DD3016690 DVX-11X2/1502/1801 Series Shipping Frame Field Instructions for crate disassembly instructions. The mounting and interconnect hardware is included in colored bags in the display sections. The bag color and storage locations are as follows:

- Interconnect hardware: blue bag in the bottom of each stacked or single-high section
- Mounting hardware: red bag in one section of each crate
- Weldless hardware: green bag in the bottom of each stacked or single-high section (if applicable)

2. Use the lifting lugs on the full-height tubes to lift the sections into place. Refer to **Figure 1 on page 1**. Install the bottom-center section (Section 202 in **Figure 2 on page 1**) first unless otherwise specified.

3. Ensure the first section installed is vertically plumb and horizontally level before permanently attaching it to the structure.

- For all subsequent sections, install all interconnect hardware in any adjacent sections while still attached to the crane and before permanently attaching to the structure. Refer to **Figure 2 on page 1** for connection details.

4. Secure the section until it is permanently attached to the structure using only one of the two methods described below:

- Leave the crane connected to the section lifting lugs until Step 8 is complete and the section is permanently attached to the structure.
- Install 1/2" eyebolts in the rear of the full-height tubes if a sufficient structure exists and tie come-along winches back to the structure. Refer to **Figure 3 on page 1**. After the section is secured with the come-along winches, the crane can be released to pick up the next section. The come-along winches should remain attached to the section until Step 8 is complete and the section is permanently attached to the structure.

5. Adjust the top and bottom clip angles flush to the structure surface.

Note: A minimum clearance of 1" is required behind vents if both the intake and exhaust vents are covered.

