

SnapNrack™

Solar Mounting Solutions

MightyMount Metal-T

Railless Trapezoidal Metal Roof Mount System
Installation Manual

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Certification Details

SnapNrack MightyMount Metal-T system has been evaluated by Underwriters Laboratories (UL) and Listed to UL Standard 2703 for Grounding/Bonding, and Fire Classification.

Grounding/Bonding

Only specific components have been evaluated for bonding, and are identified as being in the ground path. The **MightyMount** Metal-T components that have been evaluated for bonding are the **MightyMount** Metal-T Track, Leg Assemblies, Ultra End Clamp, Ultra Mid Clamp, Ground Lugs, and Smart Clips.

Wire management clips are utilized to route conductors away from these components and must be assembled according to the instructions.

This mounting system may be used to ground and/or mount a PV module complying with UL 1703 only when the specific module has been evaluated for grounding and/or mounting in compliance with the included instructions. See Appendix A for the list of modules tested with the **MightyMount** Metal-T system for integrated grounding.

Ground Lugs have been evaluated to both UL 467 and UL 2703 Listing requirements. The following ground lugs have been approved for use: SnapNrack model 242-02101, 242-92202, and IlSCO models GBL-4DBT and SGB-4.

The following components have been evaluated for bonding as the fault current ground path: Ultra Mid Clamp, Ultra End Clamp, Leg Assemblies, **MightyMount** Metal-T Track, and Ground Lugs. In order to maintain the Listing for bonding, wire management clips must be assembled to route conductors away from parts that have not been evaluated for bonding.

A Listed (QIMS) and Unlisted Component (KDER3) grounding lug, SnapNrack part no. 242-92202, is attached to the module frame flange or **MightyMount** Metal-T Track, for the normal attachment of a Grounding Electrode Conductor, which provides bonding within the system and eventual connection to a Grounding Electrode, as required by the U.S. NEC. Details of part no. 242-92202 can be found in Volume 1, Section 4, and Volume 2, Section 2. When this method is used, the grounding symbol is stamped onto the body of the ground lug to identify the grounding terminal.

An alternate method of grounding, A UL Listed (QIMS) and Unlisted Component (KDER3) grounding lug, SnapNrack part no. 242-02101 is attached to the **MightyMount** Metal-T Track, Details of part no. 242-02101 can be found in Volume 1, Section 4, and Volume 2, Section 1. When this method is used, the grounding symbol is stamped onto the body of the ground lug to identify the grounding terminal.

An alternate method of grounding, a UL Listed (KDER and QIMS) grounding lug, IlSCO (E34440 and E354420) model SGB-4 is attached to the module frame flange or **MightyMount** Metal-T Track. When this method is used, the grounding terminal is identified by the green colored screws of the lug.

An alternate method of grounding, a UL Listed (KDER and QIMS) grounding lug, IlSCO (E34440 and E354420) model GBL-4BDT is attached to the module frame flange through the specified hardware and torque values. When this method is used, the grounding terminal is identified by the green colored set screw of the lug.

An alternate method of grounding, Enphase R/C (QIKH2)(QIMS2) model M250, M215 & C250 is bonded to the Listed PV module frame by the Enphase R/C (QIMS2) Model EFM-XXMM anodization piercing mounting/clamping kit. The total roof-mounted PV system is bonded (modules and microinverters) together and the assembly is bonded to ground through the Enphase R/C (QIMS2) Engage Cables; Model ETXX-240, ETXX-208 or ETXX-277, when properly grounded at the service entrance.

R/C (QIMS2), Dynoraxx (E357716) photovoltaic bonding device cat. no. Dynobond is an optional component that may be used with this system. The Dynobond device has been evaluated to provide module to module bonding. The Dynobond device attaches to the frame flange of adjacent modules Listed (QIMS), SnapNrack MLPE Frame Attachment Kit model 242-02151 has been investigated to bond approved MLPE device back plates to frames of modules.

SnapNrack recommends a periodic re-inspection of the completed installation for loose components, loose fasteners, and any corrosion, such that if found, the affected components are to be immediately replaced.

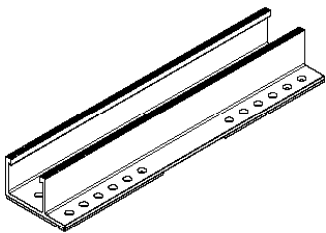
UL 2703 Fire Rating

This system has a Class A System Fire Classification when installed as follows:

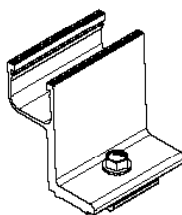
- a) Modules or panels of Type 1, Type 2, or Type 3 as defined by UL 1703 or UL 61730-2;
- b) Rack mounting systems constructed of minimum 98% (byweight) noncombustible materials, as defined by ASTM E136; and
- c) Installed over Class A roof assemblies with the following noncombustible roof coverings:
 - i) Clay tile
 - ii) Concrete tile
 - iii) Metal panels made from steel, minimum 28 Ga ferrous panels or shingles.

If this system is not installed with or on the materials listed above, it is assumed to not have been evaluated for a fire classification.

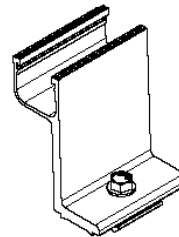
RL Metal-T Structural Components



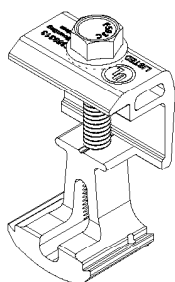
**SnapNrack MightyMount
Metal-T Track**



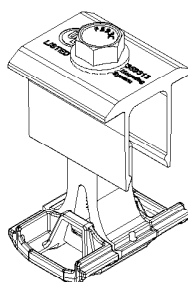
**SnapNrack MightyMount
Metal-T Short Leg**



**SnapNrack MightyMount
Metal-T Tall Leg**

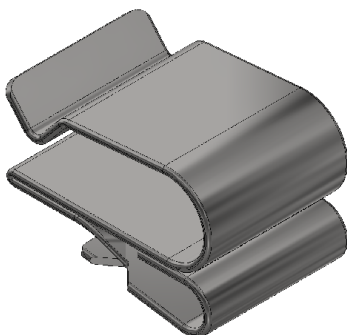


SnapNrack Ultra End Clamp



SnapNrack Ultra Mid Clamp

Wire Management Components



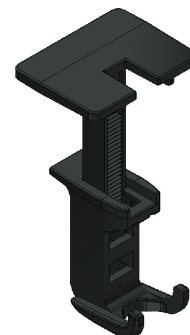
Smart Clip

Module frame cable clip, holds two PV wires or Enphase IQ-Cables



Smart Clip XL

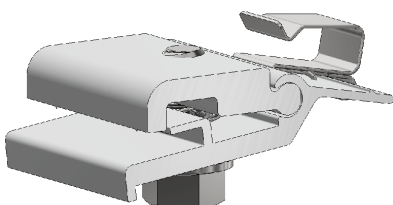
Module frame cable clip, holds six PV wires or four Enphase IQ-Cable



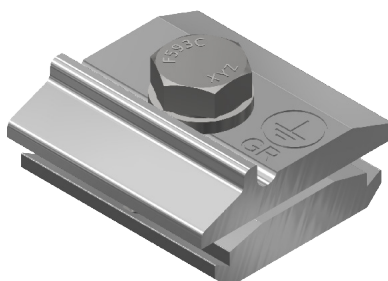
Wire Saver

Designed to secure conductors that become loose and hang below the array, holds one conductor

Grounding/MLPE Components



MLPE Frame Attachment Kit



SnapNrack Ground Lug R

Hardware Torque Specifications

The recommended torque to be applied to components for proper assembly and bonding are as follows:

Hardware Description	Torque Specification
MightyMount Metal-T Leg Assemblies	12 ft-lb
Ground Lug model 242-92202 to MightyMount Metal-T Track or Module Frame, and Ground Lug model 242-92202 to Grounding Electrode Conductor (6-12 SOL)	8 ft-lb
Ultra Mid Clamp, Ultra End Clamp, and Ground Lug model 242-02101 to MightyMount Metal-T Track (6-12 SOL)	16 ft-lb
MLPE Frame Attachment Kit	12 ft-lb
SolarEdge Frame Mounted Microinverter Bracket to Module Frame	11 ft-lb
Enphase Frame Mounted Microinverter Bracket to Module Frame	13 ft-lb
Ground Lug model SGB-4 to module, or MightyMount Metal-T Track	75 in-lb
Ground Lug model SGB-4 to Grounding Electrode Conductor (4-14 SOL or STR)	35 in-lb
Ground Lug model GBL-4DBT to module	35 in-lb
Ground Lug model GBL-4DBT to Grounding Electrode Conductor (10-14 SOL or STR)	20 in-lb
Ground Lug model GBL-4DBT to Grounding Electrode Conductor (8 SOL or STR)	25 in-lb
Ground Lug model GBL-4DBT to Grounding Electrode Conductor (4-6 SOL or STR)	35 in-lb

