



LEVEL RAILING INSTALLATION INSTRUCTIONS

- Please read all instructions completely before starting any installation of our railing systems.
- Rail sections come in 6ft and 8ft.
- Posts are available in RESIDENTIAL rated (2.5" and 3.0") and COMMERCIAL (3" .125 wall with 6 boss channels).
- Optimum railing should be installed using accepted building principles in accordance with local building codes and installation guidelines.
- Optimum has been tested by Intertek and meets the current testing standards for IRC and IBC construction codes.
- If you have any questions, please call us or check the website for more install details.
- **SAFETY:** Always be safe and follow all instructions when using power tools and always wear safety goggles!
- Any questions? Call 844-332-5338 and ask for your railing specialist.



TESTED AND EVALUATED



IMPORTANT: Consult your local building code official and check all code requirements.
IMPORTANT: If installing post lighting, wiring must be installed prior to securing posts.

All fasteners are included in 37" & 43" Optimum kits. Fasteners for post base are not included. Optimum railing kits (37" & 43") are packaged for secure and safe shipment. Rails and balusters are separated by corrugated compartments. The bracket kit is packaged securely and placed in compartment of the box.

RECOMMENDED TOOLS

- Level
- Rubber Mallet
- 2-Speed Square
- Cordless Drill and Impact Driver
- Quick Clamp Grips
- Measuring Tape
- Miter Saw with High Tooth Count
- 13/64" Drill Bit
- #3 Screwdriver Bit
- Ratchet Set
- Portable Band Saw

HARDWARE AND PROFILES

Optimum Boxed Railing Kits include:

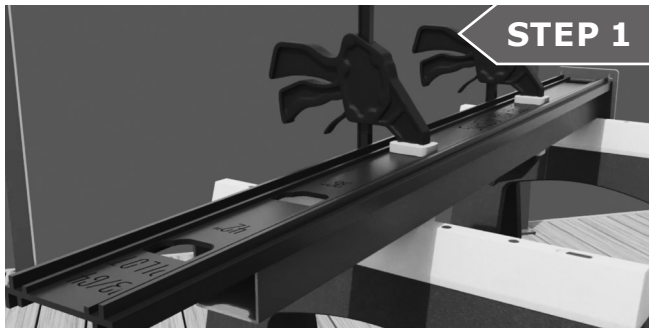
- Top Rail
- Bottom Rail
- 3/4" Square Balusters
- 2 - Top Drop In Brackets
- 2 - Bottom Drop In Brackets
- 18/8 SS Fasteners
- 12 - #14 Tek T-30 Self-Cutting
- Foot Block and Shoe



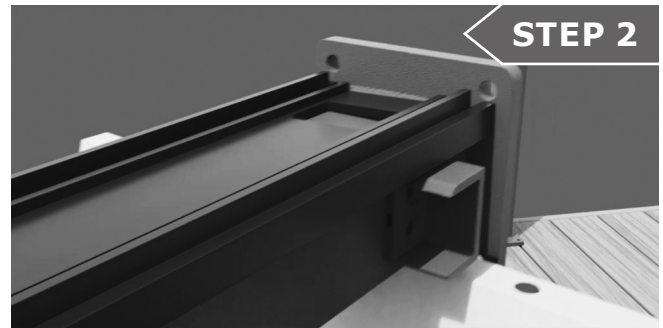
Purchase the Optimum Bracket Template for easy and EXACT installations.

USING BRACKET TEMPLATE TO ATTACH BRACKETS TO POSTS

- **USE THE TEMPLATE BEFORE INSTALLING POSTS.** For complete instructions, visit our Youtube channel for template video: <https://www.youtube.com/channel/UCH08CMDrOVYQ0jHxTjv5gEg>
- For easier installation, use saw horse work station. If posts are previously installed, insure 2 piece flange cover is removed. It may be necessary to remove the mounting screws from the base plate as that will interfere with template removal.