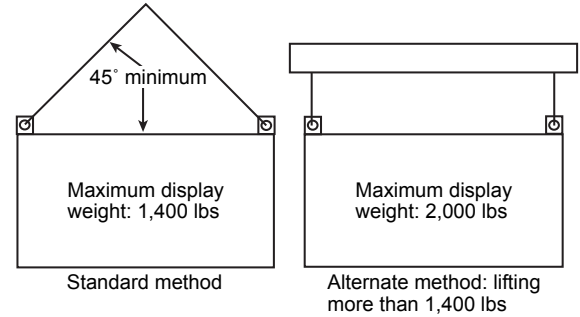


Figure 1: Lifting Method Diagram

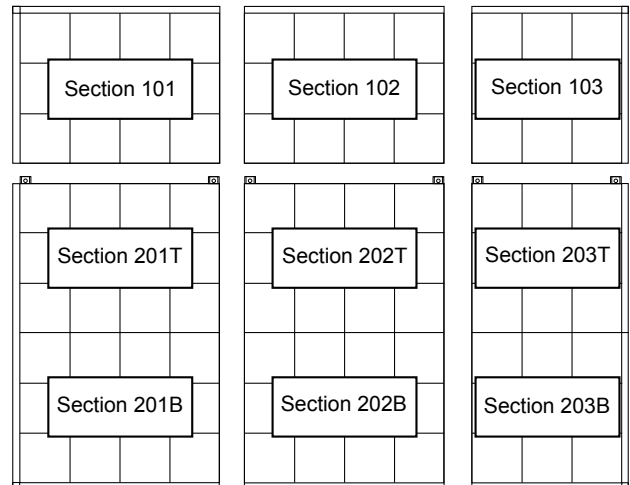


Figure 2: Front View

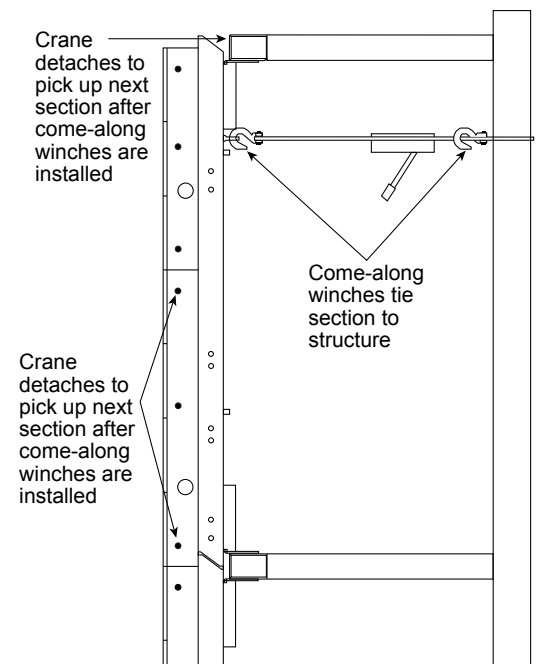


Figure 3: Keeping Section in Place

6. Inspect the corner blocks on the installed sections visually to ensure the faces shown in **Figure 4 on page 2** and **Figure 5 on page 2** are flush and aligned.

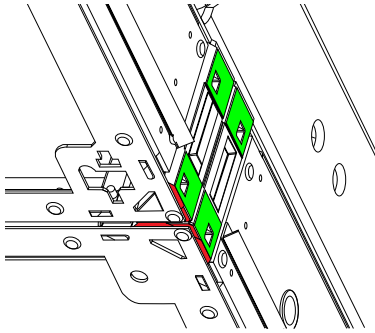


Figure 4: Inspecting Corner Blocks (Side View)

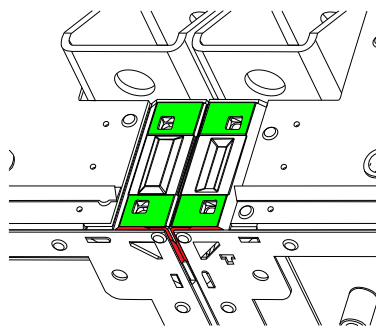


Figure 5: Inspecting Corner Blocks (Top View)

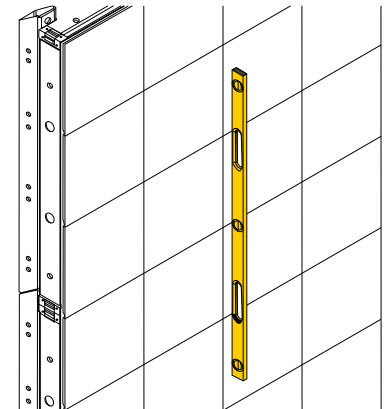


Figure 6: Ensuring Display Faces Are Flush

7. Place a 4' level at both ends and the middle of the display seam (when possible) to ensure the display faces are flush, plumb, and flat to all adjacent sections. Refer to **Figure 6 on page 2**. If they are no longer aligned, loosen the section interconnect hardware and repeat Steps 4-7.
8. Attach the clips to the structure by either welding or installing the self-drilling screws (located in the green weldless hardware bag). Refer to **Figure 7 on page 2** and **Figure 8 on page 2** for details and to the Shop Drawing for requirements on welding and bolting.

