





# METAL FENCING INSTALLATION GUIDE

## INTRODUCTION >>>



**Congratulations** on the purchase of your new Mueller Metal Fence.

This guide is designed to help you through the installation process.

Prior to start of installation, check all local regulations regarding fencing, location of all buried utility lines, and correct property lines. Call 811 or visit www.call811.com for more information on dig testing. Locate all overhead obstacles, including utility lines and tree branches, and mark as a caution area.

- Coated sheets are warranted on the painted side only. The back side (wash coat white) carries no warranty.
- When applying lawn chemicals (fertilizer, insecticides, weed killer, etc.), be careful to not get any on the fence.
- Chemical residue can cause damage to the fence and will void paint warranty.
- Mueller recommends washing the fence after chemicals are applied.

# SUGGESTED TOOLS & SUPPLIES >>>

			- The second sec
Tape Measure	Level	Auger	Post Hole Digger
Shovel	Adjustable Wrench	Mallet or Hammer	Screw Gun
7/8" Socket	Phillips Head, 5/16" & 3/8" Nut Setter	Circular Saw with Metal Cutting Blade	Tin Snips
Chop Saw	CONCRETE	Marker Paint	Fence String
	SAFETY EQUIP	MENT	
C-Clamps	Safety Ear	Gloves St	teel Toe Knee Pads
	Glasses Protect		ootwear

Your new Mueller fence comes in 6', 9', or 12' sections. For the purposes of this guide, we will illustrate the 9' sections.

#### 12' Frame Section

2 Posts 8' Channel 4" Gal. 14 ga Punched 2 Runners 12' Purlin 4" Gal. 14 ga Punched 8 Fin Head Bolts/Nuts

#### 9' Frame Section

2 Posts 8' Channel 4" Gal 14 ga Punched 2 Runners 9' Purlin 4" Gal. 14 ga Punched 8 Fin Head Bolts/Nuts

#### **6' Frame Section**

2 Posts 8' Channel 4" Gal 14 ga Punched 2 Runners 6' Purlin 4" Gal. 14 ga Punched 8 Fin Head Bolts/Nuts

#### **Sheets/Screws for Fence**

6' 2" UPN Reversed Color Tek Screws Stitch Screws

#### Trim

Top ( <mark>A</mark> )	2 3/4" x 1" x 1"
Bottom ( <mark>B</mark> )	2 3/4" x 1"
Corner ( <mark>C</mark> )	4" × 4"



Note: Use Tek screws to attach sheets to purlins, stitch screws to attach sheets to sheets.

# GATE PARTS >>>

#### 3' Gate Frame

2 pcs 69" x 1 1/2" Square Tube 14 ga Galvanized (uprights) 3 pcs 35" x 1 1/2" Square Tube 14 ga Galvanized (cross bars) 1 pc 8' x 4" Square Tube 11 ga Galvanized (post) 6 Gussets Galvanized 1 pair Hinges (14 x 1" Tek Screws) 1 Paddle Latch (14 x 1" Tek Screws)

#### 6' Gate Frame

2 pcs 69" x 1 1/2" Square Tube 14 ga Galvanized (uprights)
3 pcs 71" x 1 1/2" Square Tube 14 ga Galvanized (cross bars)
1 pc 8' x 4" Square Tube 11 ga Galvanized (post)
6 Gussets Galvanized
1 pair Hinges (14 x 1" Tek Screws)
Post
1 Paddle Latch (14 x 1" Tek Screws)
4"

#### 12' Gate Frame

2 gates 6' (see above). Add 1 drop rod





4″

# LAY OUT FENCE LINE

- A. Determine the corners of your fence and hammer in stakes. Run a string between the stakes outlining the layout of your fence. This step ensures that your posts will be set in a straight line.
- B. Mark the location of the corner posts using the marker/spray paint.



# FIELD LOCATE GATE

A. Determine the location of your gate and mark where to dig your two gate post holes. It is recommended to place your gate on level ground to ensure the gate swings properly.