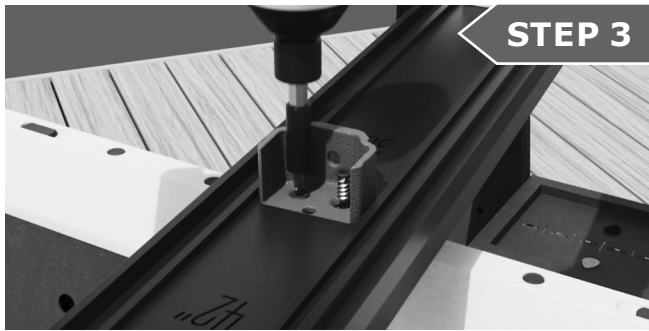


Place the appropriate side of the template against post, based on post width. Temporarily fasten the template onto the post using bar clamps.



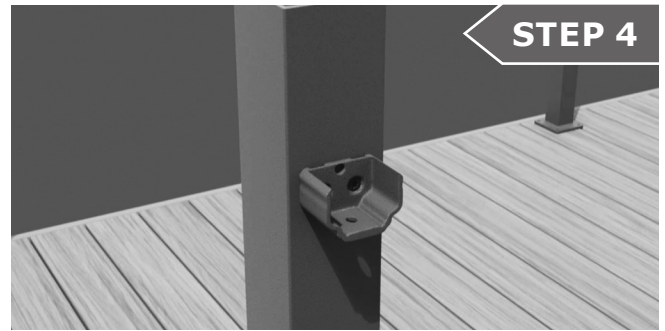
NOTE: For corner posts, you must pre-drill the holes on both sides BEFORE installing the rail brackets. Having a bracket installed on one side will prevent the guide template from laying flush against the post.

USING TEMPLATE TO ATTACH BRACKETS TO POSTS (continued)



STEP 3

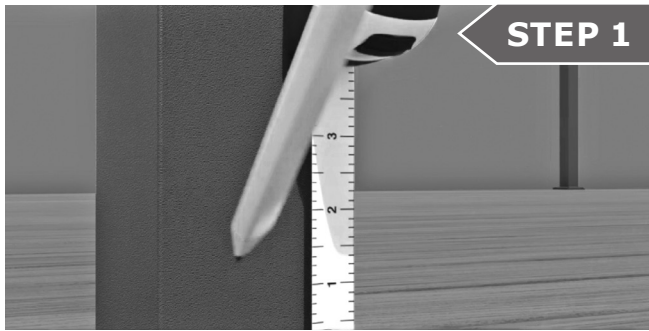
Secure the top bracket using the #14 x 1" Tek 18/8 screws provided. Secure the bottom bracket using the #14 x 1" Tek 18/8 screws provided.



STEP 4

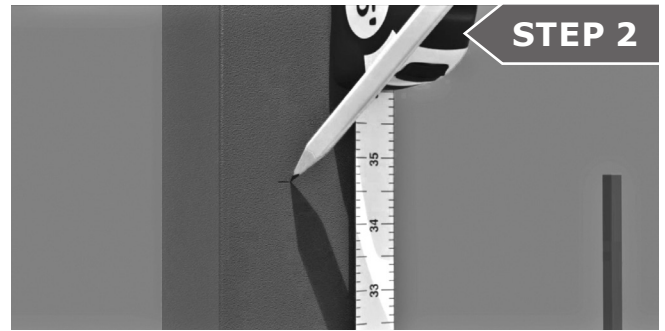
Remove the template from the post and flip the post over if doing in-line rails or attach the template to the next post.

ATTACHING BRACKETS TO THE POST NOT USING TEMPLATE



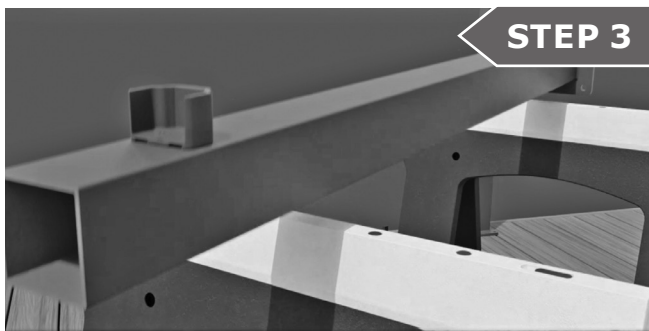
STEP 1

Measure 1-3/8" from the top of the flange and make a pencil mark at that height.