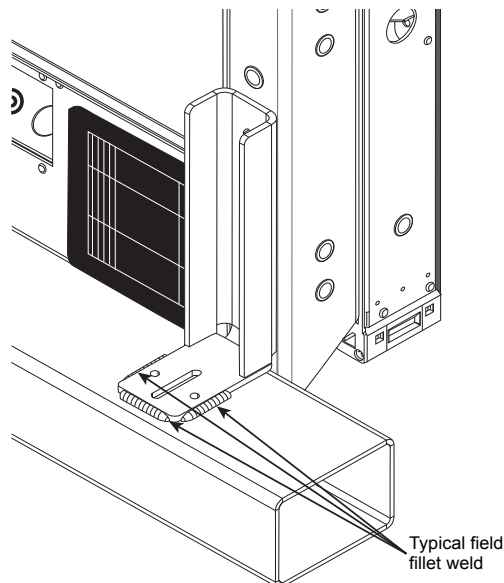


Figure 7: Welded Attachment

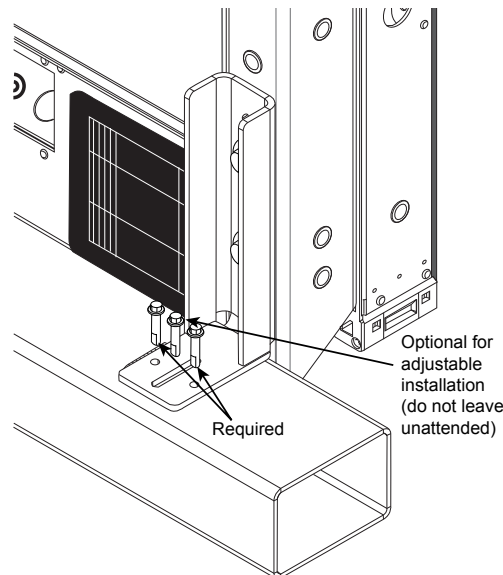


Figure 8: Weldless Attachment

Side-to-Side Connection

1. Connect the sections side to side before making any top-to-bottom connections.
2. Place the adjacent sections side by side so the alignment pyramids in each nest inside the corresponding recesses.
3. Install $\frac{1}{4}$ " bolts (located in the blue interconnect hardware bag) horizontally through all of the corner blocks in one cabinet and into the adjacent cabinet's corresponding corner block's nutsert (four per side). Refer to **Figure 9 on page 3**. Finger-tighten the bolts.
4. Use a $\frac{3}{8}$ " socket wrench to tighten the bolts. The minimum torque required is 6 ft-lbs. Avoid over-tightening. After the corner blocks are tight together, additional torque will not tighten the seams and can damage the blocks.
5. Inspect the corner blocks on the installed section visually to ensure the faces shown in **Figure 4 on page 2** and **Figure 5 on page 2** are flush and aligned.
6. Use a 4' level to ensure the display faces are flush and flat to all adjacent sections. Refer to **Figure 6 on page 2**.

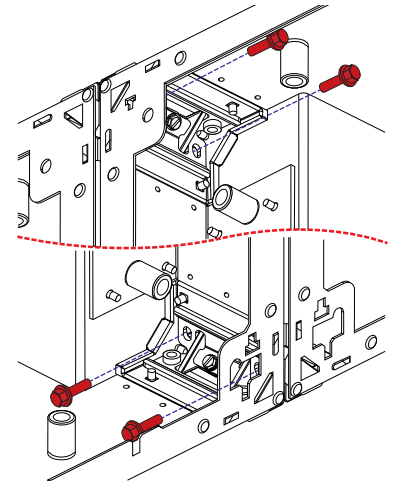


Figure 9: Installing Bolt through Corner Block

Top-to-Bottom Connection

1. Connect the sections side to side before making any top-to-bottom connections.
2. Place the adjacent sections on top of each other so the alignment pyramids of each nest inside the corresponding recesses.
3. Install $\frac{1}{4}$ " bolts (located in the blue interconnect hardware bag) vertically through all of the corner blocks in one cabinet and into the adjacent cabinet's corresponding corner block's nutsert (four per side). Refer to **Figure 10 on page 3**. Finger-tighten the bolts.
4. Use a $\frac{3}{8}$ " socket wrench to tighten the bolts. The minimum torque required is 6 ft-lbs. Avoid over-tightening. After the corner blocks are tight together, additional torque will not tighten the seams and can damage the blocks.
5. Inspect the corner blocks on the installed section visually to ensure the faces shown in **Figure 4 on page 2** and **Figure 5 on page 2** are flush and aligned.
6. Use a 4' level (when possible) to ensure the display faces are flush and flat to all adjacent sections. See **Figure 6 on page 2**.

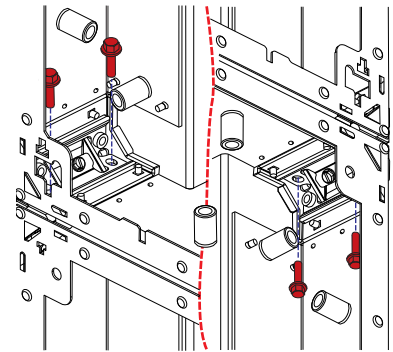


Figure 10: Installing Bolt through Corner Block

Center Adjustment

Corner blocks provide proper spacing at the ends of section seams, but spacing may vary in the middle where the sections come together. Additional holes are provided along both the horizontal and vertical edges of the cabinet for further adjustment if required. Install hardware in these locations only if further seam adjustment is required.

