

FALCON LOCK GRIP™

Falcon LockGrip LG-3 Installation and Use

The Falcon LG-3 is a two-way cable grip with Dynamic Vibration Arrest (DVA).

The grip can be used to couple cables together or form a loop, allowing for the cable to be passed through/around a lash point to fix structures/assemblies. Once the cable(s) have been passed through the grip, the DVA is engaged by twisting (clockwise) the set screw.

Once completed, the wire is clamped to the case

of the grip, keeping the grip from vibrating independent of the cable in windy or other conditions that cause oscillations. The following provides detailed instructions for use of the Falcon LG-3.



Falcon LG-3 Description

The Falcon LG-3 includes two, one-way cable grips that are positioned to operate in opposite directions. Additionally, a secondary grip is engaged by set screw, activating the DVA feature. Figures 1 & 2 show the LG-3 components.

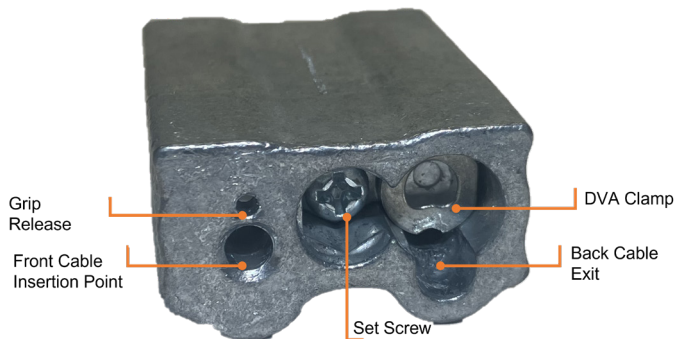


Fig. 1. LG-3 Front, Annotated

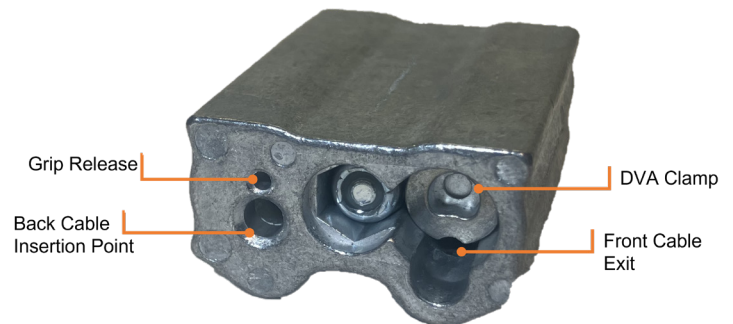


Fig. 2. LG-3 Back, Annotated

Cable Size

Falcon LG-3 is specifically for use with 1/8" cable (steel wire rope). Larger diameter cables are incompatible with the grip and smaller cable sizes will provide less performance or be non-functional.



Cable Pass-through

In typical applications, a cable (steel wire rope) is fixed to a frame or structure, then run to a separate point and looped through and back towards the origin (Fig. 3.A). In this configuration, the LG-3 is slid on to the cable prior to pass-through and the cable is passed back through the cable the opposite direction (3.B).

In this configuration, it is best to slide the LG-3 onto the cable with the set screw facing the origin. Once the cable is passed through the destination point, and back through the LG-3, appropriate (application specific) tension is applied to the assembly by pulling on the loose end (3.C). Once the desired tension is applied, the set screw is engaged by twisting (clockwise, #1 phillips) (3.D).