MightyMount Metal-T Track, Grounding & Leg Installation

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Required Tools

- Drill with ½" socket
- String line
- Torque Wrench
- Socket Wrench
- Tape Measure

Materials Included - MightyMount Metal-T

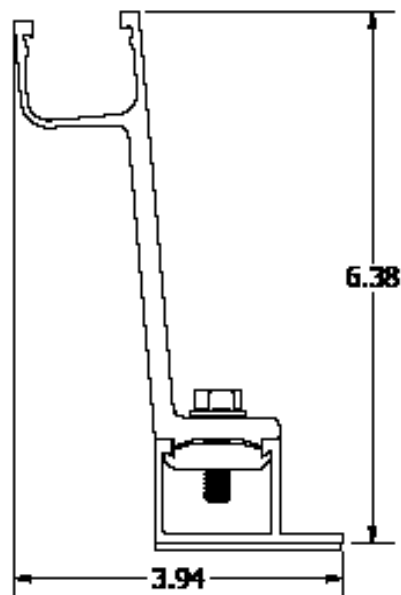
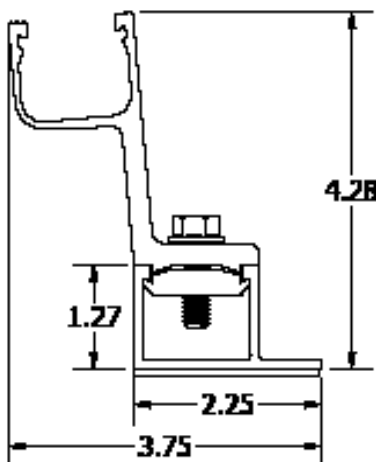
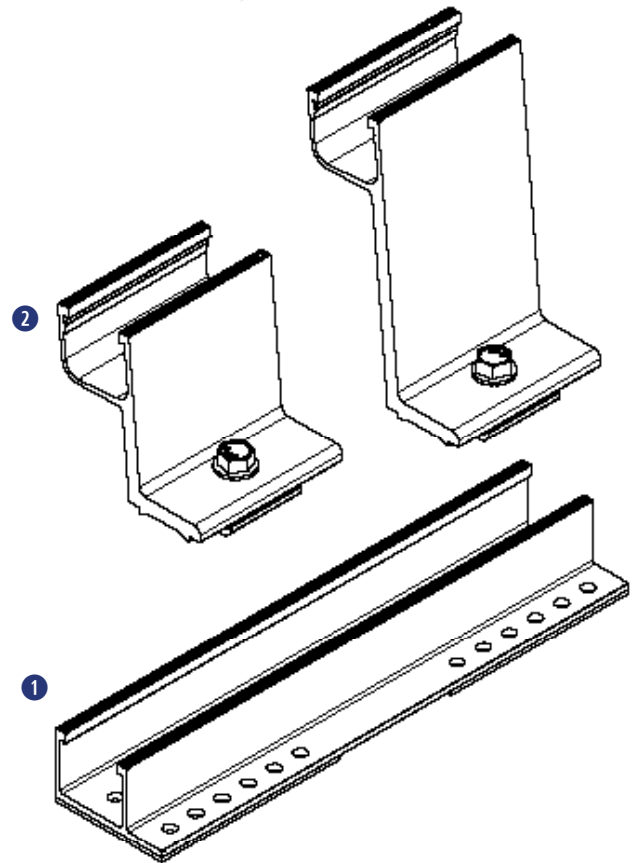
- 1 SnapNrack MightyMount Metal-T Track
- 2 SnapNrack MightyMount Metal-T Short Leg
- 3 SnapNrack MightyMount Metal-T Tall Leg

Other Materials Required - *Not Shown*

- 1 (4) Stainless #14 tek screws
- 2 (1) SnapNrack Ground Lug R

Application Note:

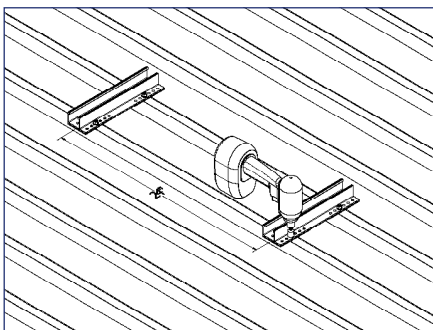
Install on Trapezoidal Corrugated Roofs with a minimum 26 gauge. For roofing that is less than 26 gauge, a thru bolt and nut are required.



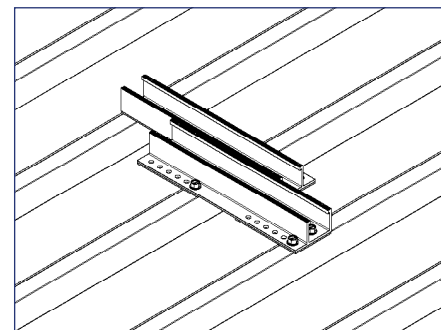
Dimensioned MightyMount Metal-T Assembly
(front & back)

INSTALLATION INSTRUCTIONS

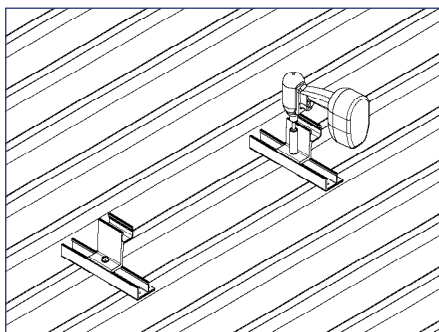
1) Layout locations for the tracks according to the plans. The distance between the front attachment and the back attachment of each row should be 24 inches. Be sure to maintain the proper inter row spacing. Plan for a 2 inch gap every 8th module to allow for expansion and contraction.



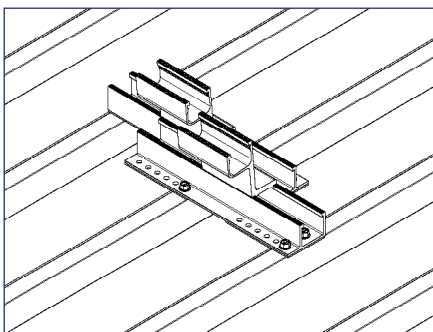
2) Using roof attachment locations drawn during system layout, attach tracks across at least (2) trapezoidal ridges using (4) #14 Stainless Steel tek screws.



3) Install an extra track for expansion and contraction every 8th contiguous module.



4) Install legs on the tracks. Align legs at the beginning of each row to ensure parallel rows. Tighten to 12 ft lbs.



5) Install extra legs for expansion and contraction.

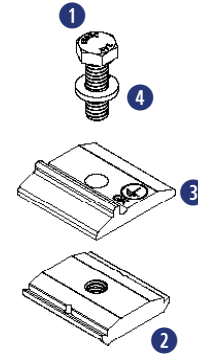
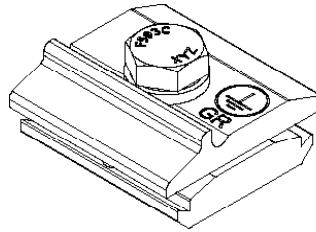
Required Tools

- Socket Wrench
- Torque Wrench
- 1/2" Socket
- Electrician Tools

Materials Included

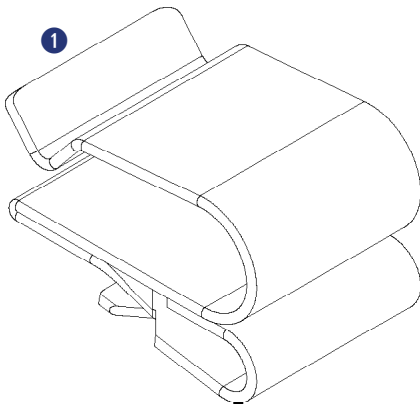
SnapNrack Ground Lug R (242-92101)

- ① (1) Bolt, Hex Cap, 5/16" - 18" X 1", SS
- ② (1) SnapNrack Bonding Channel Nut
- ③ (1) SnapNrack Ground Lug R PRC
- ④ (1) 5/16" SS Split Lock Washer

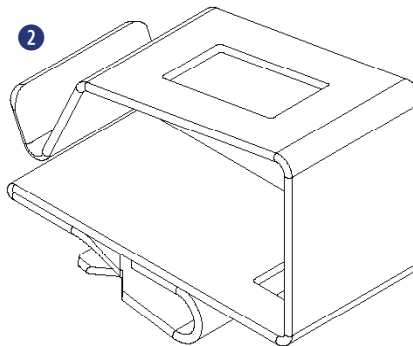


Smart Clips

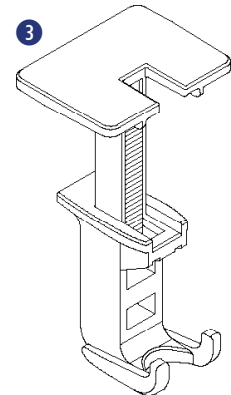
- ① (1) Smart Clip ((2) PV Wire, (1) Enphase IQ Cable)
- ② (1) Smart Clip XL ((6) PV Wire, (4) Enphase IQ)
- ③ (1) Wire Saver ((1) PV Wire)