For wide center seams, install $\frac{1}{4}$ " bolts (located in the blue interconnect hardware bag) through the holes behind the face sheets at the problem locations in the bottom of the top cabinet or the left side of the right cabinet and into the next cabinet's nutsert. Tighten these bolts until the seam is within tolerance. Refer to the **DD3008872** DVX-11X2/1502/1801 Series Seam Measurement Field Instructions for details on seam tolerance and to **Figure 11 on page 4** for details on seam adjustment.

For tight center seams, install $\frac{1}{4}$ " bolts (located in the blue interconnect hardware bag) into the pre-installed nutserts behind the face sheet at the problem locations in the bottom of the top cabinet or the left side of the right cabinet. Tighten the bolts until the seam is within tolerance. Refer to the **DD3008872** DVX-11X2/1502/1801 Series Seam Measurement Field Instructions for details on seam tolerance and to **Figure 12 on page 4** for details on seam adjustment.

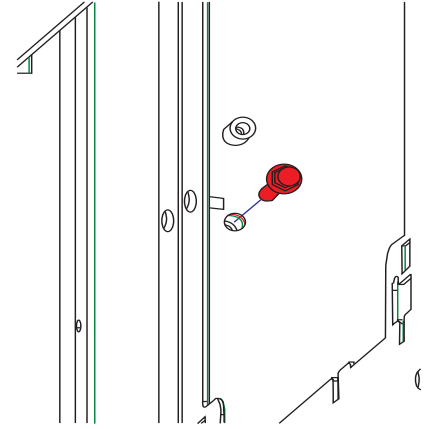


Figure 11: Adjusting Wide Center Seams

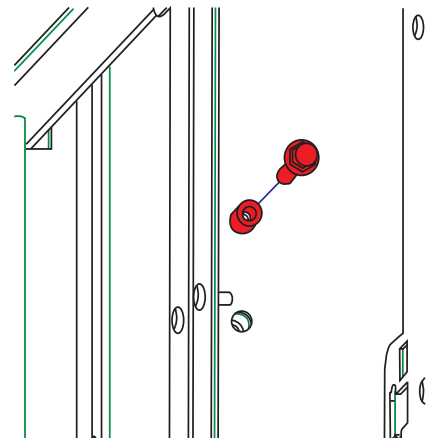


Figure 12: Adjusting Tight Center Seams

Electrical

1. Route Ethernet cable to the quick connect. Refer to **Figure 27 on page 8**.
2. Connect the fiber cable to the PLR. Refer to **Figure 15 on page 5** and the Signal Interconnect Drawing and System Riser Diagram.



