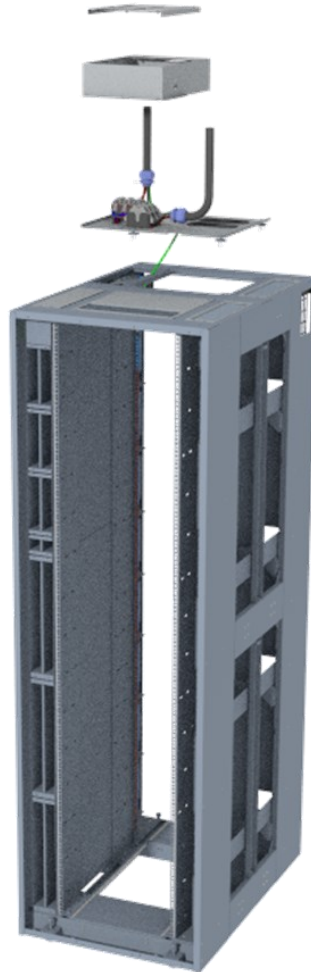


EDGE AC SHORT CIRCUIT CURRENT LIMITER

G390 – 1600480775A



- SAVE THESE INSTRUCTIONS – This document contains important safety and installation instructions for the Edge Cabinet input current limiter accessory
- Equipment is intended for installation only in restricted access areas.
- Rules and Regulations – Follow all national and local rules and regulations when making field connections.
- This equipment is not suitable for use in locations where children are likely to be present.
- SAUVEGARDEZ CES INSTRUCTIONS – Ce document contient des instructions de sécurité et d'utilisation importantes pour l'accessoire limiteur de courant d'entrée Edge Cabinet
- L'équipement est destiné à être installé uniquement dans des zones à accès restreint.
- Règles et règlements – Suivez toutes les règles et réglementations nationales et locales lorsque vous établissez des connexions sur le terrain.
- Cet équipement ne convient pas à une utilisation dans des endroits où des enfants sont susceptibles d'être présents.

Document – 8600481911P

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Important Safety Instructions

- Do not install this equipment over combustible surfaces.
- Rules and Regulations – Follow all national and local rules and regulations when making field connections.
- Compression Connectors.
 - U. S. or Canada installations – use Listed/Certified compression connectors to terminate Listed/Certified field – wire conductors.
 - All installations – apply the appropriate connector to the correct size conductor as specified by the connector manufacturer, using only the connector manufacturer’s recommended or approved tooling for that connector.
- Electrical Connection Securing: Torque to the values specified on labels or in the product documentation.
- Cable Dress – dress to avoid damage to the conductors and undue stress on the connections.
- Fuses
 - Use only those specified in the equipment labeling Size as required by the National Electric Code (NEC) and/or local codes.
 - Safety Tested Limits – Refer to the equipment ratings to assure current does not exceed: Continuous Load (List 1) – 80% of protector rating.
- AC input – Provide accessible devices to remove input power in an emergency.
- Grounding – Connect the AC input ground directly to chassis where marked. Connect chassis to main cabinet ground bus bar. Note: Proper grounding of AC supply must be verified by qualified personnel.
- Do not place combustible material directly above or below equipment.

Consignes de sécurité importantes (French)

- N'installez pas cet équipement sur des surfaces combustibles.
- Règles et réglementations – Suivez toutes les règles et réglementations nationales et locales lors des connexions sur le terrain.
- Connecteurs à compression
 - Installations aux États-Unis ou au Canada - utilisez des connecteurs à compression homologués/certifiés pour terminer les conducteurs de fil homologués/certifiés.
 - Toutes les installations - appliquez le connecteur approprié au conducteur de taille correcte tel que spécifié par le fabricant du connecteur, en utilisant uniquement l'outillage recommandé ou approuvé par le fabricant du connecteur pour ce connecteur.
- Fixation de la connexion électrique : Serrez aux valeurs spécifiées sur les étiquettes ou dans la documentation du produit.
- Habillage de câble – Habillez-vous pour éviter d'endommager les conducteurs et de soumettre les connexions à des contraintes excessives.
- Fusibles
 - N'utilisez que ceux spécifiés sur l'étiquette de l'équipement. Taille, comme requis par le National Electric Code (NEC) et/ou les codes locaux.
 - Limites de sécurité testées – Reportez-vous aux valeurs nominales de l'équipement pour vous assurer que le courant ne dépasse pas : Charge continue (Liste 1) – 80 % de la valeur nominale du protecteur.
- Entrée CA – Fournir des appareils accessibles pour couper l'alimentation d'entrée en cas d'urgence.
- Mise à la terre – Connectez la terre de l'entrée CA directement au châssis à l'endroit marqué. Connectez le châssis à la barre omnibus de mise à la terre de l'armoire principale. Remarque : La mise à la terre correcte de l'alimentation CA doit être vérifiée par un personnel qualifié.
- Ne placez pas de matériaux combustibles directement au-dessus ou en dessous de l'équipement.

