



INSTALLATION INSTRUCTIONS

SECURE LANE LIFT BARRIER GATE (SL-LB)

MANUALLY OPERATED LIFT BARRIER GATE ARM



Questions? Call 520-780-9751 or visit our website at:



Your **SL-LB Manual Lift Barrier Gate Arm** is shipped with the appropriate **weight plates pre-installed on the base unit**, matched to the barrier arm length you ordered. If you decide to upgrade to a **longer barrier arm in the future**, your SL-LB system is designed to be expandable. We can supply the necessary components—**arm sections, connecting sleeves, pendulum supports, cable-truss supports, and additional weight plates**—to extend your system up to **30 feet in length**.

Important:

Before making any adjustments, modifications, or extensions to your manual lift barrier, **please contact us first**. (520)780-9751. We will walk you through the correct arm sections, connecting hardware, supports, and counterweight requirements to ensure your SL-LB operates safely and remains properly balanced.

Concrete Anchor Bolts are **not included**. Use 6"–8" concrete anchors (**J-bolts or LDT**) rated for the barrier load and properly spaced for secure mounting.

Gate Locking Padlock or pin lock **not included**.

Mounting Suggestions for the SL-LB Manual Lift Barrier Gate Arm



PLEASE CONSULT WITH AN ENGINEER FOR THE BEST ADVICE ON MOUNTING PADS.
AS SOIL CONDITIONS ARE ALWAYS DIFFERENT.

Standard Concrete Pad Installation

The unit includes a **surface-mounted base plate** with four pre-drilled **5/8" bolt holes**. The mounting plate measures **15" x 15"**, with bolt holes centered **1" in** from each edge.

Mount the base onto **existing concrete** or a **new concrete pad**. Use four **1/2" diameter, 6"–8" long concrete anchors** (J-bolts or LDT).

⚠ Note: Anchor bolts are not included.

Ensure concrete is **fully cured** before drilling. If preferred, you may **wet-set anchor bolts** into a newly poured pad.

A standard pad should meet the following guidelines:

- **Minimum size:** 20" x 20"
- **Thickness:** At least 8"
- **Concrete:** 3,000–4,000 psi
- **Reinforcement:** Eight #4 rebars, evenly spaced in both directions
- **Rebar cover:** Minimum 2" of concrete above rebar

For installations requiring future relocation, you may use **drop-in anchors** (such as CONFAST®) to make the unit removable and re-attachable to other pads.

Portable Concrete Pad

You may also build a **portable concrete pad** that can be moved using a forklift. This method should be reviewed by a **structural engineer**, as it is provided only as a general recommendation.

A portable pad should meet the following guidelines:

- **Minimum size:** 36" x 36"
- **Thickness:** 8" or more
- **Concrete:** 4,000 psi
- **Reinforcement:** Eight #4 rebars, spaced evenly in both directions
- **Rebar cover:** At least 2" of concrete

The pad must include **two forklift slots**:

- **Slot size:** Approximately 2" high x 8" wide
- Designed to accept forklift forks for safe lifting

For mounting, you may **wet-set four 1/2" diameter J-bolts** into the concrete, or consult a qualified expert regarding curing time before drilling anchors into the pad.

Installation Instructions:

SL-LB Lift Barrier Gate Arm

- **Step 1 - Unpack & Inspect (we package very well to protect your gate)**
 - Unpack the unit and inspect all components for damage or missing pieces.
 - Report any issues immediately: **520-780-9751**.
- **Step 2 - Anchor the Base Unit**
 - Bolt the base unit to your concrete or concrete pad.
 - Anchor bolts are not included.
 - Use $\frac{1}{2}$ " **diameter bolts, 6–8 inches long**.



- **Step 3 - Remove Shipping Bolt**
 - Remove the bolt and nut holding the unit in its upright shipping position using a $\frac{9}{16}$ " socket.
- **Step 4 - Lower to Horizontal Position**
 - Carefully lower the unit into a horizontal position so it is ready to receive the barrier arm sections.
 - Note: If you purchased a 20', 24', or 30' unit, the counterweights are heavy—up to 210 lbs. on the 30 ft model. You will need help holding it in the horizontal position as you connect the arm sections. **DO NOT USE THE HANDLE FOR LEVERAGE AT THIS STAGE. DO NOT USE THE LOCK TAB TO HOLD IN THE HORIZONTAL POSITON.** As the sections are added it will start to counterbalance out and become easier to manage.