Smart Clip



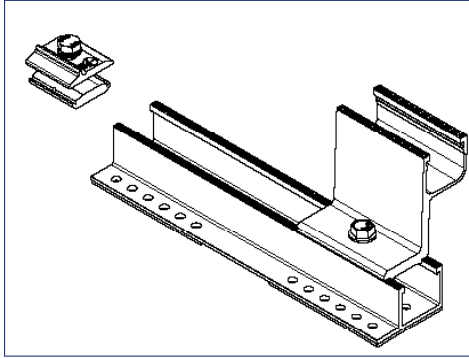
Smart Clip XL



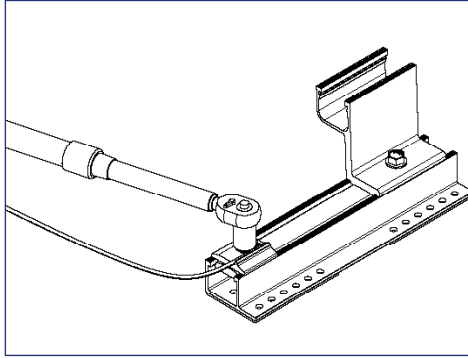
Wire Saver

INSTALLATION INSTRUCTIONS - RL GROUND LUG

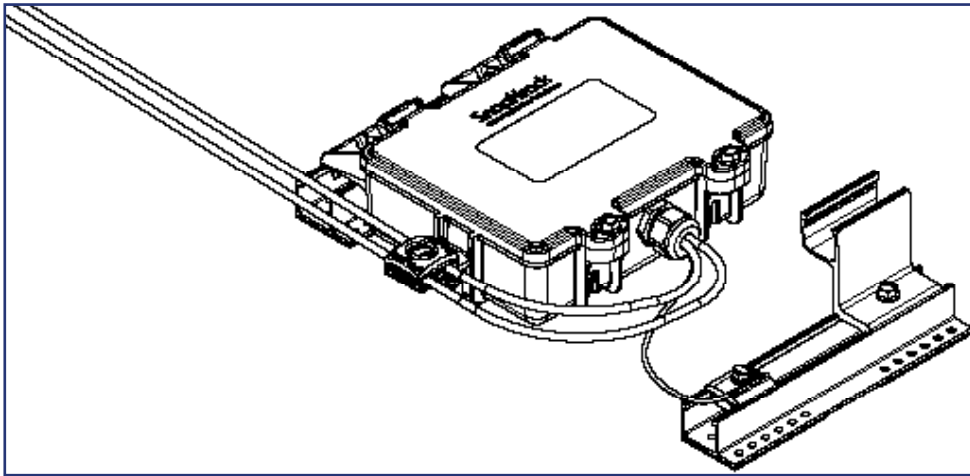
SnapNrack Ground Lug R to be used in accordance with the National Electric Code, ANSI/NFPA 70.



1) Ground Lug R is attached a minimum of (1) MightyMount Metal-T Track per row of modules. Insert Ground Lug R into MightyMount Metal-T Track



2) Run 10 - 6 AWG, solid, bare copper GEC into Ground Lug R channel, torque clamping bolt to 16 ft-lb

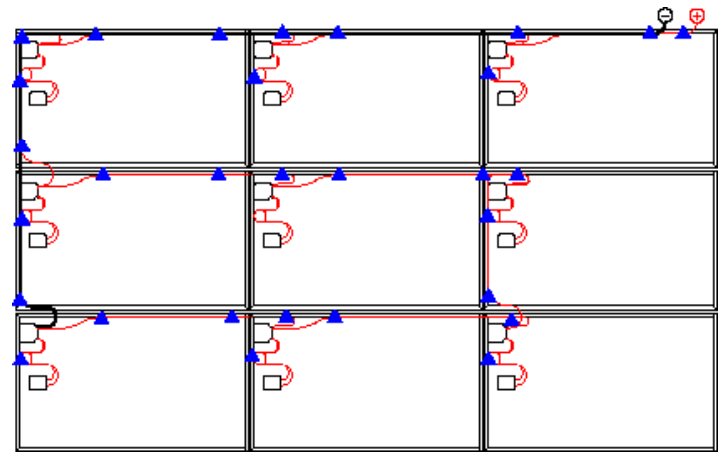
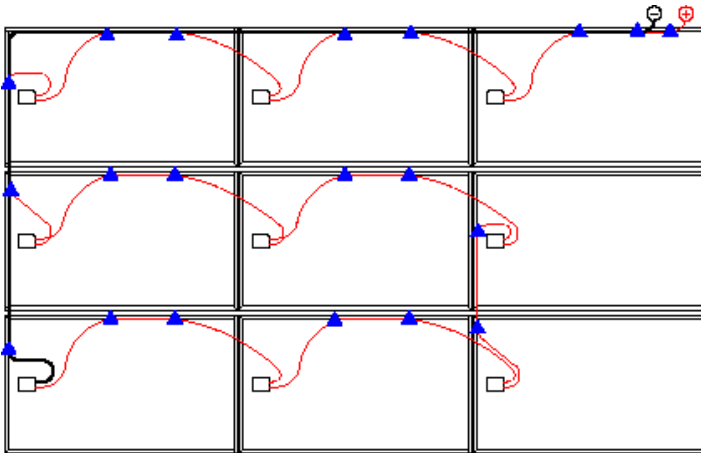


3) Run bare, solid EGC from Ground Lug R to Junction Box, bond bare EGC to stranded EGC in Junction Box. For details on installing the Junction Box reference the **RL Universal Junction Box Installation Manual**.

INSTALLATION INSTRUCTIONS - SMART CLIPS

Smart Clips should be used to route conductors away from non-bonded components.

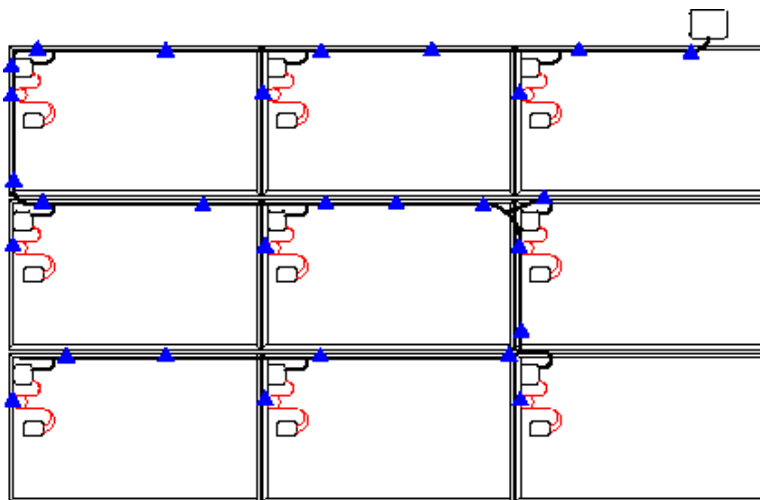
▲ SMART CLIP
— HOME-RUN/TRUNK CABLE
— PV CONDUCTORS



1A) For central inverter and DC to DC MLPE systems: Identify where PV string poles are located, use SnapNrack Smart Clips to manage conductors in route from far pole to the Junction Box

Install Note:

Use Smart Clips to manage PV module leads connected to the MLPE



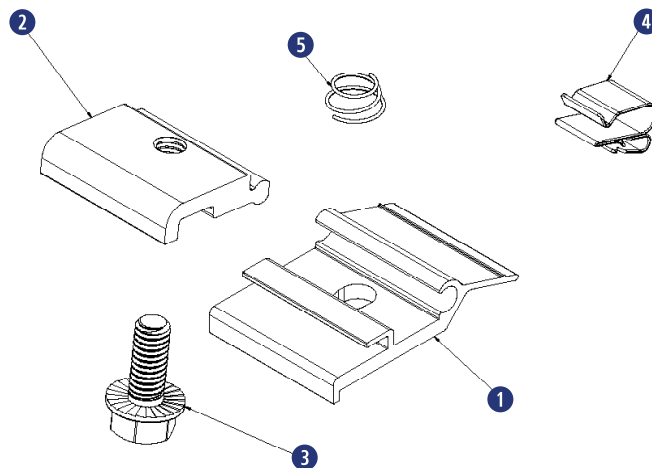
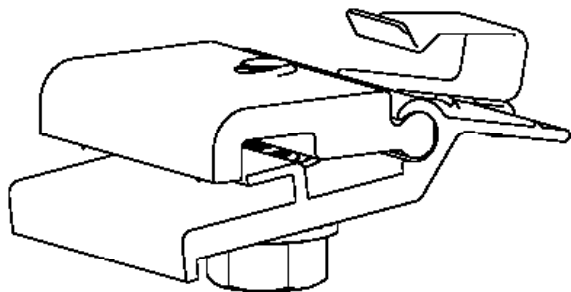
1B) For microinverter systems: Identify route from furthest microinverter to Junction Box, use Smart Clips to manage AC trunk cables and multiple PV wires.