Precautions

- Install, service, and operate equipment only by professional, skilled and qualified personnel who have the necessary knowledge and practical experience with electrical equipment and who understand the hazards that can arise when working on this type of equipment.
- Do not disconnect permanent bonding connections unless all power inputs are disconnected.
- Verify that equipment is properly safety earth grounded before connecting power. High leakage currents may be possible.
- Exercise care and follow all safety warnings and practices when servicing this equipment. Hazardous energy and voltages are present in the unit and on the interface cables and connectors that can shock or cause serious injury.
- Use safe lifting practices. The equipment is heavy. Lifting devices are recommended.
- Use the following precautions in addition to proper job training and safety procedures:
 - Use only properly insulated tools.
 - Remove all metallic objects (key chains, glasses, rings, watches, or other jewelry).
 - Follow Lock Out Tag Out (LOTO) procedures: customer specified, site specific, or general as appropriate. Disconnect all power input before servicing the equipment. Check for multiple power inputs.
 - Wear safety glasses.
 - Follow Personal Protective Equipment requirements: customer specified, site specific, or general as appropriate.
 - Test circuits before touching.
 - Be aware of potential hazards before servicing equipment.
 - Identify exposed hazardous electrical potentials on connectors, wiring, etc.
 - Avoid contacting circuits when removing or replacing covers.
 - Use a personal ESD strap when accessing or removing electronic components.
- Personnel with electronic medical devices need to be aware that proximity to DC power and distribution systems, including batteries and cables, typically found in telecommunications utility rooms, can affect medical electronic devices, such as pacemakers. Effects decrease with distance.

Précautions (French)

- Installez, entretenez et utilisez l'équipement uniquement par du personnel professionnel, compétent et qualifié qui possède les connaissances et l'expérience pratique nécessaires avec l'équipement électrique et qui comprend les dangers qui peuvent survenir lors de travaux sur ce type d'équipement.
- Ne déconnectez pas les connexions de liaison permanentes à moins que toutes les entrées d'alimentation ne soient déconnectées.
- Vérifiez que l'équipement est correctement mis à la terre de sécurité avant de brancher l'alimentation. Des courants de fuite élevés peuvent être possibles.
- Soyez prudent et suivez tous les avertissements et pratiques de sécurité lors de l'entretien de cet équipement. Des énergies et des tensions dangereuses sont présentes dans l'unité et sur les câbles d'interface et les connecteurs qui peuvent provoquer des chocs ou des blessures graves.
- Utilisez des pratiques de levage sécuritaires. Le matériel est lourd. Les appareils de levage sont recommandés.
- Utilisez les précautions suivantes en plus de la formation professionnelle appropriée et des procédures de sécurité :
 - Utilisez uniquement des outils correctement isolés:
 - Retirez tous les objets métalliques (porte-clés, lunettes, bagues, montres ou autres bijoux).
 - Suivez les procédures LOTO (Lock Out Tag Out) : spécifiées par le client, spécifiques au site ou générales, selon le cas.
Débranchez toutes les entrées d'alimentation avant de procéder à l'entretien de l'équipement. Vérifiez les entrées d'alimentation multiples.
 - Portez des lunettes de sécurité.
 - Respectez les exigences relatives à l'équipement de protection individuelle : spécifiées par le client, spécifiques au site ou générales, selon le cas.
 - Testez les circuits avant de toucher.
 - Soyez conscient des dangers potentiels avant de procéder à l'entretien de l'équipement.
 - Identifiez les potentiels électriques dangereux exposés sur les connecteurs, le câblage, etc.
 - Éviter tout contact avec les circuits lors du retrait ou du remplacement des couvercles.
 - Utilisez une sangle ESD personnelle lors de l'accès ou du retrait des composants électroniques.
- Le personnel équipé d'appareils médicaux électroniques doit être conscient que la proximité des systèmes d'alimentation et de distribution CC, y compris les batteries et les câbles, que l'on trouve généralement dans les locaux techniques de télécommunications, peut affecter les appareils électroniques médicaux, tels que les stimulateurs cardiaques. Les effets diminuent avec la distance.