Figure 15: Fiber Cable

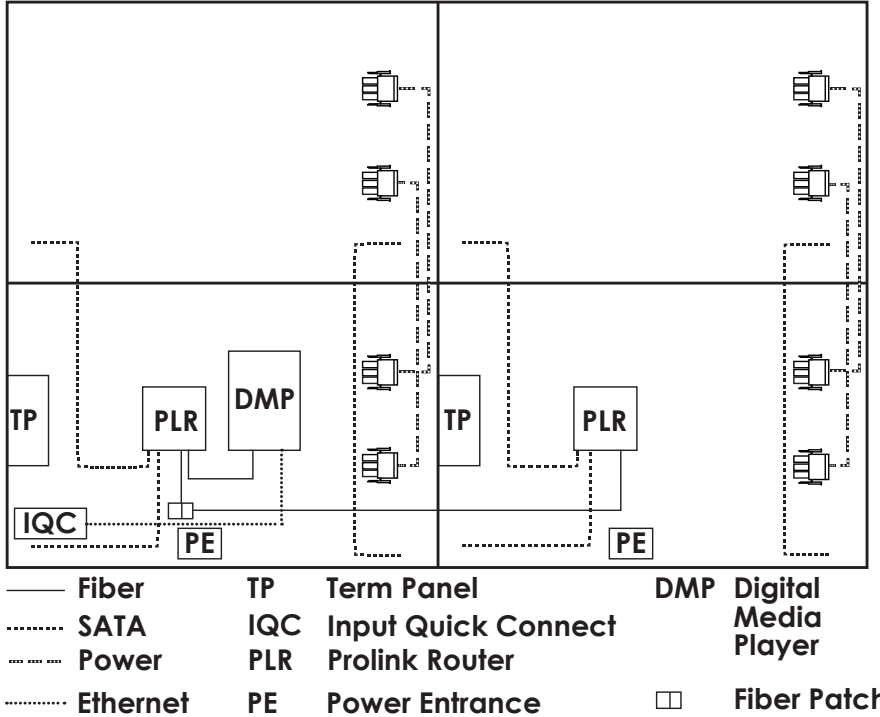


Figure 13: Signal Routing (Front View)

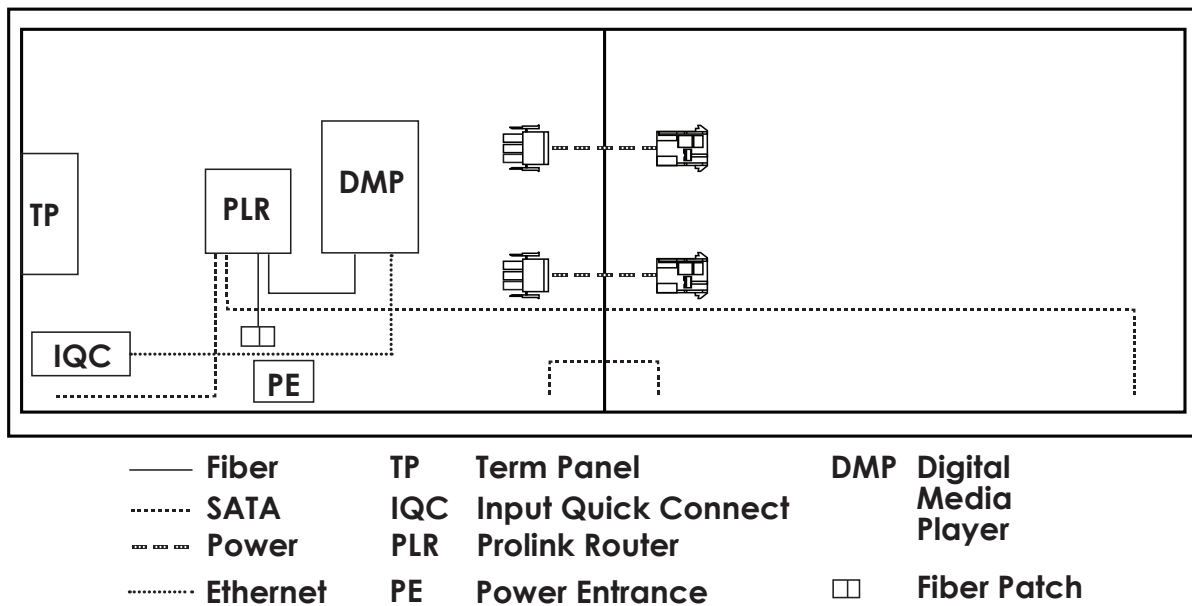


Figure 14: Two-Section Display Signal Routing (Front View)

3. Route the coiled fiber cables to the next section, connecting at the first fiber patch panel.

Note: The fiber, power, and SATA connections shown in this guide serve as an example only. Refer to the Signal Interconnect Drawing and System Riser Diagram for specific routing information.