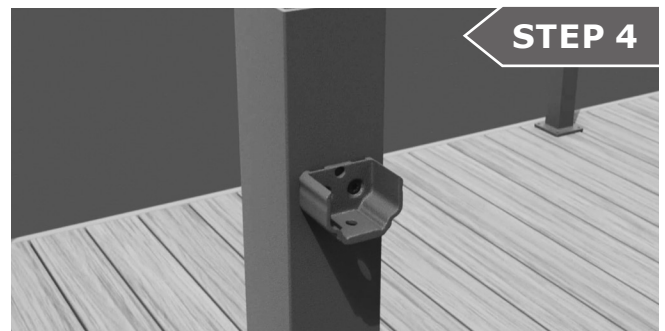
STEP 2

Place a pencil mark at 34-5/8" from top of flange when using 37" rail. Or, place a pencil mark at 40-5/8" from top of flange when using 43" rail.



STEP 3

Place brackets on marks, mark the holes or use bracket as template for fastening brackets. Attach all brackets with two - #14 Tek T-30 screws each.



STEP 4

Flip the post over if doing in-line rails and follow Step 3.

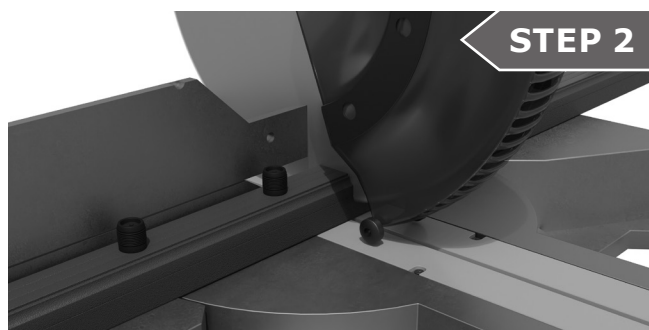
POST PLACEMENT AND INSTALLATION

- Visit our Youtube channel for post installation video: <https://www.youtube.com/channel/UCH08CMDrOVYQ0jHXtJv5gEg>

LEVEL RAIL INSTALLATION



Measure between the two posts.



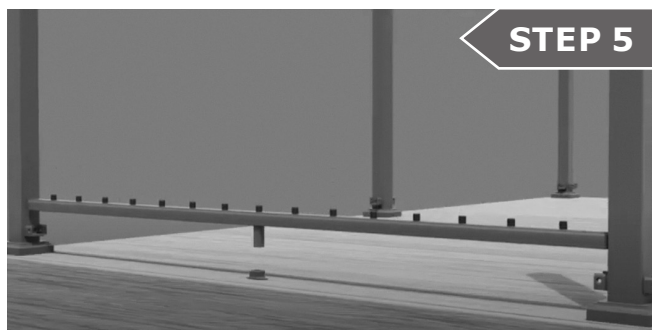
Cut the top and bottom railing profiles to size. Check bottom rail for correct fit. Ensure to deduct for bracket thickness against post, approximately 1/8" per bracket.



Locate and mark the center of the bottom rail and secure the footblock nub with the provided #8 Tek screw.



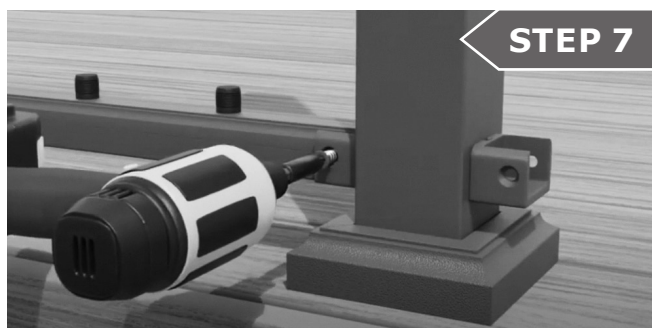
Press the footblock onto bottom rail.