Required Tools

- Socket Wrench
- Torque Wrench
- 1/2" Socket

Materials Included - MLPE Rail Attachment Kit

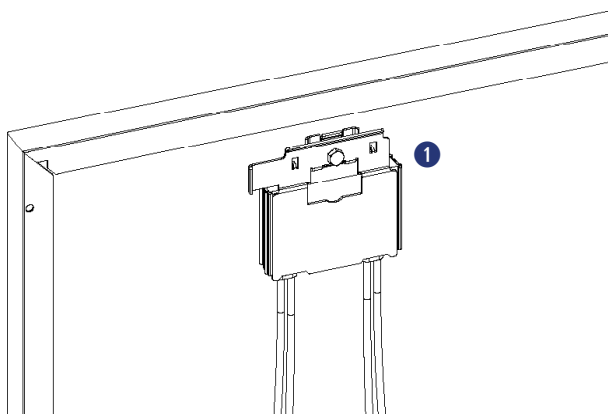
- ① (1) SnapNrack MLPE Frame Attachment Top
- ② (1) SnapNrack MLPE Frame Attachment Bottom
- ③ (1) 5/16"-18 X 3/4" Serrated Flange Bolt SS
- ④ (1) SnapNrack Smart Clip
- ⑤ (1) SnapNrack MLPE Frame Attachment Coil Spring SS



Materials Included

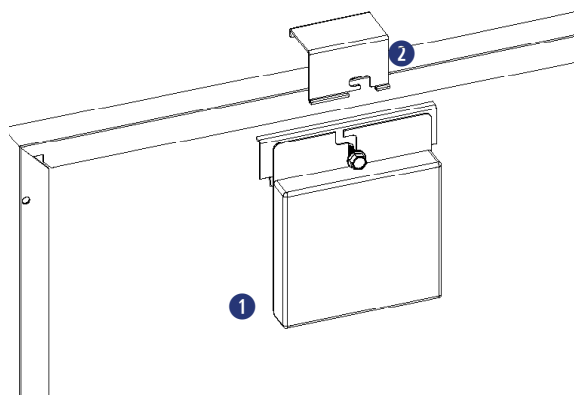
SolarEdge Frame Mount

- ① (1) SolarEdge Optimizer w/ Frame-Mounted Module Add-On



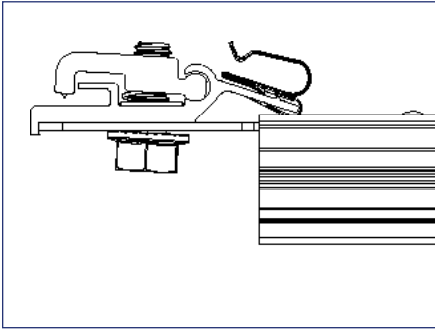
Enphase Frame Mount

- ① (1) Enphase Microinverter
- ② (1) Enphase Frame Mount

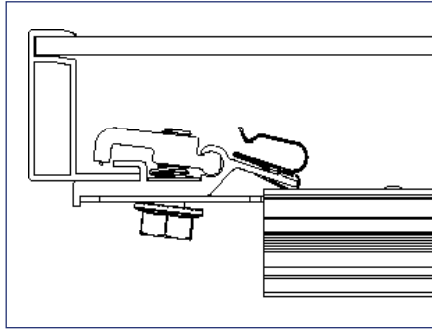


INSTALLATION INSTRUCTIONS - SNAPNRACK MLPE FRAME ATTACHMENT KIT

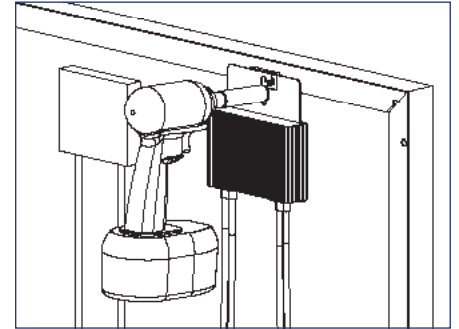
SnapNrack MLPE Frame Attachment kit are used to attach module level performance enhancing devices, and other devices such as an SRD (rapid shutdown device), directly to module frames, and provide integrated grounding/bonding for Devices grounded through metal back plate. (Refer to the list of tested MLPE devices on page 26 of this manual).



1) Slide the backplate channel of the MLPE device under the MLPE Frame Attachment Kit bolt. The MLPE mounting plate should rest against the MLPE mounting plate backstop on the MLPE Frame Attachment Kit.



2) Position the MLPE Frame Attachment Kit on the module frame flange in a location that will not interfere with mounting system components. The module frame flange should rest against the module flange backstop on the MLPE Frame Attachment Kit.



3) Tighten the mounting bolt on the MLPE Frame Attachment Kit to 10 lb-ft (120 lb-in).



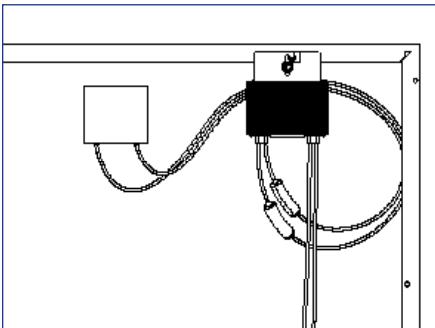
Install Note:

The MLPE Frame Attachment Kit bonds the following components: Module Frame, MLPE backplate and Smart Clip.



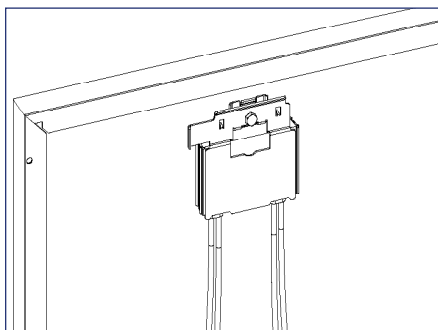
Install Note:

Avoid blocking module frame drainage holes when installing the MLPE Frame Attachment Kit.

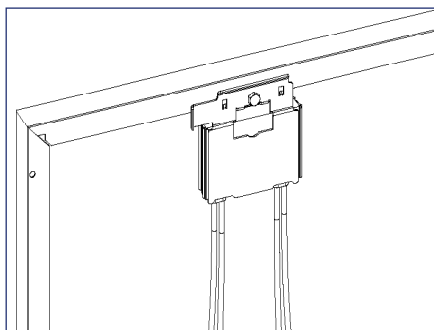


4) Connect the module leads to the input connectors on the MLPE device and manage conductors with the integrated Smart Clip.

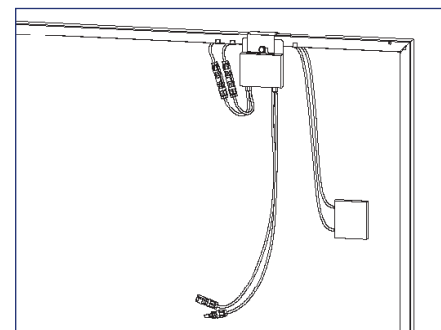
INSTALLATION INSTRUCTIONS - SOLAREEDGE FRAME MOUNT



1) Locate the SolarEdge optimizer with Frame-Mounted Module Add-On at a location on the module frame that will not interfere with the MightyMount Metal-T Legs.



2) Install the optimizer mounting plate onto the module frame and tighten hardware to 11 ft-lbs.



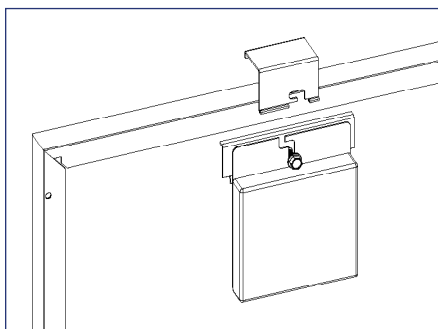
3) Connect the module leads to the input connectors on the optimizer and manage conductors with SnapNrack Smart Clips.



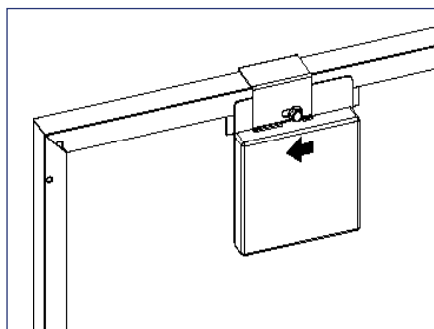
Install Note:

Refer to the SolarEdge optimizer Frame-Mounted Module Add-On installation guide for additional instructions

INSTALLATION INSTRUCTIONS - ENPHASE FRAME MOUNT



1) Locate the Enphase Frame Mount bracket clamp at a location on the module frame that will not interfere with the MightyMount Metal-T Legs.

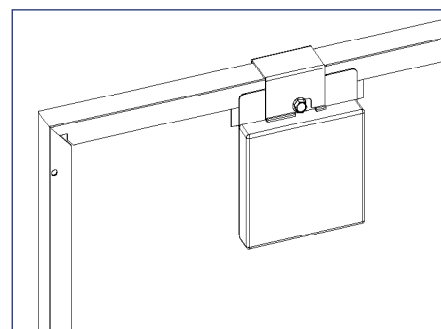


2) Slide the microinverter unit onto the bracket clamp, then move it slightly to the left.