For a **3 ft**. gate, the distance between your gate posts should be **3'**, **4''** For a **6 ft**. gate, the distance between your gate posts should be **6'**, **4''** For a **12 ft**. gate, the distance between your gate posts should be **12'**, **7''** 

*Note: Determine right/left hand gate swing direction before setting 4" x 4" gate post.* 



Note: When measuring, use a measuring wheel or run tape along the ground to allow for elevation change.

< 7 ►

# **INSTALLATION ON SLOPING APPLICATIONS**

If ground conditions slope 1/2" to 12" or less, the Mueller recommends the sloping method for installation.

Note: posthole measurements change on sloping elevations. One method to aid in digging postholes the proper distance is to assemble a few frame sections on the ground and mark the ground before digging. With assistance, you can stand several sections up at once, making sure the posts are at the correct height and plumb, or disassemble and set individual sections.

Sheet and trim application are the same as a flat elevation. Slightly stagger the sheets to achieve the desired slope.

# **INSTALLATION ON SEVERE SLOPES**

For sloping conditions steeper than 1/2" to 12", Mueller recommends the step-down method of installation.

Note: posthole measurements change on sloping elevations. One method to aid in digging postholes the proper distance is to assemble a frame section on the ground and mark the ground before digging. Do not assemble more than one frame section since the posts will be different heights for each section.

Once the holes are dug, place posts back-to-back at the proper height for each section and screw together using self drilling tek screws. Once the posts are screwed together and placed in the hole, add dry concrete and plumb. Note the hole will have to be deep enough to accommodate the lower post.

Once the frame is in place, sheet each section making sure to keep panels level across the top, and stepping down at each section.



# **DIG POST HOLES**

A. For a level ground installation, begin at a corner. This will give you a good starting point.

Note: Mueller Fencing is designed to be installed in one of three fashions: Level, Sloping (maximum slope 1/2" for every 12") or Step Down

If you are working on a slope, it is better to begin at the top and work your way down. Mueller Metal Fence is designed to accommodate slopes that are up to six inches on a twelve-foot pitch. If your ground level slopes more than that, we recommend using the step down method.

- B. Start at one corner post and dig post hole 8" 12" in diameter and 26" deep. Repeat for the remaining corner posts.
- C. Dig both gate post holes 8" 12" in diameter and 26" deep.
- D. After your corner and gate locations are set. Locate all interior post holes center to center taking into account whether you are using 6 ft., 9 ft., or 12 ft. framing lengths. Mark each location of the posts using the marker/spray paint.
- E. Dig all post holes at marked locations 8" 12" in diameter and 26" deep.



# SET POSTS AND INSTALL TOP AND BOTTOM RAILS

- A. Bolt two posts together to create a corner post. Have the open channel facing the direction of the fence line.
- B. Place a corner post in the hole at the approximate position and pour the dry concrete mix to fill the hole about 3" from the top. Position post and measure that it is 6 ft. above ground level, straight and plumb. Repeat for remaining corner posts.

#### Note: This installation guide uses the dry mix method for setting posts.

C. Place both gate posts in the holes at the approximate position and pour the dry concrete mix to fill the hole about 3" from the top. Position posts and measure that it is 6 ft. above ground level, straight and plumb.



Note: Gate will attach to the gate post.

## **STEP 4 > >** *> continued*

- D. Attach the top and bottom rails to the corner post with  $1/2'' \times 1''$  fin head bolt into the predrilled holes.
- E. Bolt the next back to back post in the hole at the approximate position and pour the dry concrete mix to fill the hole about 3" from the top. Position post and measure that it is 6 ft. above ground level, straight and plumb. Attach the top and bottom rails with 1/2" x 1" fin head bolt into the predrilled holes. Repeat this step as you make your way around the entire fence until all post holes are set and top and bottom rails are installed.



# WATER IN POSTS

- A. Check that all posts are straight and plumb.
- B. Pour water in each post hole to ground surface until fully saturated, and allow the concrete to cure for a minimum of 24 to 48 hours.