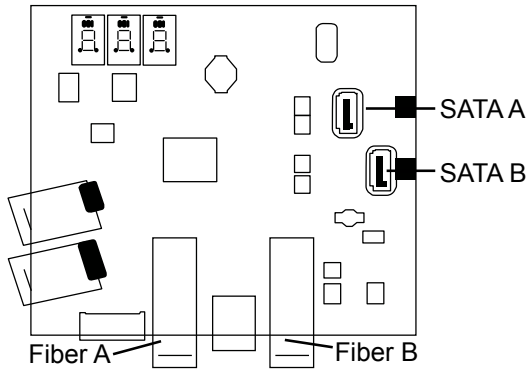


Figure 16: PLR

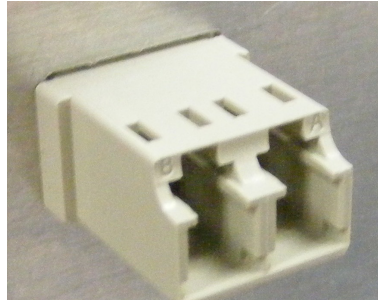


Figure 17: Fiber Patch Panel Jack

4. Route the SATA cables from section to section and connect to the module input. Refer to the Signal Interconnect Drawing for routing information.



Figure 18: SATA Cable



Figure 19: SATA Connection

5. Route the coiled power cables from section to section, connecting to the power harness in the next section. Refer to the Signal Interconnect Drawing.

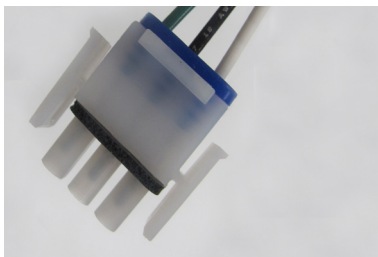


Figure 20: Power Interconnect Between Cabinets

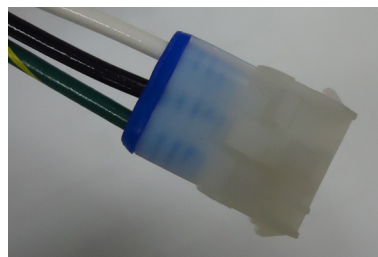


Figure 21: Power Interconnect Between Cabinets

- Route the power cables through conduit to the termination panels inside the display at the sections specified on the shop drawing.

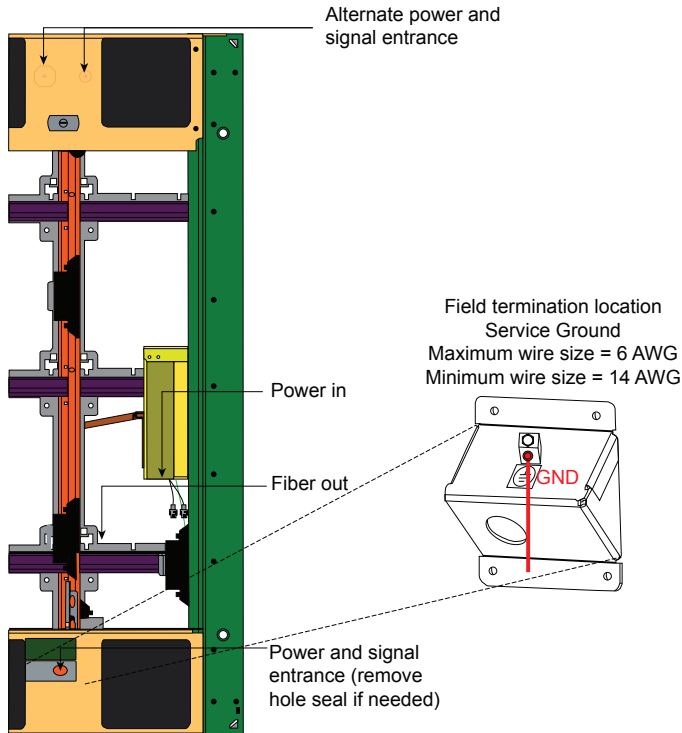


Figure 22: Power Entrance (Rear View)