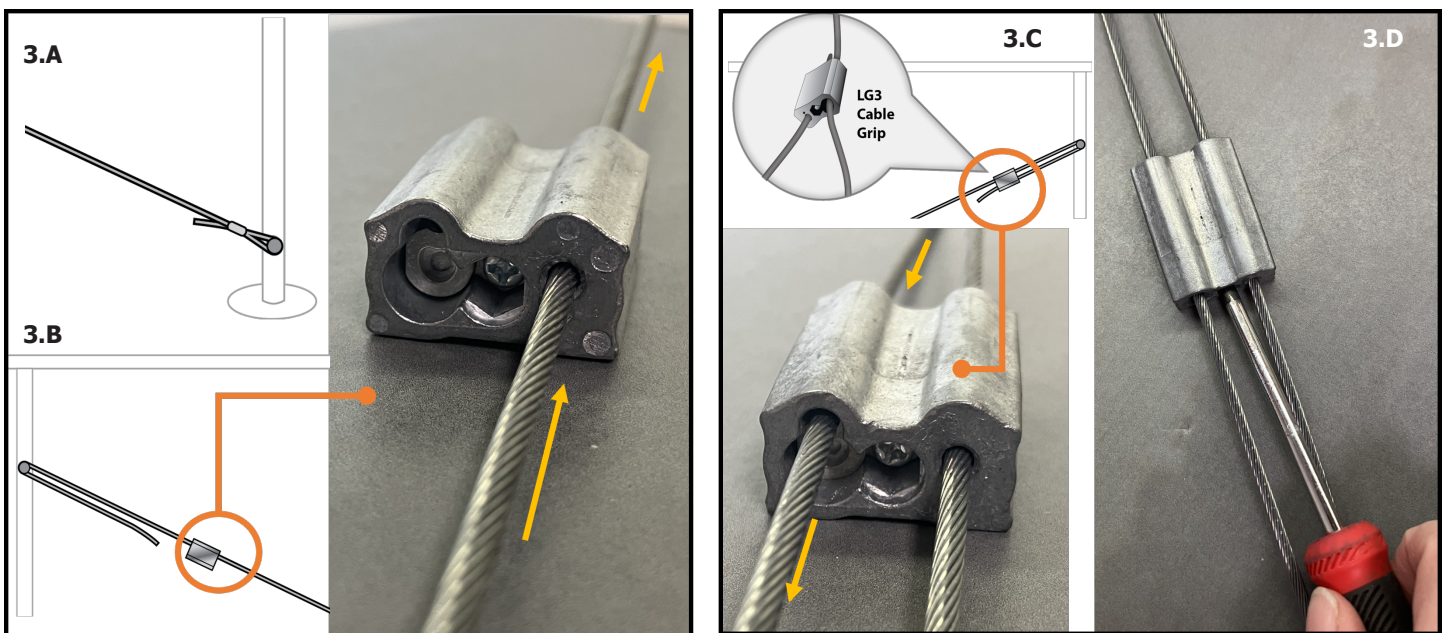


Fig. 3. LG-3 Cable Pass-through

Set Screw Torque

It is necessary to apply 10 in-lb of torque to the set screw. Do not over-tighten. As an example, hand snug with a small screw driver is sufficient. Additionally, a typical cordless drill with the speed and clutch set to their minimum speed and torque is sufficient. A torque measuring screwdriver can be used to ensure the screw is sufficiently tight. Figure 4 provides a photograph of a properly clamped wire.

Tensioning the LG-3

The tensioning of the Falcon LockGrip LG-3 can done by several methods including by hand or with the use of a manufacturers' suggested wire tensioning tool. The wire cable should be tensioned to the project-specific engineered specifications.

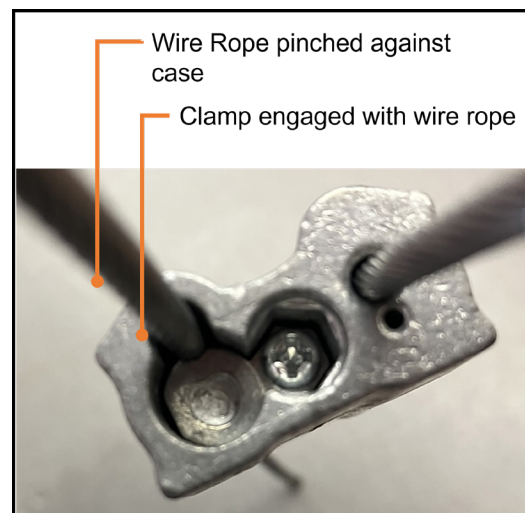


Fig. 4. LG-3 Clamped Wire Rope

Adjustment

In the event additional tension is required, or other adjustments are necessary, the set screw can be loosened, and the wire released by engaging the grip release function. To release tension, insert a pin into the grip release (5.A), far enough to contact the roller and pull the LG-3 toward the release pin. With the grip released, the wire rope can then be backed out of the grip (5.B).

If greater tension is desired in the assembly, loosen the set screw and apply force to create tension in the assembly. Re-tighten the set screw.