Safety

Read and follow all safety statements, warnings, and precautions in this manual before installing, maintaining or repairing this equipment.

Sécurité (French)

Lisez et suivez toutes les consignes de sécurité, les avertissements et les précautions de ce manuel avant d'installer, d'entretenir ou de réparer cet équipement.

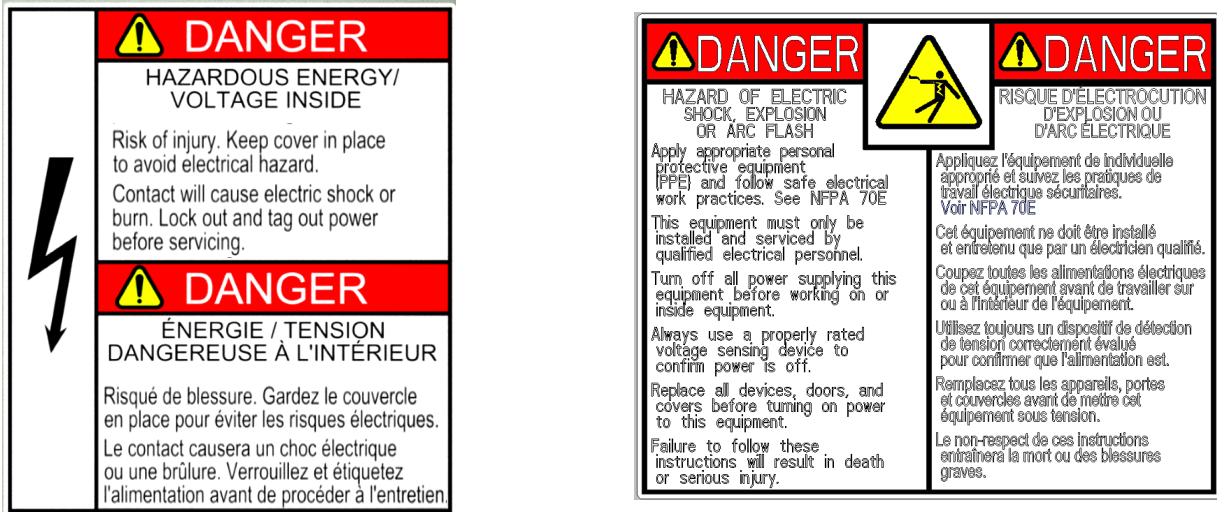


Figure 1 Warning Label

Equipment Identification

The product ID label of the EDGE CABG390 model is shown below. It includes the product serial number and input-output specifications of the cabinet.