WARNING

***** HEAVY - COUNTER WEIGHTS *****

DO NOT USE CURVED HANDLE FOR LEVERAGE BEFORE INSTALLING THE BARRIER ARM SECTIONS. THE HANDLE WILL BEND IF YOU DO. ONLY LIFT USING THE WEIGHT PLATES FOR LEVERAGE DURING THE INSTALLATION PROCESS. LOCKING HASP TABS ARE NOT TO BE USED TO SECURE THE WEIGHTED SIDE DURING ARM SECTION INSTALLATION. DO NOT USE THE LOCKING HASP TABS BEFORE ALL THE ARM SECTIONS HAVE BEEN INSTALLED. TABS WILL BEND.

- **Cable Truss Support Models Only (16', 20', 24', 30' Units)**

- If your unit includes the **Cable Truss Support**:

- The **triangle-shaped cable truss** bracket mounts on to the base receiving arm using the same two holes that secure the first 6 ft barrier arm section. This triangle bracket is partially pre-installed on the receiving arm.

- **Step 5 - Install First Barrier Arm Section**

- Insert the 6 ft white, reflective-striped arm section (the one with two mounting holes) into the red receiver tube on the base unit. Next install the second 6 ft section (the one with one hole and a black end cap) on to the pre-installed sleeve. The HW is on the sleeve, so you need to remove it and replace once the arm sections are in and ready to be tightened.
 - (If your total arm length exceeds 12 ft, see Step 7.)



- **Step 6 - Secure the Barrier Arm**

- Use the provided bolts and washers to secure the barrier arms.
 - Tighten with a $\frac{3}{4}$ " **socket**.
- If you have a unit with a longer arm than 12 ft and the cable truss bracket: SEE Pages 7,8 & 9 for cable installation. Hold off on tightening the arm sleeve bolts until after cable, cable couplers and pendulum post couplers are on.
 - Place the **triangle bracket** over the mounting holes after inserting the arm and secure it using the 4" bolts and washers. SEE Pages 7,8 & 9
 - Tighten with a $\frac{3}{4}$ " **socket**.



- **Step 7 - Install Additional Arm Section(s)**

- (For units longer than 12 ft)
- **Aluminum connecting sleeve(s)** are attached to the arm sections.
- Place the arm sections together using the sleeves
- Connect all the arm sections, place cable truss clamp and pendulum post (clamp) on to the arms before your install all the bolts and washers. This will make it easier to get the placement of the pendulum support and cable couplers just right. You will be able to slide freely without the bolts getting in the way. Once you have everything in the right spots, then you can insert the hardware and tighten. This is where you will also tighten the set screws on the couplers.



- **Step 8 -**
- **Cable Truss Models Only:**
 - If your unit includes a cable truss support, the **cable clamp bracket** must be installed before the pendulum support.
 - (Illustration shown in red for clarity; actual part is powder-coated white.)
- **Install Pendulum Support (for longer arms)**
- For arms **16 ft and longer**, install the pendulum support **5–8 ft from the tip** of the arm.
 - a. Slide the collar over the barrier arm.
 - b. Use a **7/16" socket** to tighten the two bolt-head set screws.
 - c. Tighten until the collar no longer moves.
- **Pendulum Support Requirements:**
 - Optional for **12–16 ft** arms
 - Required for **17–30 ft** arms
- **Cable Truss Models Only:**
 - If your unit includes a cable truss support, the cable clamp bracket must be installed before the pendulum support.
 - (Illustration shown in red for clarity; actual part is powder-coated white.)



Shown above in red for clarity.



The pendulum supports are powder coated white.

Units Equipped with a Cable Truss Support

If your SL-LB Manual Lift Barrier Gate Arm includes a **Cable Truss Support**, you will need to install the steel cable and the small round clamp bracket yourself.

Important: Both the steel cable and the round clamp bracket are included and shipped with your unit. Please locate these components before beginning installation.