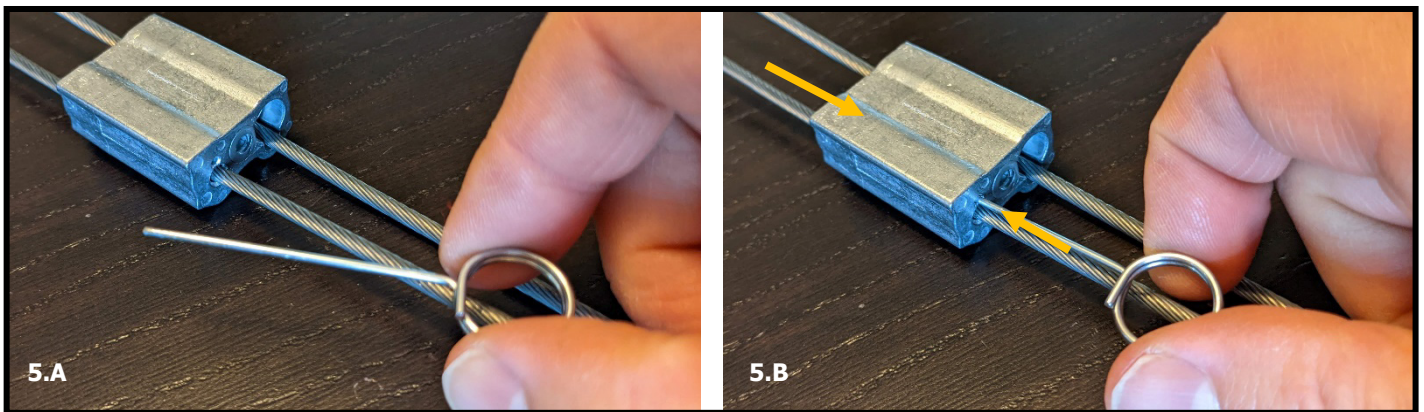
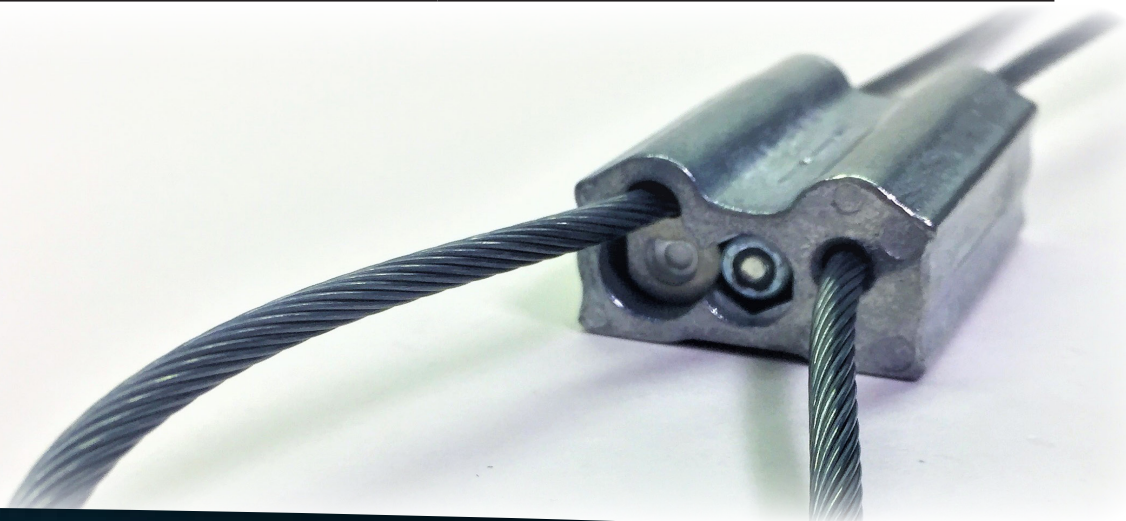


Fig. 5. LG-3 Cable Adjustment

LG-3 System Performance Loading Chart		
	Maximum Working Load	Safe Working Load (Max. working load/ 1.3 Safety Factor)
LG-3 with 1/8" Cable	1,850 lbs*	1,425 lbs
*Maximum load verified by independent, accredited third party testing, when used in conjunction with cable supplied by Western Green		

LG-3 Uses and Benefits

- Squaring Tensile Brace
- Create Wire Rope Loop
- Couple Wire Ropes
- High-Load Capacity
- Vibration Resistance
- All Metal Construction
- Easily Adjustable
- Labor and Shipping Friendly



FALCON LOCKGRIP™

Installation Made Easy with Falcon LockGrip™

The Falcon LockGrip LG-3 tensioner can be used in a variety of configurations for different applications. The two, one-way grips are designed to allow adjustable grip locking by activating and setting the dynamic vibration arrest (DVA) feature. The grip can be used to couple cables together or form a loop, allowing the cable to be passed through/around a lash point to fix structures/assemblies. Once the cable(s) have been passed through the grip, the DVA is engaged by twisting the set screw. Once completed, the wire is clamped to the case of the grip, keeping the grip from vibrating independent of the cable in windy conditions.

The tensioning of the Falcon LockGrip LG-3 can be done by several methods including by hand or with the use of manufacturers' suggested wire tensioning tool. The wire cable should be tensioned to the engineered rack specifications.

Follow the QR code to see the Falcon LockGrip LG-3 in action on a solar rack bracing application, and see our full LG-3 installation guide for step-by-step instructions on setting, tensioning, and adjusting the LG-3 tensioner.



SCAN QR CODE
For Full Installation Video