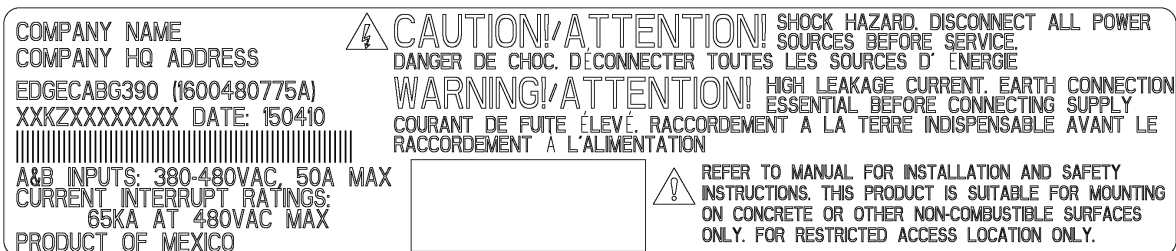


Figure 2 Product ID Label Information

Customer Care

+1 877 546-3243

Wiring diagram

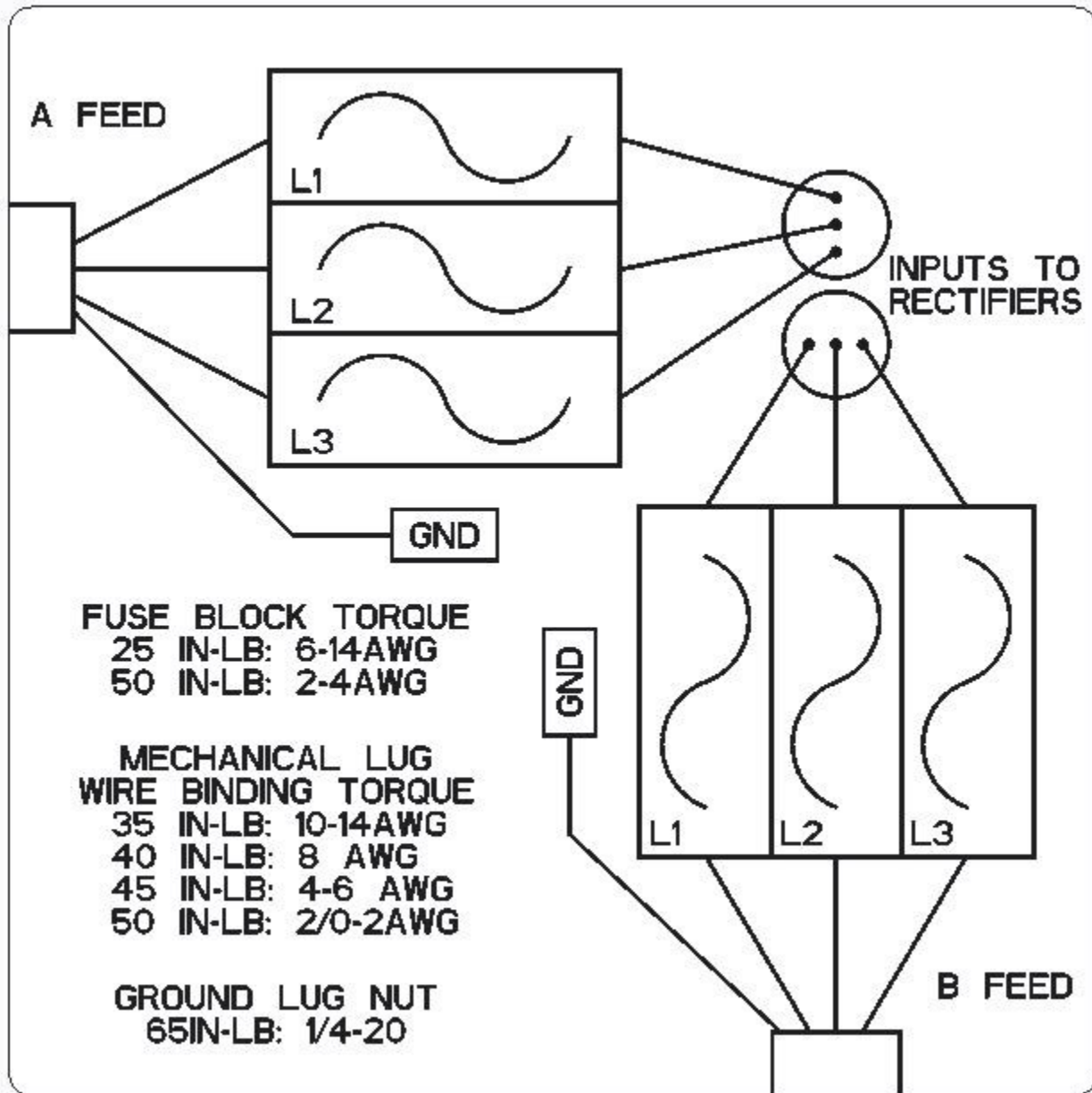


Figure 3 wiring diagram

Information – Tools Required

Regulations, standards, site engineering instructions etc. take precedence over these general installation instructions.

- Steel toe safety shoes
- Torque wrench - 0-65 in-lb (0-10 Nm) and 40 ft-lbs
- Volt Meter for Lock-Out Tag-Out procedures
- Sockets - as needed for mounting hardware
- Screwdrivers - #2 pozi drive screwdriver. Flat and Torx bit set with security pin

Check for deliveries:

Make sure that the box contains the

- 8x #6-32 Screws (CC408578537)
- 6x 60A Fuses (4600482350P)
- 6x Fuse Covers (4600480552P)
- 9x #4-40 Nuts (CC408578388)

Cabinet Top

The top of the Edge cabinet is shown here. The relevant areas are noted:

1. AC input panel which contains two twist-n-lock AC input receptacles for AC input power.
2. Center back panel to be removed and replaced with Edge AC current limiter G390 assembly.