Install Note:

The microinverter mounting flange should be on the outside of the module frame.



3) Tighten the hardware to 13 ft-lbs

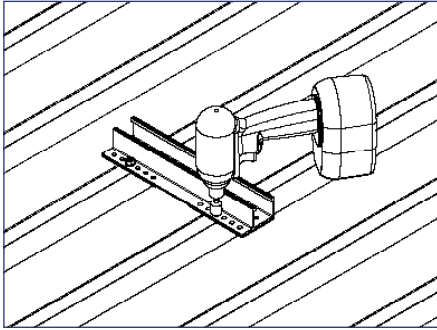
4) Connect module leads to microinverter DC connectors.



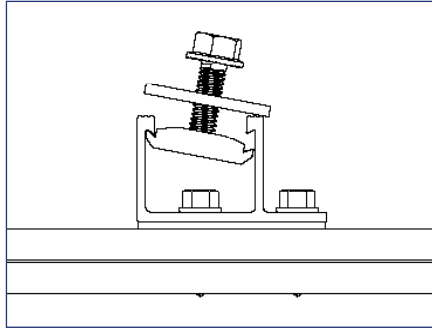
Install Note:

Refer to the Enphase Frame Mount installation guide for additional instructions.

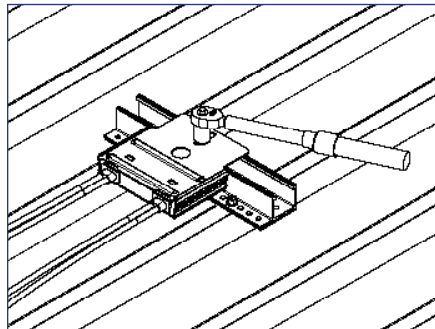
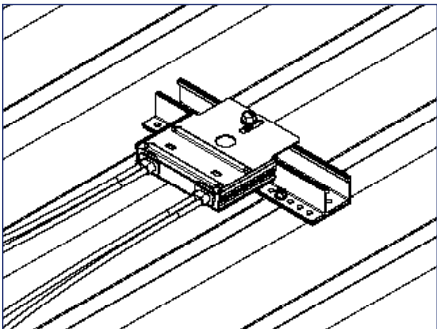
INSTALLATION INSTRUCTIONS - DECK MOUNTED MLPE & RSD



1) Attach MightyMount Metal-T Track across at least (2) trapezoidal ridges with (4) #14 Stainless Steel tek screws.



2) Insert channel nut of MLPE Attachment Kit into MightyMount Metal-T Track.



3) Insert back plate of device over the large fender washer, and

Tighten bolt to 10-16 ft-lb.

Install Note:

The MightyMount Metal-T Track can also be used as a means of attaching RSDs, junction boxes, and other hardware to the roof.

Install Note:

It is recommended that module leads and connectors are prepared for installation using SnapNrack Smart Clips before being brought to the rooftop.

- With no MLPE, secure module leads to module frame to allow access to connectors while modules are installed
- Secure MLPE device to module frame with SnapNrack MLPE Frame Attachment Kit and connect module leads to MLPE, and manage leads by positioning connectors to allow access during installation

Required Tools

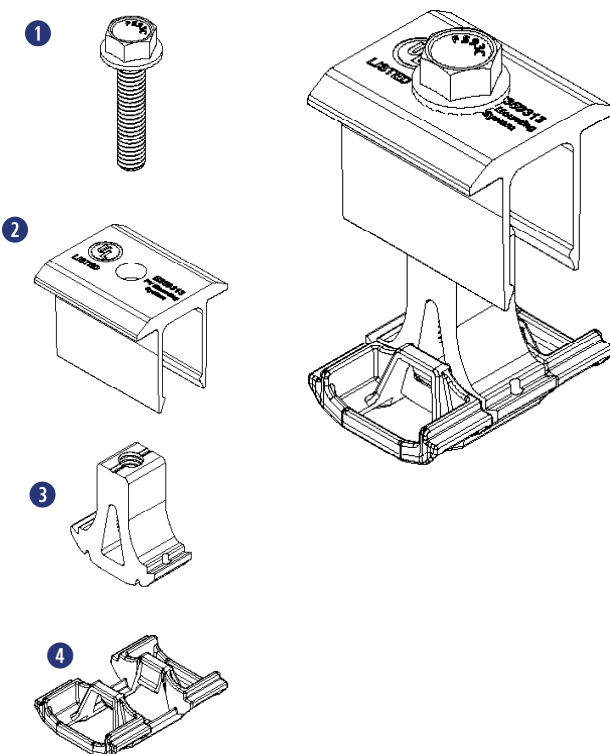
- Socket Wrench
- Torque Wrench
- 1/2" Socket

Materials Needed

- 1 Pre-Installed SnapNrack MightyMount Metal-T Tracks
- 2 SnapNrack Ultra Mid Clamp Assemblies
- 3 SnapNrack Ultra End Clamp Assemblies
- 4 PV Modules

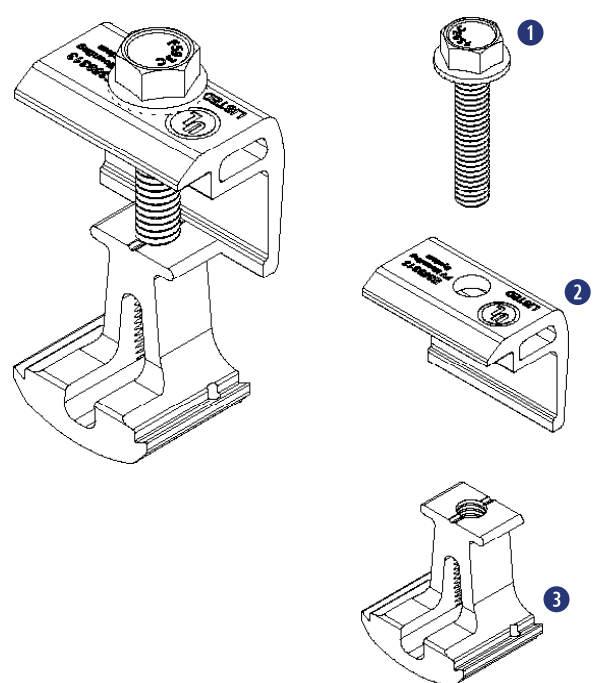
Ultra Mid Clamp Assembly

- 1 (1) 5/16"-18 X 1-1/2" SS Flange Bolt
- 2 (1) SnapNrack Ultra Mid Clamp Top
- 3 (1) SnapNrack Ultra Mid Clamp Base
- 4 (1) SnapNrack Ultra Mid Clamp Extension

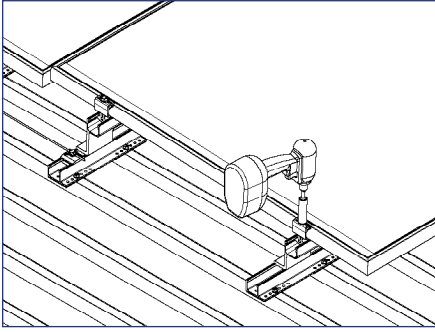


Ultra End Clamp Assembly

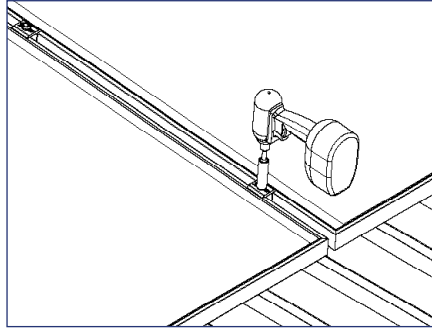
- 1 (1) 5/16"-18 X 1-1/2" SS Flange Bolt
- 2 (1) SnapNrack Ultra End Clamp Top
- 3 (1) SnapNrack Ultra End Clamp Base



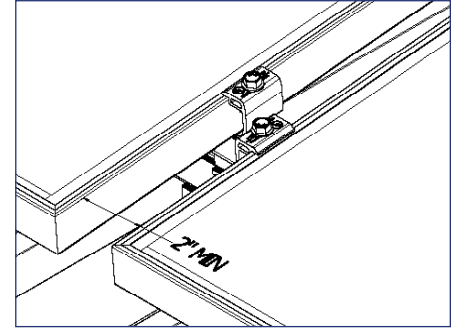
INSTALLATION INSTRUCTIONS



1) Align the first module to ensure the row stays straight with the roof edge. Secure module to the Leg Assemblies with (2) Ultra End Clamps. Tighten to 16 ft lbs.



2) Install modules along each row using Ultra End Clamps and Ultra Mid Clamps. Adjust leg locations as needed to accommodate module dimensions. Tighten to 16 ft-lbs.