Installation Tip: Ensure the steel cable is routed correctly and the clamp bracket is securely fastened to maintain proper arm stability and safety during operation.



Installing the Cable Truss Support

- **Attach the Cable Truss Clamp Bracket**

- Place the round Cable Truss Clamp Bracket onto the barrier arm. The steel cable will not span the full length of the arm, so leave some slack for adjustment. Slightly tighten the bolt head set screws using a 7/16" socket.
- **⚠ Note:** Do not fully tighten yet—you will need to move the bracket when adjusting cable slack.

- **Pendulum Support Reminder**

- Install the Cable Truss Clamp Bracket before attaching the pendulum support. See Step 8 on page 6 for pendulum support instructions.

- **Attach the Steel Cable**

- Bring the steel cable with the eye bolt to the triangle-shaped bracket at the main base. Install the cable and eye bolt as shown in the photo below.

- **Adjust and Tighten the Clamp Bracket**

- Stretch the cable and adjust the clamp bracket so most of the slack is removed. Fully tighten the clamp bracket using a 7/16" socket until it is secure and does not slide along the arm.

- **Tighten the Triangle Bracket**

- Return to the triangle-shaped bracket at the base. Use a 9/16" socket to turn the bolt, tightening the cable and thus lifting/straightening the barrier arm.



Tightening the Cable and Straightening the Arm

• Turn the Bolt

- Use a 9/16" socket to turn the bolt at the triangle-shaped bracket. This will tighten the steel cable and begin straightening the barrier arm.

• Safety Tip

- Have someone hold a screwdriver through the eye bolt as pictured.
- ⚠ This prevents pinching fingers while tightening the cable.

• Normal Arm Sag

- The arm will have a slight bend or sag before the cable is fully tightened. This is normal. As you turn the bolt, the cable will gradually become taut, and the arm will begin to level and straighten.

• Avoid Over-Tightening

- Once the cable is tight and the arm is straight, stop. Over-tightening can cause the arm to bow upward. If this occurs, slightly loosen the bolt until the arm is straight and level.

• Installation Trick

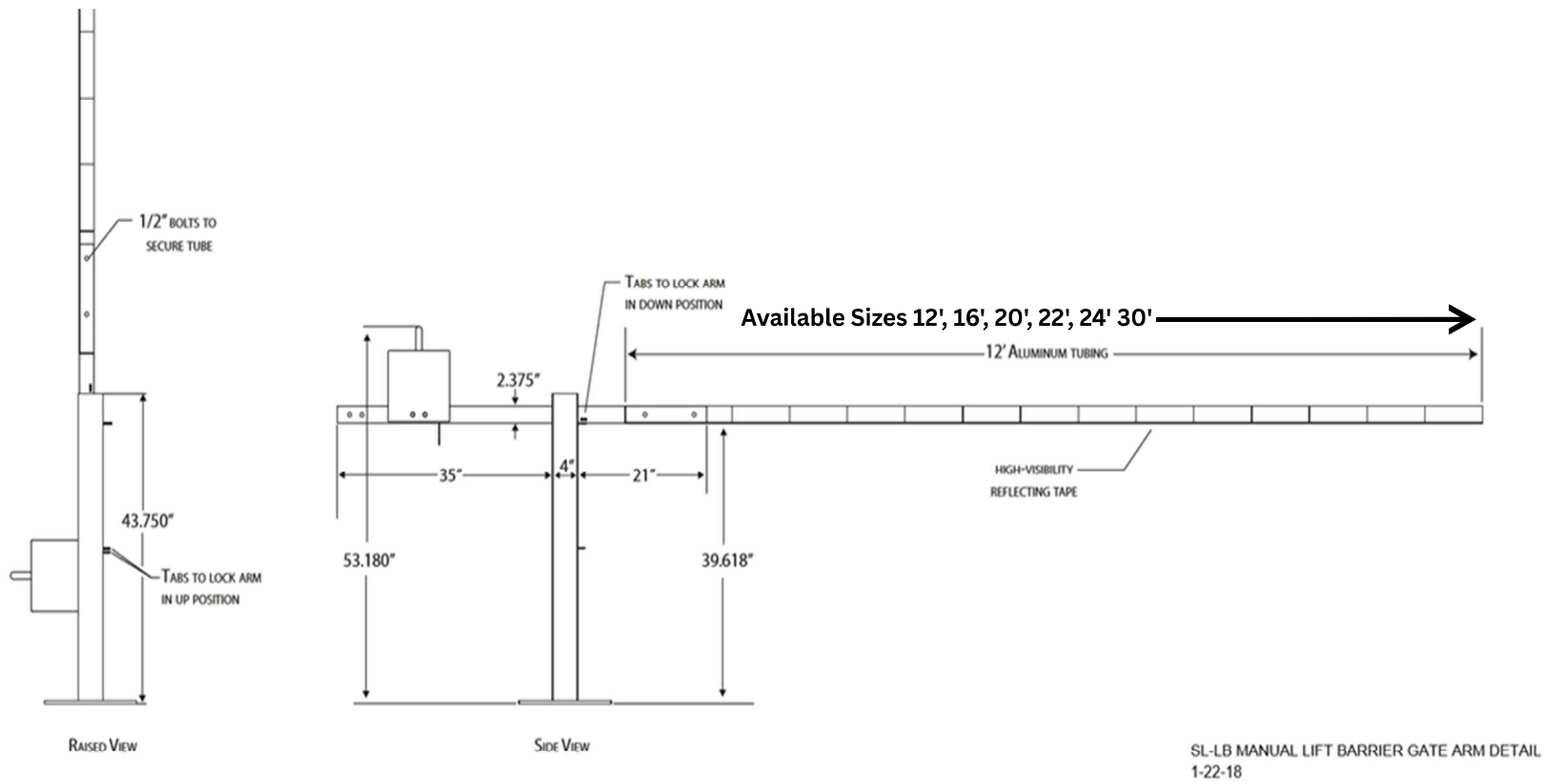
- For easier tightening and to reduce sag:
 - Have someone press down gently on the top of the arm while turning the bolt.
 - Ensure the pendulum support is installed before using this method, as shown in the photo below.