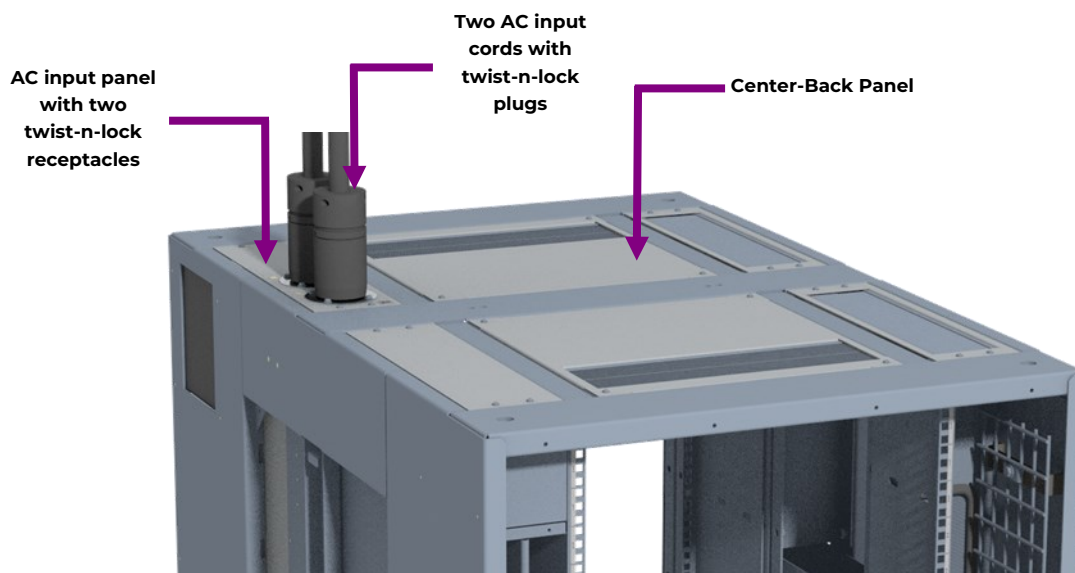


Figure 4 Cabinet top

Step 1. Disassemble existing AC connections

Use "Turn off/Lock Out Tag Out".

1. Turn off AC power supplying the Edge cabinet.
2. Note which cord is "A" feed and which is "B" feed.
3. Unplug AC cords from the twist-n-lock input receptacles at the top of the cabinet.

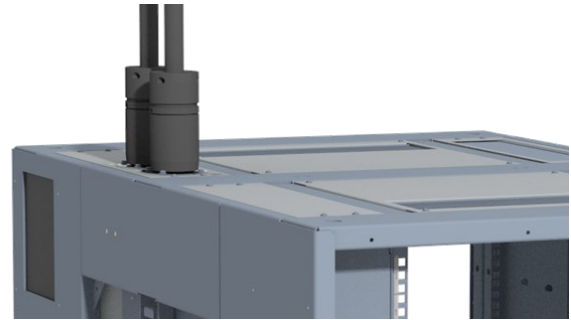


Figure 5 Disassemble AC connection

4. Disconnect both AC cords/wires from each twist-n-lock plug and keep cords for reassembly later.

Note: This process is written for a system that is not providing active load support or that can be temporarily taken down. If this system is live and cannot be taken down for the installation duration period please contact Technical Support to discuss alternatives.

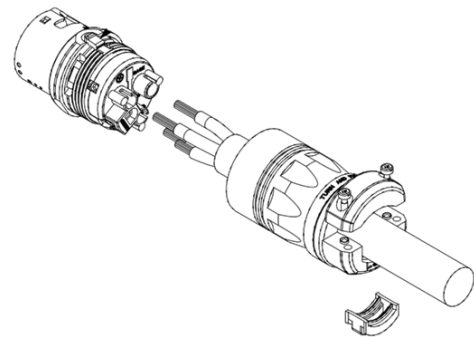


Figure 6 Twist-n-lock plug

Step 2. Disassemble AC panel and central panel

1. Remove the 4 screws which attach the AC input panel to top of the cabinet so that the panel can be opened as shown.
2. Disconnect the black, blue and red wires from each of the receptacles. Keep track of the wire which is connected to "A" and "B" receptacles.



Figure 7 AC panel removed

3. Remove the 4 screws on the back center panel and then remove the panel.

Note: Both the AC input panel and the back center panel will be discarded.