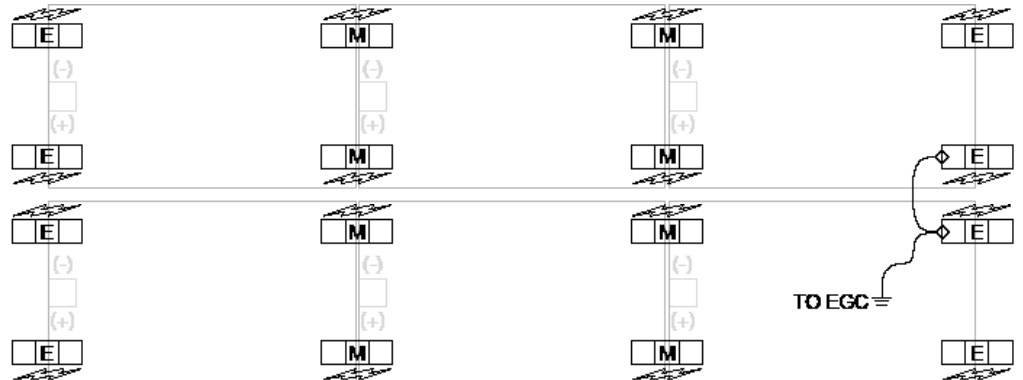
3) Install (2) Ultra End Clamps every 8th module to allow for expansion and contraction, using both tracks. Be sure to leave a minimum 2 inches between modules.

GROUND PATH DETAILS

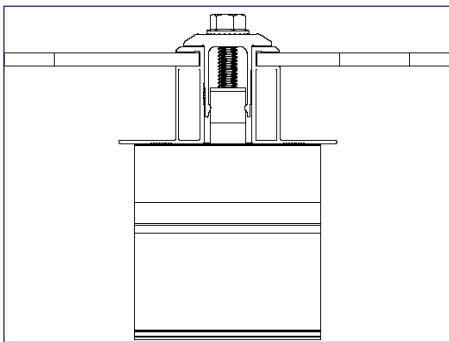
All MightyMount Metal-T components in the ground path have been Certified to be used multiple times for grounding/bonding. The UL 2703 Listing does not specify a maximum number of uses for the Riser, Mid Clamps, End Clamps, or Ground Lug. Review the requirements of the National Electric Code (NEC) Article 250 to select the appropriate Equipment Grounding Conductor size based on the short-circuit current of the PV system.

When using Ground Lug R the following components are part of the fault current ground path:

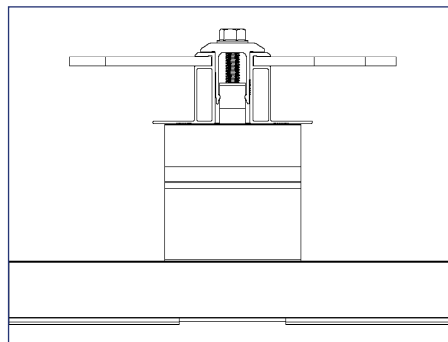
- SnapNrack MightyMount Metal-T Track
- SnapNrack Leg Assemblies
- SnapNrack Ultra End Clamp
- SnapNrack Ultra Mid Clamp



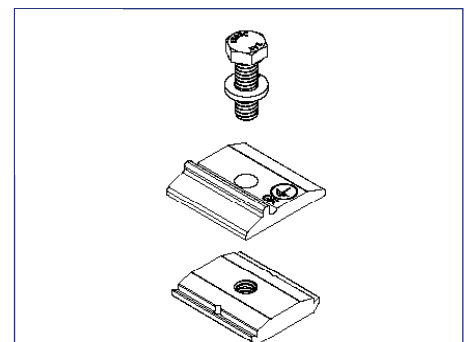
GROUNDING METHOD DETAILS



1) Module to module and module to Leg bonding provided by Ultra End and Mid Clamps.



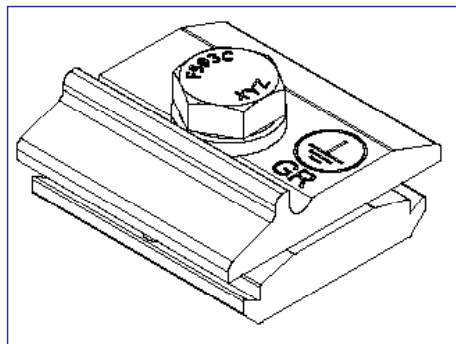
2) Module to MightyMount Metal-T Track provided by SnapNrack MightyMount Metal-T Leg Assemblies.



3) Each continuous row is connected to Equipment Grounding Conductor through SnapNrack Ground Lug R installed on one MightyMount Metal-T Track per row.

GROUNDING MARKING DETAILS

The Ground Lug R is marked with the ground symbol.



Maintaining the Grounding Bonding When Removing a Module

INSTRUCTION FOR MAINTAINING THE GROUNDING BONDING WHEN REMOVING A MODULE FOR SERVICING

CAUTION: Module removal may disrupt the bonding path and could introduce the risk of electric shock. Additional steps may be required to maintain the bonding path. Modules should only be removed by qualified persons in compliance with the instructions in this manual.

Module removal is not presented as a frequently expected occurrence and will not be required as part of routine maintenance.

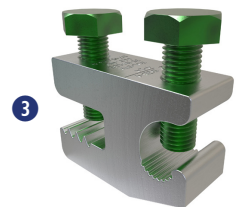
Scenarios that could result in a disruption of the bonding path are described, for example irregularly-shaped arrays, arrays consisting of individual rows, and any other scenario where module removal could disrupt the bonding path. In most cases, the removal of a module for servicing will not disturb or break grounding continuity. If a module is to be removed that will break continuity, these are the steps that must be taken to maintain a continuously bonded SnapNrack MightyMount Metal-T System.

Required Tools

- Socket Wrench
- Torque Wrench
- 1/2" Socket
- 7/16" Socket

Required Materials

- 1 #10 Or Larger Bare Copper Conductor
- 2 SnapNrack SKU 242-02101
- 3 IlSCO Part No. SGB-4
- 4 DynoRaxx Dynobond™

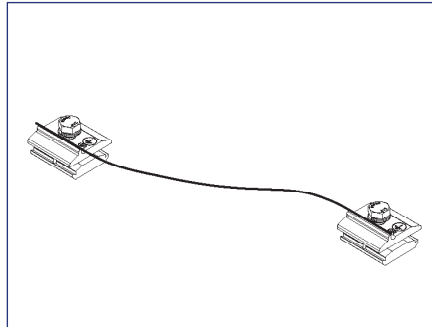


Maintaining the Grounding Bonding When Removing a Module

JUMPER ASSEMBLY INSTRUCTION & INSTALLATION

CAUTION: Do Not Remove the Module until the Jumper is installed

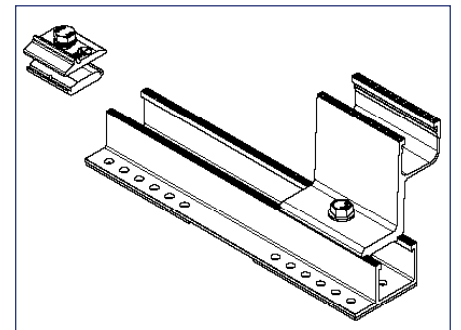
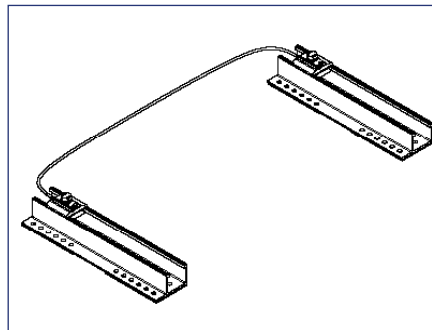
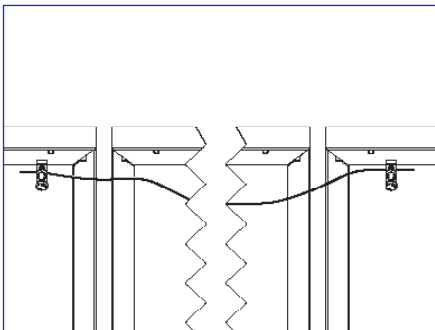
1) Identify the existing ground path at the location of module removal and choose an appropriate length of #10 bare copper to bridge the soon to be broken ground path.



Example of assembled bonding jumper using (2) SnapNrack Ground Lugs

2) Attach one ground lug to each end of #10 bare copper wire. See recommended options below:

1. (2) SnapNrack SKU: 242-02101
2. (2) IlSCO part no. SGB-4
3. (1) SnapNrack part no. 242-02101 & (1) IlSCO part no. SGB-4
4. (1) DynoRaxx DynoBond™



3) Before the module is removed, attach the assembled bonding jumper. Depending on where the module will be removed and choice of ground lug, jumper attachment locations will vary.

- IlSCO SGB-4 lugs can be attached to MightyMount Metal-T Tracks, Leg Assemblies, or module frames
- The SnapNrack Ground Lug can only be attached to SnapNrack MightyMount Metal-T Tracks.
- DynoRaxx DynoBond™ is approved and appropriate when a short bonding jumper is needed from module to module.