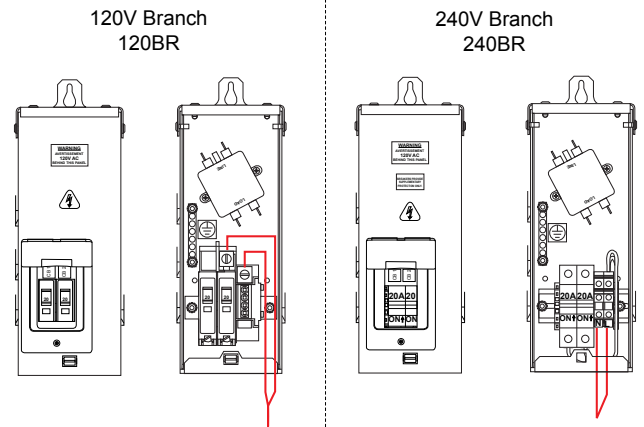


Figure 23: Power Termination Panels

Note: This display allows water to enter, so incoming conduits should point downward or have a fitting attached to prevent water from entering the conduit.

- Connect ground electrode from earth ground rod to the ground lug on the rear of each display face.
- Test the display ground to ensure it has a resistance-to-ground of 10 ohms or less.

Optional Conduit Whip

Refer to the System Riser Diagram to verify where conduit whips should route. If a conduit whip is installed, the internal cabinet power connections will already be made.

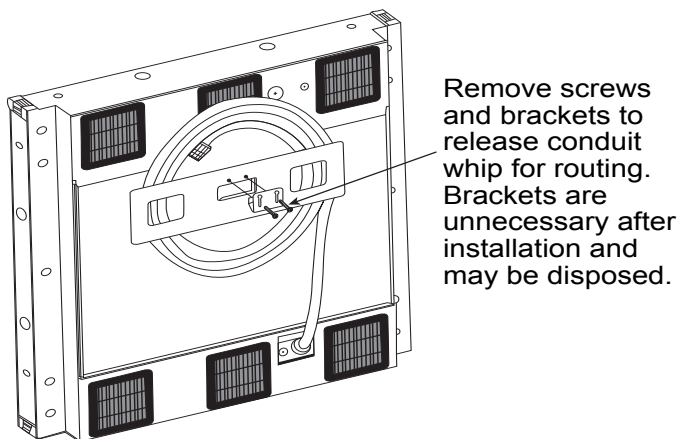


Figure 25: Conduit Whip



Figure 24: Ground Lug

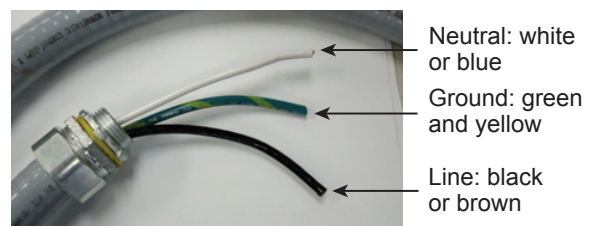


Figure 26: Conduit End with Wire to Terminate to Junction Box

Embedded Controller

Connect the signal cables to the proper quick-connect jacks on the rear of the display as necessary. Verify the caps on the jacks are properly installed if the jacks are not in use.



Figure 27: Quick Connect Jacks

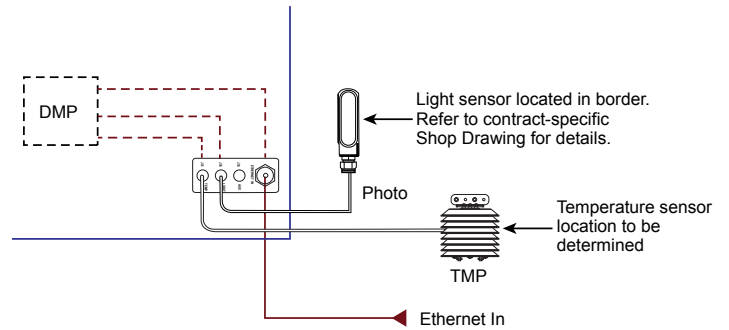


Figure 28: Embedded Controller Signal Routing (Rear View)