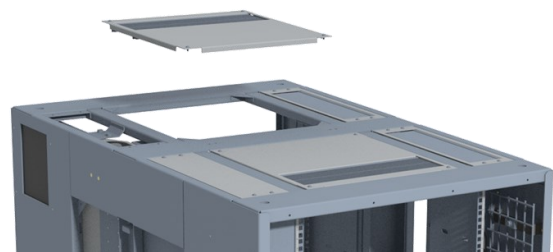


Figure 8 Central panel removed

Step 3. Assemble EDGE CAB G390 to cabinet

1. Assemble the base panel assembly to the top of the cabinet using the 8 #6-32 screws provided.

Torque to 10in-lb. (Nm)

Note: The top cover must be disassembled from the base panel assembly in order to have access to the mounting holes. Keep track of nuts for reassembly at step 3.

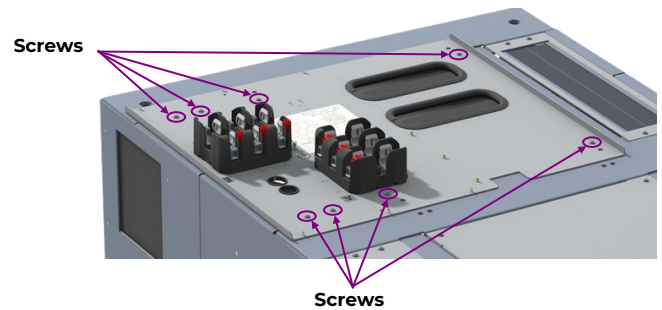


Figure 9 Panel assembly

2. Pull the wires that were previously connected to the twist-n-lock receptacles (Step 2, 2) through the two grommets holes in the base panel and terminate to the fuse blocks. The fuse blocks are labeled A and B. Attach the wires removed from the A receptacle to the fuse block labeled A. Repeat for the B block. Each fuse position is labeled L1, L2, or L3. Terminate red wire to L1, black wire to L2, and blue wire to L3.

Torque to 25in-lb.

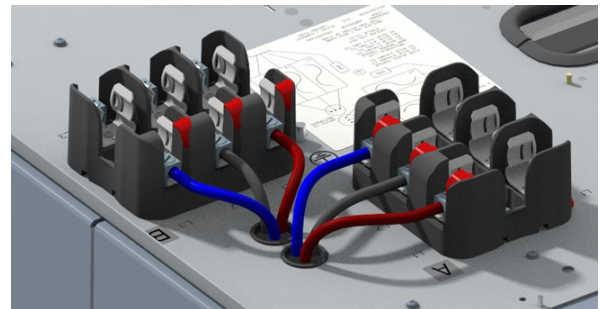


Figure 10 Wire connections

3. Reassemble the top cover using the 6 provided #4-40 nuts.

Torque to 5in-lb.

4. Strip the outer jacket of the AC feed cord (Step 1) exposing a minimum of 6" of each individual wire. The white wire should be cut flush with main cord outer jacket.

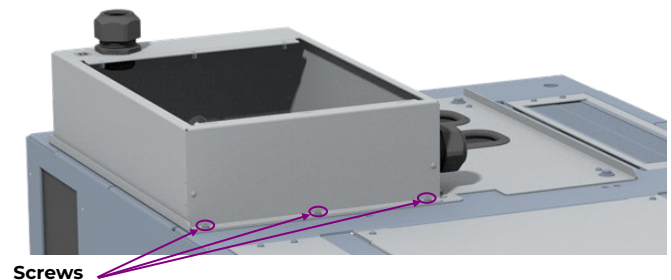


Figure 11 Assembling top cover

5. Assemble the AC cords through the appropriate strain relief ("A" or "B") and then terminate the individual wires to the fuse blocks. Each fuse position is labeled L1, L2, L3. Terminate black wire to L1, red wire to L2, and orange wire to L3. Torque to 25in-lb. Also, tie wires to side wall of top cover to strain relief.

6. Terminate green ground wires to appropriate ground lugs. Torque lug set screw to 45in-lb. Also tie wires to side wall of top cover to strain relief.

Note: 2-hole compression lugs are also provided which can be used instead of the single-hole mechanical lug.