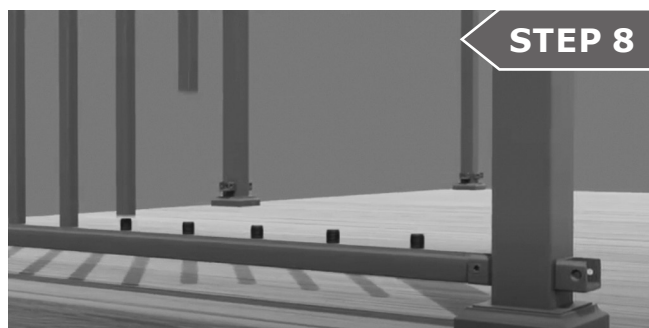
Drop the bottom rail into the bottom brackets and put the footblock shoe in place.



With the footblock shoe in place, secure it to the floor with the provided screws.



Replace bottom rail and drive #14 Tek screws into one side of each of the bottom brackets at both ends. NOTE: Only one #14 Tek screw is required for rail-to-bracket attachment. Holes may be provided on both sides for ease of access for install.



Press each baluster onto the nubs of the bottom rail. See next page for alternate method.

LEVEL RAILING INSTALLATION INSTRUCTIONS (continued)



STEP 9

Tip: Walk top rail from one end.

Drop the top rail onto the balusters and top brackets, adjusting the balusters as needed to insert each rail nub.

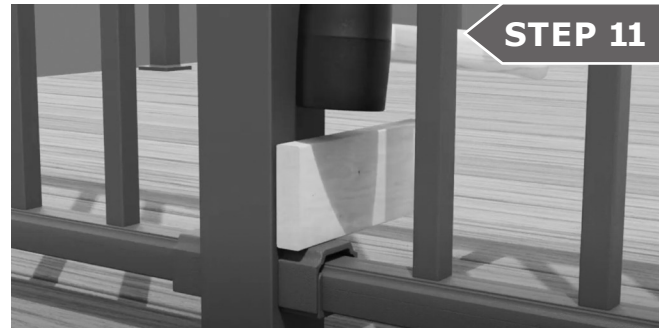


NOTE: Alternative Method: Completely assemble the railing panel and drop onto brackets.



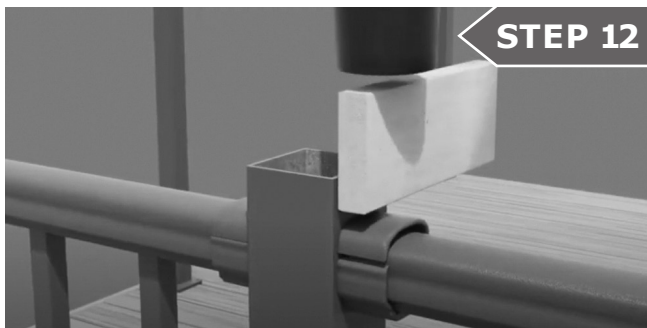
STEP 10

Drive a #14 Tek screw into the underside of each top rail bracket.



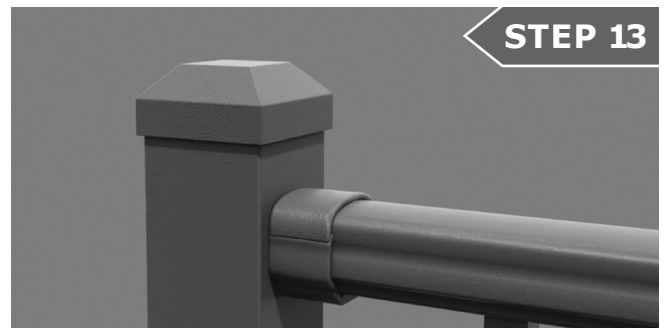
STEP 11

Use a 3/4" board and a rubber mallet at the back of the brackets to snap the bottom bracket caps into place.



STEP 12

Snap the top bracket caps into place. Top and bottom bracket caps should be completely flush against face of post before tapping them in place.



STEP 13

Finalize the rail section by tapping the post cap on with a rubber mallet.

HORIZONTAL BRACKET TO HORIZONTAL BRACKET INSTALLATION:

- Visit our Youtube channel for installation video.
- Our angled brackets are used whenever rails are not attached at right angles.

HORIZONTAL BRACKET TO LEVEL BRACKET INSTALLATION:

- Visit our Youtube channel for installation video

OPTIMUM
ALUMINUM RAILING by **FDS**

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