Locking the Barrier Arm

- To secure the barrier arm in the closed (horizontal) position, insert a padlock or pin lock into the horizontal hasp and lock it.
 - To secure the barrier arm in the open (vertical) position, raise the arm fully upright and insert a padlock or pin lock into the vertical hasp and lock it.
- **Extra Security**
- For additional security with a secondary locking point in the horizontal position, use the SL-RPL Lift Barrier Arm Receiving Post (Lockable):
 - Features a U-cradle that accepts a customer-provided pin lock or long-shackle padlock
 - Height adjustable - Up to 7 inches
 - 6" x 6" pad surface mounting plate
 - We recommended using this added post on our larger units whenever possible. Longer arms need this added support. Provides additional stability in windy conditions.





Model SL-LB Warranty

Thank you for purchasing an SL-LB Manual Lift Barrier Arm (with Cable Truss Support and Pendulum Support) from Secure Lane LLC. The following terms outline the coverage provided under our manufacturer's warranty.

2-Year Warranty

- Covers all wear parts on the barrier, including the pendulum supports and cable truss supports.
- All workmanship is covered under this 2-year warranty.
- This warranty does not cover cosmetic damage, such as scratches, abuse, or general wear and tear.

What's Included

- Free replacement of wear parts for up to 2 years.
- Includes bearings, foam handle grips, and rubber bumpers.
- Free replacement of pendulum supports if they fail during normal, intended use.
- ⚠ Photo evidence of failure may be required. If parts cannot easily repair the issue, a new pendulum support will be shipped free of charge.

Customer Support

- If you experience a problem with your SL-LB Manual Lift Barrier Gate, Cable Truss Supports, or Pendulum Supports:
 - **Call:** (520) 780-9751
 - **Email:** sales@secure-lane.com or sales@barriergatearm.com

Secure Lane LLC

<https://www.securelaneproducts.com>



Touch-Up Paint

- To maintain the appearance of your barrier arm, you can order powder coat touch-up paint that matches the Cardinal color finish.
- **Recommended Paint:** Cardinal Powder Coat RD-03 Red High Gloss
- **Order Online:**



Website: www.securelaneproducts.com
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