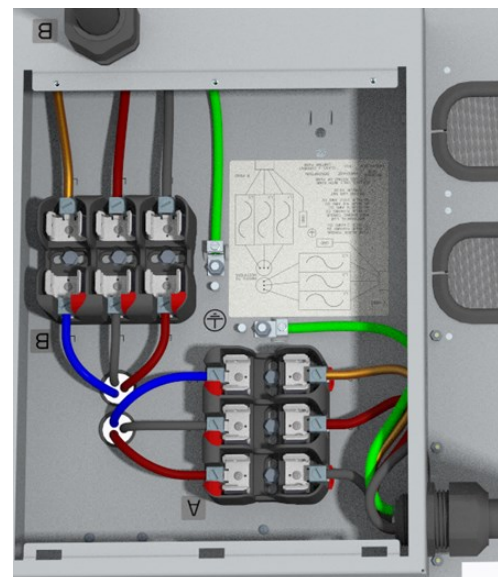


Figure 12 AC cord wiring

Step 4. Final Assembly

1. Verify all fuses are fully assembled into each position of the fuse blocks.

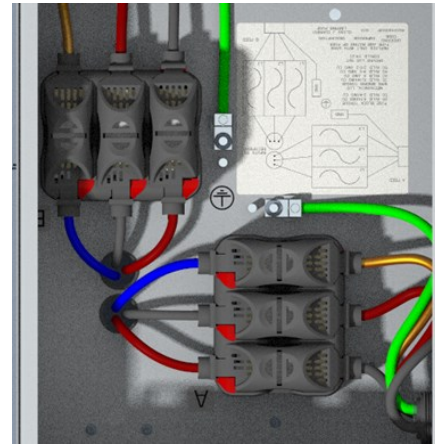


Figure 13 Fuse blocks

2. Attach clear, removable panel to the top cover.
Torque to 10in-lb.

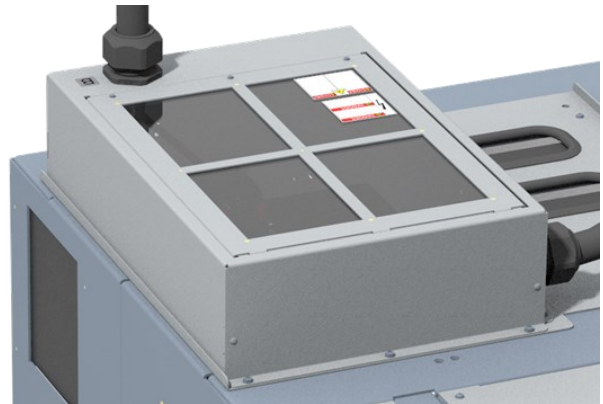


Figure 14 Clear removable panel

3. Connect ground wire provided in the G390 kit to the ground lug located on the bottom of the base panel assembly. Connect the other end of the ground wire to the cabinet ground bus.

Torque lug set screw to 45in-lb.

Torque screw on ground bus to 65in-lb.

Note: 2-hole compression lugs are also provided which can be used instead of the single-hole mechanical lug.

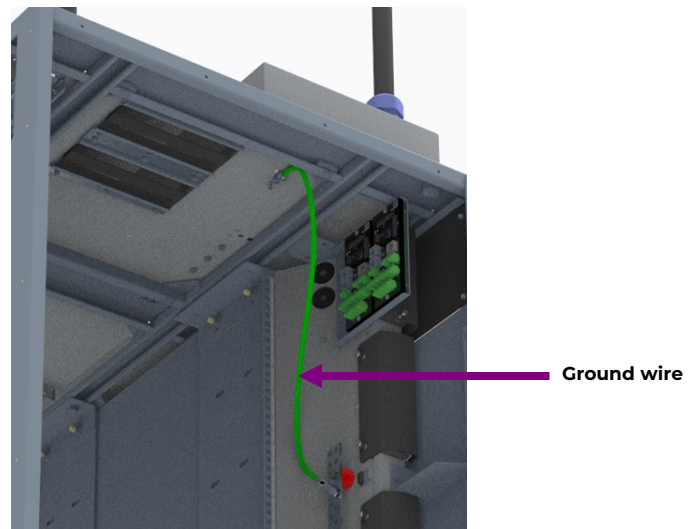


Figure 15 Cabinet grounding

Change History (excludes grammar & clarifications)

Revision	Date	Description of the change
1.0	05-17-2023	Initial release
2.0	06-21-2023	Updated wiring diagram, Updated ordering code of fuses in "Check for deliveries" section
2.1	11-28-2023	Updated as per OmniOn template

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