4) Service the array. With the bonding jumper installed, it is now safe to remove the module for service or maintenance.

5) After Servicing the array reinstall the module and original ground path. Only then Remove the bonding jumper.

Caution: Do not remove the bonding jumper until original ground path is established.

APPROVED MODULE INFORMATION

MightyMount Metal-T has been tested with the following UL Listed module series:

The MightyMount Metal-T System employs top-down clamps which have been evaluated for frame-to-system bonding, at specific mounting torques and with the specific modules listed below. All wattage values are covered.

Note:

For UL 2703 system fire rating information, please see page 4 of this manual.

Manufacturer	Model	
Aptos Solar	DNA-120-MF23-XXX	DNA-120-MF26-XXXW
	DNA-120-BF23-XXX	DNA-144-MF26-XXXW
	DNA-144-MF23-XXX	DNA-120-BF26-XXXW
	DNA-144-BF23-XXX	DNA-144-BF26-XXXW
Boviet Solar	BVM6610P-XXX	BVM6612P-XXX
	BVM6610M-XXX	BVM6612M-XXX
Canadian Solar	CS6K-XXX-M	CS3K-XXX-P
	CS6K-XXX-M-SD	CS3K-XXX-MS
	CS6K-XXX-P	CS3U-XXX-MS
	CS6K-XXX-P-SD	CS3U-XXX-P
	CS6K-XXX-MS	CS1K-XXX-MS
	CS6P-XXX-M	CS1H-XXX-MS
	CS6P-XXX-P	CS1H-XXX-MS-AB
	CS6P-XXX-P-SD	CS3W-XXX-P
	CS6V-XXX-M	CS3N-XXX-MS
	CS6V-XXX-P	CS1Y-XXX-MS
	CS6X-XXX-P	
CertainTeed	CTXXXHC11-06	CTXXXHC11-06
	CTXXXHC11-06	CTXXXHC11-06
Chint Solar	CHSM6612M-XXX	CHSM72M-HC-XXX* (Astro 4)
	CHSM6612M(BL)-XXX	CHSM72M-HC-XXX* (Astro 5)
	CHSM6612M/HV-XXX	
Dehui Solar	DH-M760B-XXXW	DH-M760F-XXXW
	DH-M760W-XXXW	DH-M772F-XXXW
	DH-M772W-XXXW	
ET Solar	ET-P660XXXBB	P660XXXWB/WW
	ET-P660XXXWB	P660XXXWWG
	ET-P660XXXWW	M660XXXBB
	ET-P660XXXWWG	M660XXXWW

Manufacturer	Model	
Hanwha Q Cells	Q.PEAK BLK-G3.1-XXX	Q.PEAK DUO-L-G5.3-XXX
	Q.PEAK G3.1-XXX	Q.PEAK DUO-L-G7-XXX
	Q.PLUS BFR-G3.1-XXX	Q.PEAK DUO-L-G7.1-XXX
	B.LINE PLUS BFR-G4.1-XXX	Q.PEAK DUO-L-G7.2-XXX
	B.LINE PRO BFR-G4.1-XXX	Q.PEAK DUO-L-G7.3-XXX
	Q.BASE GY-XXX	Q.PEAK DUO-L-G6-XXX
	Q.PEAK BFR-G4-XXX	Q.PEAK DUO-L-G6.2-XXX
	Q.PEAK BFR-G4.1-XXX	Q.PEAK DUO-L-G6.3-XXX
	Q.PEAK BLK-G4.1-XXX	Q.PEAK DUO-L-G8-XXX
	Q.PEAK BLK-G4.1/TAA-XXX	Q.PEAK DUO-L-G8.1-XXX
	Q.PEAK G4-XXX	Q.PEAK DUO-L-G8.2-XXX
	Q.PEAK G4.1-XXX	Q.PEAK DUO-L-G8.3-XXX
	Q.PEAK G4.1/MAX-XXX	Q.PEAK DUO-G5/SC-XXX
	Q.PEAK G4.1/TAA-XXX	Q.PEAK DUO-BLK-G5/SC-XXX
	Q.PLUS BFR-G4-XXX	Q.PEAK DUO-G6+/SC-XXX
	Q.PLUS BFR-G4.1-XXX	Q.PEAK DUO-BLK-G6+/SC-XXX
	Q.PLUS BFR-G4.1/TAA-XXX	Q.PEAK DUO BLK-G6+/AC-XXX
	Q.PLUS G4-XXX	Q.PEAK DUO-ML-G9-XXX
	Q.PLUS GY-XXX	Q.PEAK DUO-BLK-ML-G9-XXX
	Q.PLUS BFR-GY-XXX	Q.PEAK DUO BLK-G9-XXX
	Q.PRO BFR-G4-XXX	Q.PEAK DUO BLK-G9+-XXX
	Q.PRO BFR-G4.1-XXX	Q.PEAK DUO-ML-G9+-XXX
	Q.PRO BFR-G4.3-XXX	Q.PEAK DUO-BLK-ML-G9+-XXX
	Q.PRO BFR-GY-XXX	Q.PEAK DUO-G5/TS-XXX
	Q.PRO BLK-GY-XXX	Q.PEAK DUO BLK-G5/TS-XXX
	Q.PRO G4-XXX	Q.PEAK DUO-G6/TS-XXX
	Q.PRO GY-XXX	Q.PEAK DUO BLK-G6/TS-XXX
	Q.PRO GY/SC-XXX	Q.PEAK DUO-G6+/TS-XXX
	Q.PEAK DUO-G5-XXX	Q.PEAK DUO BLK-G6+/TS-XXX
	Q.PEAK DUO-BLK-G5-XXX	Q.PEAK DUO XL-G9.2-XXX
	Q.PLUS DUO-G5-XXX	Q.PEAK DUO XL-G9.3-XXX
	Q.PEAK DUO-G7-XXX	Q.PEAK DUO XL-G9.3/BFG-XXX
	Q.PEAK DUO-BLK-G7-XXX	Q.PEAK DUO G10-XXX
	Q.PEAK DUO-G7.2-XXX	Q.PEAK DUO BLK-G10-XXX
	Q.PEAK DUO-G6+-XXX	Q.PEAK DUO G10+-XXX
	Q.PEAK DUO-BLK-G6+-XXX	Q.PEAK DUO BLK-G10+-XXX
	Q.PEAK DUO-G6-XXX	Q.PEAK DUO XL-G10.2-XXX
	Q.PEAK DUO-BLK-G6-XXX	Q.PEAK DUO XL-G10.3/BFG-XXX
	Q.PEAK DUO-G8+-XXX	Q.PEAK DUO XL-G10.3-XXX
	Q.PEAK DUO-BLK-G8+-XXX	Q.PEAK DUO XL-G10.c-XXX
	Q.PEAK DUO-G8-XXX	Q.PEAK DUO XL-G10.d-XXX
	Q.PEAK DUO-BLK-G8-XXX	Q.PEAK DUO L-G8.3/BFG-XXX
	Q.PLUS L-G4-XXX	Q.PEAK DUO L-G8.3/BGT-XXX

Manufacturer	Model	
Hanwha Q Cells	Q.PLUS L-G4.1-XXX Q.PLUS L-G4.2-XXX Q.PEAK L-G4.1-XXX Q.PEAK L-G4.2-XXX Q.PLUS DUO-L-G5-XXX Q.PLUS DUO-L-G5.1-XXX Q.PLUS DUO-L-G5.2-XXX Q.PLUS DUO-L-G5.3-XXX Q.PEAK DUO-L-G5.2-XXX	Q.PEAK DUO ML-G10-XXX Q.PEAK DUO BLK ML-G10+-XXX Q.PEAK DUO ML-G10+-XXX Q.PEAK DUO BLK ML-G10-XXX Q.PEAK DUO ML-G10.a+-XXX Q.PEAK DUO BLK ML-G10.a+-XXX Q.PEAK DUO ML-G10.a-XXX Q.PEAK DUO BLK ML-G10.a-XXX
Hanwha SolarOne	HSL60P6-PB-2-XXXQ	HSL60P6-PB-4-XXXQ
Helene	60M-XXX 60P-XXX	72M-XXX 72P-XXX
HT-SAAE	HT60-166M-XXX	HT60-182M-XXX
Hyundai	HiS-MXXXRG HiS-SXXXRG HiS-SXXXRW HiS-MXXXMG HiS-SXXXMG	HiD-SXXXRG HiA-SXXXMS HiS-SXXXXY HiS-SXXXXYI
JA Solar	JAM6-60-XXX/SI JAP6-60-XXX/3BB JAM60S09-XXX/PR JAM60S10-XXX/MR JAM60S10-XXX/PR JAM60S12-XXX/PR JAP72S01-XXX/SC JAM72S09-XXX/PR	JAM72S10-XXX/MR JAM72S10-XXX/PR JAM72S12-XXX/PR JAP6(k)-72-XXX/4BB JAM60S17-XXX/MR JAM54S30-XXX/MR JAM54S31-XXX/MR
Jinko Solar	JKMXXXM-60 JKMXXXM-60L JKMXXXM-60HL JKMXXXM-60HBL JKMXXXP-60 JKMXXXP-60-J4 JKMXXXP-60-V JKMXXXP-60B-J4 JKMXXXPP-60 JKMXXXPP-60-V JKMXXXM-72 JKMXXXM-72L-V JKMXXXP-72	JKMXXXP-72-V JKMXXXPP-72 JKMXXXPP-72-V JKMSXXXP-72 JKMXXXM-72HL-V JKMXXXM-72HL-TV JKMXXXM-72HBL JKMXXXM-6TL3-B JKMXXXM-6RL3-B JKMXXXM-7RL3-V JKMXXXM-7RL3-TV JKMXXXM-72HL4-V JKMXXXM-72HL4-TV
Kyocera	KUXXX-6YYY	KUXXX-8YYY
LG	LGXXXN1C-A5 LGXXXN1K-A5 LGXXXQ1C-A5 LGXXXQ1K-A5	LGXXXA1C-V5 LGXXXM1C-L5 LGXXXM1K-L5 LGXXXN1C-N5