# **GATE FRAME ASSEMBLY**

A. Attach upright rails to gussets as pictured making sure upright is pushed tightly into the corner of the gusset. Next attach cross rails forming a rectangle and secure with #12 screws. Next, attach the center horizontal framing piece and secure with the remaining two gussets.

Note: Horizontal Rails go inside vertical parts.



B. Next, the gate hinges will be secured to the gate frame. First, measure 3" from the edge of the gusset. Place hinge as shown and attach with self drilling screws.









## **STEP 6 > >** *> continued*

- C. Stand gate up and hold the gate at its hinges against the gate post at the proper position and height. Level the gate and adjust accordingly. The gate frame should be level with the top rail. Drill the 14 x 1" screws through pre-drilled holes.
- D. After gate is hung, verify that it is level. If necessary, adjust the hinges until correct.





E. Attach the striker rod to the gate by using the 14 x 1" screws. Finally, align the latch with the striker rod and attach the latch to the end post using the 14 x 1" screws.

Note: For best results, gates should be mounted to swing away from finished side.





# **INSTALL SHEETING PANELS ON FENCE**

- A. The panels are identical top and bottom. However, they do have two different sides, front to back. Color to the finished side.
- B. Starting at the gate and working outwards, place a 3 ft. panel over the top and bottom rails. Drill a Tek screw through the sheeting panel into the top rail and repeat for bottom rail. Screws should be installed on the outward side of the fence to secure panel in place.





- C. Place second panel next to the one you just installed. Overlap the panel so there is no gap. Repeat "Step B".
- Continue sheeting the entire fence (Steps B-C) until it is completed, except for the gate.

Note: When you reach the end of a section that needs a panel that is less than 3 ft., simply back lap the panel until it is the correct length to meet the next post.

Top View showing lap

Note: Do not allow sheet metal to rest on the ground. At least 1" clearance is recommended.



# **INSTALL SHEETING PANELS ON GATE**

A. Using the same method as "Step 7", start on one side of the gate and place a 3 ft. sheeting panel over the top and bottom rails. Drill Tek screws through the panel into the top of the gate frame and repeat for the bottom gate frame. Screws should be installed on the outward side of the gate to secure panel in place.

Note: Gate sheets are 6'.

B. Place second panel next to the one you just installed if you are building a 6 ft. gate.
Overlap the panel so there is no gap.





# **INSTALL TOP, BOTTOM, CORNER AND SIDE JAMB TRIM**

A. Once all panels are in place, the final step is installing trim. Start by placing a corner trim piece at a corner. Drill a stitch screw through the corner trim section into the sheeting panel at the top, middle and bottom. Repeat for other side of corner trim piece. You should secure with six screws. Repeat until all corner trim is installed.





B. Install the side jamb trim. Place a side jamb trim piece over panel aligning to the edge of an exposed post. Drill a Tek screw through the side jamb trim section into the post at the top, middle and bottom. Repeat until all side jamb trim is installed.



Note: Side Jamb Trim is same dimension as Top Trim. 2 3/4" Leg goes behind sheet in this application.



## **STEP 9 > >** *> continued*

C. To install the top trim, begin at to your gate and work outward. Place a top trim section over the top of a sheeting panel. Drill a stitch screw through the top trim section into the sheeting panel. Screws should be placed about every 3 ft. Repeat until all top trim is secured.

Note: Long Leg (2 3/4") goes on dress side.



D. Install the bottom trim using the same method as the top trim. Hold a bottom trim section under the bottom sheeting panel. Drill a stitch screw through the bottom trim section into the sheeting panel. Screws should be placed about every 3 ft. Repeat until all bottom trim is secured.

*Note: Leave small gaps on bottom trim between sheet and trim.* 



# NOTES > > >



## IronClad Guarantee

# FIND OUT MORE ABOUT MUELLER, INC.

## Call

### 877-2-MUELLER (877-268-3553)

This toll-free number connects you to one of our sales locations across the Southwest.

## Click

## www.MuellerInc.com

Our interactive website offers photos and all the details of our metal products.

## Come by

More than 30 locations. Our branches are staffed with experts who are always happy to answer any questions you may have.

## Find us

On Facebook, check out our latest news and events.