Manufacturer	Model	
LG	LGXXXS1C-A5	LGXXXN1K-L5
	LGXXXN2C-B3	LGXXXN1K-A6
	LGXXXN2W-B3	LGXXXN1C-A6
	LGXXXN1C-G4	LGXXXN1W-A6
	LGXXXN1K-G4	LGXXXQ1C-A6
	LGXXXS1C-G4	LGXXXQ1K-A6
	LGXXXN2C-G4	LGXXXM1K-A6
	LGXXXN2K-G4	LGXXXM1C-A6
	LGXXXN2W-G4	LGXXXA1C-A6
	LGXXXS2C-G4	LGXXXQAC-A6
	LGXXXS2W-G4	LGXXXQAK-A6
	LGXXXN1C-V5	LGXXXN1K-B6
	LGXXXN1W-V5	LGXXXN2W-E6
	LGXXXN2T-V5	LGXXXN2T-E6
	LGXXXN2T-J5	LGXXXN1K-E6
	LGXXXN1T-V5	LGXXXN3K-V6
Longi	LR6-60-XXXM	LR4-60HPB-XXXM
	LR6-60BK-XXXM	LR4-60HIB-XXXM
	LR6-60HV-XXXM	LR4-60HPH-XXXM
	LR6-60PB-XXXM	LR4-60HIH-XXXM
	LR6-60PE-XXXM	LR6-60HIH-XXXM
	LR6-60PH-XXXM	LR6-60HIB-XXXM
	LR6-60HPB-XXXM	LR4-72HPH-XXXM
	LR6-60HPH-XXXM	
Meyer Burger	Meyer Burger Black*	Meyer Burger White*
Mission Solar	MSEXXXSO5T	MSEXXXSQ4S
	MSEXXXSO5K	MSEXXXSR8K
	MSEXXXSQ5T	MSEXXXSR8T
	MSEXXXSQ5K	MSEXXXSR9S
	MSEXXXMM4J	MSE60AXXX
	MSEXXXMM6J	MSEXXTS60
	MSEXXXSO6W	MSEXXXSX5K
	MSEXXXSO4J	MSEXXXSX5T
	MSEXXXSO6J	MSEXXXSX6S
	MSEXXXSQ6S	MSEXXXSX6W
Next Energy Alliance	USNEA-XXXM3-60	USNEA-XXXM3-72
	USNEA-XXXM3B-60	USNEA-XXXM3B-72
Panasonic	VBHNXXXKA01	VBHNXXXSA18
	VBHNXXXKA02	VBHN325SA17E
	VBHNXXXSA16	VBHXXXRA18N
	VBHNXXXKA03	VBHXXXRA03K
	VBHNXXXKA04	EVPVXXX(K)
	VBHNXXXSA17	
Phono Solar	PSXXXM-20/U	PSXXXMH-20/U

Manufacturer	Model	
REC	RECXXXPE RECXXXPE-BLK RECXXXT RECXXXT-BLK RECXXXT IQ RECXXXT2 RECXXXT2-BLK RECXXXNP RECXXXT2M RECXXXT272 RECXXXPE72 RECXXXPE72XV	RECXXXT2M 72 RECXXXT2M 72 BLK RECXXXT2M 72 BLK2 RECXXXT2SM 72 RECXXXT2SM 72 BLK RECXXXT2SM 72 BLK2 RECXXXAA RECXXXT3M RECXXXT4 RECXXXAA Pure RECXXXNP2
Renesola	JCXXXM-24/Bb	JCXXXM-24/BBh
Silfab	SLAXXX-M SLAXXX-P SSAXXX-M SSAXXX-P SILXXXBL SILXXXML SILXXXNL SLGXXX-M SLGXXX-P	SSGXXX-M SSGXXX-P SILXXXNT SILXXXHL SILXXXBK SILXXXHC SILXXXNU SILXXXNX
Solaria	Solaria PowerXT-XXXR-PX Solaria PowerXT-XXXR-BX Solaria PowerXT-XXXR-AC	Solaria PowerXT-XXXR-PM Solaria PowerXT-XXXR-PM-AC
SolarWorld	SWXXX-Mono	SWXXX-Mono XL
Suniva	MVX-XXX-60-5-701 MVX-XXX-60-5-7B1 OPT-XXX-60-4-100	OPT-XXX-60-4-1B0 OPT-XXX-60-4-800 OPT-XXX-60-4-8B0
Sunpower	SPR-EYY-XXX SPR-XYX-XXX SPR-EYY-XXX SPR-XYX-XXX SPR-P17-XXX-COM SPR-P19-XXX-COM SPR-AXXX-G-AC	SPR-AXXX SPR-AXXX-BLK-G-AC SPR-AXXX-BLK SPR-MXXX-H-AC SPR-MXXX SPR-MXXX-BLK-H-AC SPR-MXXX-BLK-H-AC
SunSpark	SST-XXXM3-60 SST-XXXM3B-60	SST-XXXM3-72 SST-XXXM3B-72
Talesun	TP660M-XXX TP660P-XXX	TP672M-XXX TP672P-XXX
Tesla	TXXXS	TXXXH
Trina	TSM-XXXDD05(II) TSM-XXXDD05A.05(II)	TSM-XXXPD05.08 TSM-XXXPD05.082

Manufacturer	Model	
Trina	TSM-XXXDD05A.08(II)	TSM-XXXPD05.08D
	TSM-XXXDD05A.082(II)	TSM-XXXPD05.08S
	TSM-XXXPA05	TSM-XXXDD06M.05(II)
	TSM-XXXPA05.05	TSM-XXXDE15H(II)
	TSM-XXXPA05.08	TSM-XXXDE15M(II)
	TSM-XXXPD05	TSMXXXDD05H.05(II)
	TSM-XXXPD05.002	TSMXXXDE06X.05(II)
	TSM-XXXPD05.05	TSM-XXXDE09.05
	TSM-XXXPD05.05S	
Vikram Solar	SOMERA VSMHBB.60.XXX.05	
Yingli	YLXXA-29b	YLXXP-29b
ZNShine	ZM6-60-XXX/M	ZXM6-NH144-XXXM
	ZXM6-NH120-XXXM	

MightyMount Metal-T has been tested with the following Module Level Power Electronic (MLPE) devices:

The MightyMount Metal-T mounting system has been tested with the following UL/NRTL Listed Module Level Power Electronic (MLPE) Devices. The back plates of the MLPEs have been evaluated for bonding to the MightyMount Metal-T Track through the MLPE Attachment Kit.

MLPE Manufacturer	Model	
AP Smart	RSD-S-PLC	
Celestica International	DG-006-F001201x	DG-006-F001401x
Delta Electronics	GPI00010105	
Enphase	C250	IQ7PLUS-72-2-US
	M215	IQ7PLUS-72-B-US
	M250	IQ8-60
	IQ6-60-2-US	IQ8PLUS-72
	IQ6PLUS-72-2-US	IQ8A-72
	IQ7-60-2-US	IQ8H-208-72
	IQ7-60-B-US	IQ8H-240-72
Generec	S2502	
Ginlong Technologies	Solis-RSD-1G	Solis-MLRSD-R2-1G
	Solis-MLRSD-R1-1G	
SolarEdge	P300-5NC4ARS	P405
	P320-5NC4ARS	P485
	P370-5NC4AFS	P505
	P400-5NC4AFS	P730
	P320	P800p
	P340	P850
	P370	P860
	P400	P950
	P401	
SMA	RSB-2S-US-10	
Tigo	TS4-R-F	TS4-R-S-DUO
	TS4-R-M	TS4-A-F
	TS4-R-O	TS4-A-2F
	TS4-R-S	TS4-A-O
	TS4-R-M-DUO	TS4-A-S
	TS4-R-O-DUO	

Note:

AP Smart RSD-S-PLC, Ginlong Solis-MLRSD-R1-1G and Solis-MLRSD-R2-1G, and all Tigo models have not been investigated for bonding since the enclosures are constructed entirely of polymeric materials.

Functionality of these devices was not evaluated.